

## SAFETY DATA SHEET

Creation Date 22-Sep-2009

Revision Date 19-Jan-2018

Revision Number 4

### 1. Identification

**Product Name** Potassium selenocyanate

**Cat No. :** AC201980000; AC201980100; AC201980500; AC201982500

**CAS-No** 3425-46-5

**Synonyms** No information available

**Recommended Use** Laboratory chemicals.

**Uses advised against** Not for food, drug, pesticide or biocidal product use

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

##### Company

Fisher Scientific  
One Reagent Lane  
Fair Lawn, NJ 07410  
Tel: (201) 796-7100

Acros Organics  
One Reagent Lane  
Fair Lawn, NJ 07410

##### **Emergency Telephone Number**

For information **US** call: 001-800-ACROS-01 / **Europe** call: +32 14 57 52 11

Emergency Number **US**:001-201-796-7100 / **Europe**: +32 14 57 52 99

**CHEMTREC** Tel. No.**US**:001-800-424-9300 / **Europe**:001-703-527-3887

### 2. Hazard(s) identification

#### **Classification**

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

|  |            |
|--|------------|
| Acute oral toxicity                                  | Category 3 |
| Acute Inhalation Toxicity - Dusts and Mists          | Category 3 |
| Specific target organ toxicity - (repeated exposure) | Category 2 |

#### Label Elements

##### **Signal Word**

Danger

##### **Hazard Statements**

Toxic if swallowed

Toxic if inhaled

May cause damage to organs through prolonged or repeated exposure



**Precautionary Statements****Prevention**

Wash face, hands and any exposed skin thoroughly after handling  
Do not eat, drink or smoke when using this product  
Use only outdoors or in a well-ventilated area  
Do not breathe dust/fume/gas/mist/vapors/spray

**Response**

Get medical attention/advice if you feel unwell

**Inhalation**

IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing  
Call a POISON CENTER or doctor/physician

**Ingestion**

IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician  
Rinse mouth

**Storage**

Store locked up  
Store in a well-ventilated place. Keep container tightly closed

**Disposal**

Dispose of contents/container to an approved waste disposal plant

**Hazards not otherwise classified (HNOC)**

Very toxic to aquatic life with long lasting effects

### 3. Composition/Information on Ingredients

| Component                         | CAS-No    | Weight % |
|-----------------------------------|-----------|----------|
| Selenocyanic acid, potassium salt | 3425-46-5 | 99       |

### 4. First-aid measures

|  |   |
|--|---|
| <b>General Advice</b>                      | Show this safety data sheet to the doctor in attendance. Immediate medical attention is required.   |
| <b>Eye Contact</b>                         | In the case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.  |
| <b>Skin Contact</b>                        | Wash off immediately with plenty of water for at least 15 minutes. Immediate medical attention is required.   |
| <b>Inhalation</b>                          | Move to fresh air. If breathing is difficult, give oxygen. Immediate medical attention is required. Do not use mouth-to-mouth method if victim ingested or inhaled the substance; give artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. |
| <b>Ingestion</b>                           | Do not induce vomiting. Call a physician or Poison Control Center immediately.  |
| <b>Most important symptoms and effects</b> | No information available.   |
| <b>Notes to Physician</b>                  | Treat symptomatically   |

### 5. Fire-fighting measures

|                                       |                          |
|---------------------------------------|--------------------------|
| <b>Unsuitable Extinguishing Media</b> | No information available |
| <b>Flash Point</b>                    | No information available |
| <b>Method -</b>                       | No information available |

**Autoignition Temperature****Explosion Limits**

|   |                          |
|---|--------------------------|
| <b>Upper</b>                            | No data available        |
| <b>Lower</b>                            | No data available        |
| <b>Sensitivity to Mechanical Impact</b> | No information available |
| <b>Sensitivity to Static Discharge</b>  | No information available |

**Specific Hazards Arising from the Chemical**

Non-combustible. Do not allow run-off from fire fighting to enter drains or water courses.

**Hazardous Combustion Products**

Nitrogen oxides (NO<sub>x</sub>)

**Protective Equipment and Precautions for Firefighters**

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear. Thermal decomposition can lead to release of irritating gases and vapors.

**NFPA**

**Health**  
4

**Flammability**  
0

**Instability**  
1

**Physical hazards**  
N/A

**6. Accidental release measures****Personal Precautions**

Ensure adequate ventilation. Use personal protective equipment. Keep people away from and upwind of spill/leak. Evacuate personnel to safe areas. Avoid dust formation.

**Environmental Precautions**

Do not flush into surface water or sanitary sewer system. Do not allow material to contaminate ground water system. Prevent product from entering drains. Local authorities should be advised if significant spillages cannot be contained. See Section 12 for additional ecological information. Avoid release to the environment. Collect spillage.

**Methods for Containment and Clean Up**

Avoid dust formation. Sweep up or vacuum up spillage and collect in suitable container for disposal.

**7. Handling and storage****Handling**

Wear personal protective equipment. Avoid dust formation. Use only under a chemical fume hood. Do not breathe vapors/dust. Do not get in eyes, on skin, or on clothing. Do not ingest.

**Storage**

Keep in a dry, cool and well-ventilated place. Keep container tightly closed. Keep locked-up. Keep under nitrogen.

**8. Exposure controls / personal protection****Exposure Guidelines**

| Component                         | ACGIH TLV                  | OSHA PEL                             | NIOSH IDLH  | Mexico OEL (TWA)           |
|-----------------------------------|----------------------------|--------------------------------------|---|----------------------------|
| Selenocyanic acid, potassium salt | TWA: 0.2 mg/m <sup>3</sup> | (Vacated) TWA: 0.2 mg/m <sup>3</sup> | IDLH: 1 mg/m <sup>3</sup><br>TWA: 0.2 mg/m <sup>3</sup> | TWA: 0.2 mg/m <sup>3</sup> |

**Legend**

ACGIH - American Conference of Governmental Industrial Hygienists

OSHA - Occupational Safety and Health Administration

NIOSH IDLH: The National Institute for Occupational Safety and Health Immediately Dangerous to Life or Health

**Engineering Measures**

Ensure adequate ventilation, especially in confined areas. Ensure that eyewash stations and safety showers are close to the workstation location.

**Personal Protective Equipment****Eye/face Protection**

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.  |
| <b>Skin and body protection</b> | Long sleeved clothing.  |
| <b>Respiratory Protection</b>   | Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced. |
| <b>Hygiene Measures</b>         | Handle in accordance with good industrial hygiene and safety practice.  |

## 9. Physical and chemical properties

|   |                                 |
|---|---------------------------------|
| <b>Physical State</b>                         | Solid                           |
| <b>Appearance</b>                             | Beige                           |
| <b>Odor</b>                                   | pungent                         |
| <b>Odor Threshold</b>                         | No information available        |
| <b>pH</b>                                     | No information available        |
| <b>Melting Point/Range</b>                    | 152 - 158 °C / 305.6 - 316.4 °F |
| <b>Boiling Point/Range</b>                    | No information available        |
| <b>Flash Point</b>                            | No information available        |
| <b>Evaporation Rate</b>                       | Not applicable                  |
| <b>Flammability (solid,gas)</b>               | No information available        |
| <b>Flammability or explosive limits</b>       |                                 |
| Upper   | No data available               |
| Lower   | No data available               |
| <b>Vapor Pressure</b>                         | No information available        |
| <b>Vapor Density</b>                          | Not applicable                  |
| <b>Specific Gravity</b>                       | No information available        |
| <b>Solubility</b>                             | soluble                         |
| <b>Partition coefficient; n-octanol/water</b> | No data available               |
| <b>Autoignition Temperature</b>               |                                 |
| <b>Decomposition Temperature</b>              | No information available        |
| <b>Viscosity</b>                              | Not applicable                  |
| <b>Molecular Formula</b>                      | C K N Se                        |
| <b>Molecular Weight</b>                       | 144.08                          |

## 10. Stability and reactivity

|   |  |
|---|--|
| <b>Reactive Hazard</b>                  | None known, based on information available             |
| <b>Stability</b>                        | Stable under normal conditions. Hygroscopic.           |
| <b>Conditions to Avoid</b>              | Incompatible products. Exposure to moist air or water. |
| <b>Incompatible Materials</b>           | Strong oxidizing agents, Strong acids                  |
| <b>Hazardous Decomposition Products</b> | Nitrogen oxides (NOx)                                  |
| <b>Hazardous Polymerization</b>         | Hazardous polymerization does not occur.               |
| <b>Hazardous Reactions</b>              | None under normal processing.                          |

## 11. Toxicological information

### Acute Toxicity

#### Product Information

#### Component Information

| Component                         | LD50 Oral               | LD50 Dermal | LC50 Inhalation |
|-----------------------------------|-------------------------|-------------|-----------------|
| Selenocyanic acid, potassium salt | LD50 = 10 mg/kg ( Rat ) | Not listed  | Not listed      |

**Toxicologically Synergistic Products** No information available

**Delayed and immediate effects as well as chronic effects from short and long-term exposure**

**Irritation** No information available

**Sensitization** No information available

**Carcinogenicity** The table below indicates whether each agency has listed any ingredient as a carcinogen.

| Component                         | CAS-No    | IARC       | NTP        | ACGIH      | OSHA       | Mexico     |
|-----------------------------------|-----------|------------|------------|------------|------------|------------|
| Selenocyanic acid, potassium salt | 3425-46-5 | Not listed | Not listed | Not listed | Not listed | Not listed |

**Mutagenic Effects** No information available

**Reproductive Effects** No information available.

**Developmental Effects** No information available.

**Teratogenicity** No information available.

**STOT - single exposure** None known

**STOT - repeated exposure** None known

**Aspiration hazard** No information available

**Symptoms / effects, both acute and delayed** No information available

**Endocrine Disruptor Information** No information available

**Other Adverse Effects** The toxicological properties have not been fully investigated.

## 12. Ecological information

### Ecotoxicity

Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment. The product contains following substances which are hazardous for the environment.

**Persistence and Degradability** Soluble in water Persistence is unlikely based on information available.

**Bioaccumulation/ Accumulation** No information available.

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

## 13. Disposal considerations

**Waste Disposal Methods** Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. Chemical waste generators must also consult local, regional, and national hazardous waste regulations to ensure complete and accurate classification.

## 14. Transport information

### DOT

**UN-No** UN3283  
**Proper Shipping Name** SELENIUM COMPOUND, N.O.S  
**Proper technical name** Selenocyanic acid, potassium salt  
**Hazard Class** 6.1  
**Packing Group** II

### TDG

**UN-No** UN3283  
**Proper Shipping Name** SELENIUM COMPOUND, N.O.S

|                             |                          |
|-----------------------------|--------------------------|
| <b>Hazard Class</b>         | 6.1                      |
| <b>Packing Group</b>        | II                       |
| <b>IATA</b>                 |                          |
| <b>UN-No</b>                | UN3283                   |
| <b>Proper Shipping Name</b> | SELENIUM COMPOUND, N.O.S |
| <b>Hazard Class</b>         | 6.1                      |
| <b>Packing Group</b>        | II                       |
| <b>IMDG/IMO</b>             |                          |
| <b>UN-No</b>                | UN3283                   |
| <b>Proper Shipping Name</b> | SELENIUM COMPOUND, N.O.S |
| <b>Hazard Class</b>         | 6.1                      |
| <b>Packing Group</b>        | II                       |

## 15. Regulatory information

All of the components in the product are on the following Inventory lists: X = listed

### International Inventories

| Component                         | TSCA | DSL | NDSL | EINECS    | ELINCS | NLP | PICCS | ENCS | AICS | IECSC | KECL |
|-----------------------------------|------|-----|------|-----------|--------|-----|-------|------|------|-------|------|
| Selenocyanic acid, potassium salt | X    | X   | -    | 222-320-1 | -      |     | -     | X    | X    | X     | X    |

#### Legend:

X - Listed

E - Indicates a substance that is the subject of a Section 5(e) Consent order under TSCA.

F - Indicates a substance that is the subject of a Section 5(f) Rule under TSCA.

N - Indicates a polymeric substance containing no free-radical initiator in its inventory name but is considered to cover the designated polymer made with any free-radical initiator regardless of the amount used.

P - Indicates a commenced PMN substance

R - Indicates a substance that is the subject of a Section 6 risk management rule under TSCA.

S - Indicates a substance that is identified in a proposed or final Significant New Use Rule

T - Indicates a substance that is the subject of a Section 4 test rule under TSCA.

XU - Indicates a substance exempt from reporting under the Inventory Update Rule, i.e. Partial Updating of the TSCA Inventory Data Base Production and Site Reports (40 CFR 710(B)).

Y1 - Indicates an exempt polymer that has a number-average molecular weight of 1,000 or greater.

Y2 - Indicates an exempt polymer that is a polyester and is made only from reactants included in a specified list of low concern reactants that comprises one of the eligibility criteria for the exemption rule.

### U.S. Federal Regulations

**TSCA 12(b)** Not applicable

### SARA 313

| Component                         | CAS-No    | Weight % | SARA 313 - Threshold Values % |
|-----------------------------------|-----------|----------|-------------------------------|
| Selenocyanic acid, potassium salt | 3425-46-5 | 99       | 1.0                           |

**SARA 311/312 Hazard Categories** See section 2 for more information

### CWA (Clean Water Act)

| Component                         | CWA - Hazardous Substances | CWA - Reportable Quantities | CWA - Toxic Pollutants | CWA - Priority Pollutants |
|-----------------------------------|----------------------------|-----------------------------|------------------------|---------------------------|
| Selenocyanic acid, potassium salt | -                          | -                           | X                      | -                         |

### Clean Air Act

| Component                         | HAPS Data | Class 1 Ozone Depletors | Class 2 Ozone Depletors |
|-----------------------------------|-----------|-------------------------|-------------------------|
| Selenocyanic acid, potassium salt | X         |                         | -                       |

**OSHA Occupational Safety and Health Administration**  
Not applicable

**CERCLA** Not applicable

**California Proposition 65** This product does not contain any Proposition 65 chemicals

**U.S. State Right-to-Know Regulations**

| Component                         | Massachusetts | New Jersey | Pennsylvania | Illinois | Rhode Island |
|-----------------------------------|---------------|------------|--------------|----------|--------------|
| Selenocyanic acid, potassium salt | -             | X          | X            | X        | X            |

**U.S. Department of Transportation**

Reportable Quantity (RQ): N  
DOT Marine Pollutant N  
DOT Severe Marine Pollutant N

**U.S. Department of Homeland Security**

This product does not contain any DHS chemicals.

**Other International Regulations**

**Mexico - Grade** No information available

## 16. Other information

**Prepared By** Regulatory Affairs  
Thermo Fisher Scientific  
Email: EMSDS.RA@thermofisher.com

**Creation Date** 22-Sep-2009

**Revision Date** 19-Jan-2018

**Print Date** 19-Jan-2018

**Revision Summary** This document has been updated to comply with the US OSHA HazCom 2012 Standard replacing the current legislation under 29 CFR 1910.1200 to align with the Globally Harmonized System of Classification and Labeling of Chemicals (GHS).

**Disclaimer**

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of SDS**