Material Safety Data Sheet
Streptomycin Sulfate

MSDS# 84290

Section 1 - Chemical Product and Company Identification

MSDS Name: Streptomycin Sulfate
Catalog Numbers: AC612240000, 61224-0500, BP910-50, S70103
Synonyms: Streptomycin A Sulfate; Streptomycin Sesquisulfate; Agrimycin; Agristrep; Phytomycin; Plantomycin; Strepcin.

Company Identification: Fisher Scientific
One Reagent Lane
Fair Lawn, NJ 07410
For information in the US, call: 201-796-7100
Emergency Number US: 201-796-7100
CHEMTREC Phone Number, US: 800-424-9300

Section 2 - Composition, Information on Ingredients

<table>
<thead>
<tr>
<th>CAS#</th>
<th>3810-74-0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chemical Name</td>
<td>Streptomycin sulfate</td>
</tr>
<tr>
<td>%</td>
<td>100.0</td>
</tr>
<tr>
<td>EINECS#</td>
<td>223-286-0</td>
</tr>
</tbody>
</table>

- Hazard Symbols: T
- Risk Phrases: 60 61 20/21/22 36/37/38 42/43

Section 3 - Hazards Identification

EMERGENCY OVERVIEW

Warning! Irritant. May cause loss of hearing. May cause adverse reproductive effects. Harmful if swallowed, inhaled, or absorbed through the skin. May cause allergic respiratory and skin reaction. May cause nervous system effects. Possible risk of harm to the unborn child. Causes eye, skin, and respiratory tract irritation. Individuals with allergies or hypersensitivity to antibiotics should take caution. Target Organs: Kidneys, respiratory system, eyes, nervous system, reproductive system, skin, auditory system.

Potential Health Effects

Eye: Causes eye irritation. May cause chemical conjunctivitis.
Skin: Causes skin irritation. Harmful if absorbed through the skin. May cause an allergic reaction in certain individuals.
Ingestion: Harmful if swallowed. May cause gastrointestinal irritation with nausea, vomiting and diarrhea. May cause kidney damage. May cause central nervous system effects. Hearing loss and deafness have been reported.
Inhalation: Causes respiratory tract irritation. May cause an allergic response. May cause hearing impairment. May cause central nervous system effects.
Chronic: May cause fetal effects. May cause adverse reproductive effects.

Section 4 - First Aid Measures

Eyes: Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical aid.
Skin: Get medical aid. Flush skin with plenty of water for at least 15 minutes while removing contaminated
clothing and shoes. Wash clothing before reuse.

Ingestion: Never give anything by mouth to an unconscious person. Get medical aid. Do NOT induce vomiting. If conscious and alert, rinse mouth and drink 2-4 cupfuls of milk or water.

Inhalation: Remove from exposure and move to fresh air immediately. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical aid.

Notes to Physician: Treat symptomatically and supportively.

Section 5 - Fire Fighting Measures

General Information: As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear. During a fire, irritating and highly toxic gases may be generated by thermal decomposition or combustion.

Extinguishing Media: Use water spray, dry chemical, carbon dioxide, or appropriate foam.

Autoignition Temperature: Not applicable.

Flash Point: Not applicable.

Explosion Limits: Lower: Not available

Explosion Limits: Upper: Not available

NFPA Rating: health: 2; flammability: 0; instability: 0;

Section 6 - Accidental Release Measures

General Information: Use proper personal protective equipment as indicated in Section 8.

Spills/Leaks: Vacuum or sweep up material and place into a suitable disposal container. Clean up spills immediately, observing precautions in the Protective Equipment section. Avoid generating dusty conditions. Provide ventilation.

Section 7 - Handling and Storage

Handling: Minimize dust generation and accumulation. Avoid contact with eyes, skin, and clothing. Keep container tightly closed. Avoid ingestion and inhalation. Use with adequate ventilation. Wash clothing before reuse.

Storage: Store in a tightly closed container. Store in a cool, dry, well-ventilated area away from incompatible substances.

Section 8 - Exposure Controls, Personal Protection

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>ACGIH</th>
<th>NIOSH</th>
<th>OSHA - Final PELs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Streptomycin sulfate</td>
<td>none listed</td>
<td>none listed</td>
<td>none listed</td>
</tr>
</tbody>
</table>

OSHA Vacated PELs: Streptomycin sulfate: None listed

Engineering Controls:

Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use adequate ventilation to keep airborne concentrations low.

Exposure Limits

Personal Protective Equipment

Eyes: 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.

Skin: Wear appropriate protective gloves to prevent skin exposure.

Clothing: Wear appropriate protective clothing to prevent skin exposure.

Respirators: A respiratory protection program that meets OSHA's 29 CFR 1910.134 and ANSI Z88.2 requirements or European Standard EN 149 must be followed whenever workplace conditions warrant respirator use.

Section 9 - Physical and Chemical Properties

Physical State: Solid
Not available

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification. RCRA P-Series: None listed. RCRA U-Series: None listed.

### Chemical Stability
- **Stable at room temperature in closed containers under normal storage and handling conditions.**

### Conditions to Avoid
- Incompatible materials, dust generation, excess heat.

### Incompatibilities with Other Materials
- None reported.

### Hazardous Decomposition Products
- Nitrogen oxides, carbon monoxide, oxides of sulfur, carbon dioxide.

### Hazardous Polymerization
- Has not been reported.

### Section 11 - Toxicological Information

#### RTECS:
- **CAS# 3810-74-0: WK4990000**
- **RTECS:**

#### LD50/LC50:
- **CAS# 3810-74-0:** Oral, mouse: LD50 = 430 mg/kg;
  - Oral, rat: LD50 = 430 mg/kg;

### Carcinogenicity
- Streptomycin sulfate - Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65.

### Epidemiology
- No information found

### Teratogenicity
- Developmental abnormalities of the eye and ear were reported in humans (TDLo - route Intramuscular: Dose: 1700mg/kg)

### Reproductive
- Adverse reproductive effects have occurred in experimental animals.

### Neurotoxicity
- Aminoglycoside antibiotics have the potential to cause auditory nerve damage and neuromuscular paralysis.

### Mutagenicity
- Mutation in microorganisms:

### Other
- See actual entry in RTECS for complete information.

### Section 12 - Ecological Information

### Section 13 - Disposal Considerations

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification. RCRA P-Series: None listed. RCRA U-Series: None listed.

### US DOT
- **Shipping Name:** Please contact Fisher Scientific for shipping information
- **Hazard Class:**
- **UN Number:**
- **Packing Group:**
- **Canada TDG**
- **Shipping Name:** Not available
Section 15 - Regulatory Information

US Federal
TSCA
CAS# 3810-74-0 is listed on the TSCA Inventory.

Health & Safety Reporting List
None of the chemicals are on the Health & Safety Reporting List.

Chemical Test Rules
None of the chemicals in this product are under a Chemical Test Rule.

Section 12b
None of the chemicals are listed under TSCA Section 12b.

TSCA Significant New Use Rule
None of the chemicals in this material have a SNUR under TSCA.

CERCLA Hazardous Substances and corresponding RQs
None of the chemicals in this material have an RQ.

SARA Section 302 Extremely Hazardous Substances
None of the chemicals in this product have a TPQ.

SARA Codes
CAS # 3810-74-0: chronic.

Section 313
No chemicals are reportable under Section 313.

Clean Air Act:
This material does not contain any hazardous air pollutants. This material does not contain any Class 1 Ozone depletors. This material does not contain any Class 2 Ozone depletors.

Clean Water Act:
None of the chemicals in this product are listed as Hazardous Substances under the CWA. None of the chemicals in this product are listed as Toxic Pollutants under the CWA.

OSHA:
STATE
Streptomyein sulfate is not present on state lists from CA, PA, MN, MA, FL, or NJ.

California Prop 65
WARNING: This product contains Streptomyein sulfate, a chemical known to the state of California to cause birth defects or other reproductive harm.

California No Significant Risk Level:
None of the chemicals in this product are listed.

European/International Regulations
European Labeling in Accordance with EC Directives
Hazard Symbols: T
Risk Phrases:
R 61 May cause harm to the unborn child.
R 20/21/22 Harmful by inhalation, in contact with skin and if swallowed.
R 36/37/38 Irritating to eyes, respiratory system and skin.
R 42/43 May cause sensitization by inhalation and skin contact.
R 60 May impair fertility.
Safety Phrases:
S 26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.
S 36/37/39 Wear suitable protective clothing, gloves and eye/face protection.

WGK (Water Danger/Protection)
CAS# 3810-74-0: Not available

Canada
CAS# 3810-74-0 is listed on Canada's DSL List
Canadian WHMIS Classifications: D2A, D2B, D1B
This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations
and the MSDS contains all of the information required by those regulations.
CAS# 3810-74-0 is not listed on Canada's Ingredient Disclosure List.

Section 16 - Other Information
MSDS Creation Date: 7/15/1999
Revision #7 Date 10/01/2007

The information above is believed to be accurate and represents the best information currently available
to us. However, we make no warranty of merchantability or any other warranty, express or implied,
with respect to such information, and we assume no liability resulting from its use. Users should make
their own investigations to determine the suitability of the information for their particular purposes. In no
event shall the company be liable for any claims, losses, or damages of any third party or for lost profits
or any special, indirect, incidental, consequential, or exemplary damages howsoever arising, even if the
company has been advised of the possibility of such damages.

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