Material Safety Data Sheet
Ethyl bromoacetate

MSDS\# 07246
Section 1 - Chemical Product and Company Identification
MSDS Name: Ethyl bromoacetate
Catalog Numbers: AC158590000, AC158590025, AC158590050, AC158591000, AC158595000
Synonyms: Bromoacetic acid, ethyl ester.

| Company Identification: | Janssen Pharmaceuticalaan 3a <br> 2440 Geel, Belgium |
| :--- | :--- |
|  | Acros Organics |
| Company Identification: (USA) | One Reagent Lane |
|  | Fair Lawn, NJ 07410 |
| For information in the US, call: | $800-A C R O S-01$ |
| For information in Europe, call: | +3214575211 |
| Emergency Number, Europe: | +3214575299 |
| Emergency Number US: | $201-796-7100$ |
| CHEMTREC Phone Number, US: | $800-424-9300$ |
| CHEMTREC Phone Number, Europe: | $703-527-3887$ |

Section 2 - Composition, Information on Ingredients

CAS\#:
Chemical Name:
\%:
EINECS\#:

105-36-2
Ethyl bromoacetate
98
203-290-9

Hazard Symbols:
T+


Risk Phrases:

26/27/28
Section 3 - Hazards Identification
EMERGENCY OVERVIEW

Danger! Flammable liquid and vapor. May cause respiratory tract irritation. Lachrymator (substance which increases the flow of tears). May be absorbed through intact skin. Causes severe eye and skin irritation. May be fatal if inhaled, absorbed through the skin or swallowed. Target Organs: Eyes, skin.
Potential Health Effects
Eye:
Causes severe eye irritation. May cause opacity and scarring. Lachrymator (substance which increases the flow of tears).
Skin: Causes severe skin irritation. May be fatal if absorbed through the skin.
Ingestion: May be fatal if swallowed. Causes gastrointestinal irritation with nausea, vomiting and diarrhea.
May be fatal if inhaled. May cause irritation of the respiratory tract with burning pain in the nose and throat, coughing, wheezing, shortness of breath and pulmonary edema. Vapors may cause dizziness or suffocation.
Chronic: Chronic exposure may cause effects similar to those of acute exposure.

Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical aid immediately.

Skin:
Get medical aid immediately. Immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse.

Ingestion:

Inhalation:

Notes to
Physician:

## Section 5 - Fire Fighting Measures

As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved
General Information:

Extinguishing
Media:
difficult give oxygen DoT use moth to mouth resusctation If beathing has cels apply atificia difficult, give oxygen. Do NOT use mouth-to-mouth resuscitation. If breathing has ceased apply artificial respiration using oxygen and a suitable mechanical device such as a bag and a mask.
Do not induce vomiting. If victim is conscious and alert, give 2-4 cupfuls of milk or water. Never give anything by mouth to an unconscious person. Get medical aid immediately.
Get medical aid immediately. Remove from exposure and move to fresh air immediately. If breathing is or equivalent), and full protective gear. Vapors may form an explosive mixture with air. Flammable liquid and vapor. Vapors are heavier than air and may travel to a source of ignition and flash back. Vapors can spread along the ground and collect in low or confined areas.

Use water fog, dry chemical, carbon dioxide or alcohol type foam.

> Autoignition Not available
> Temperature:

Flash Point: 47 deg C ( 116.60 deg F)
Explosion
Limits: Lower:
Explosion $N o t$ available
Limits: Upper:
NFPA Rating: health: 3; flammability: 2; instability: 1;

## Section 6 - Accidental Release Measures

General Information:

Use proper personal protective equipment as indicated in Section 8.

Spills/Leaks:
Absorb spill with inert material (e.g. vermiculite, sand or earth), then place in suitable container. Remove all sources of ignition. Use a spark-proof tool. Provide ventilation.

Section 7 - Handling and Storage
Remove contaminated clothing and wash before reuse. Ground and bond containers when transferring material.
Use spark-proof tools and explosion proof equipment. Do not get in eyes, on skin, or on clothing. Empty
Handling: containers retain product residue, (liquid and/or vapor), and can be dangerous. Keep away from heat, sparks and flame. Do not ingest or inhale. Use only in a chemical fume hood. Do not pressurize, cut, weld, braze, solder, drill, grind, or expose empty containers to heat, sparks or open flames.
Keep away from sources of ignition. Keep container closed when not in use. Store in a cool, dry, well-ventilated area away from incompatible substances. Flammables-area.

## Section 8 - Exposure Controls, Personal Protection



OSHA Vacated PELs: Ethyl bromoacetate: 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. Use only under a chemical fume hood.

## 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:
Clothing: Wear appropriate protective clothing to prevent skin exposure. Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a Respirators: NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced.

Section 9 - Physical and Chemical Properties
Physical State: Clear liquid
Color: almost colorless
Odor: pungent odor
pH : Not available
Vapor Pressure: $2.6 \mathrm{~mm} \mathrm{Hg} @ 25 \mathrm{deg}$
Vapor Density: 5.8 (air=1)
Evaporation Rate: Not available
Viscosity: Not available
Boiling Point: 159 deg C @ $760 \mathrm{~mm} \mathrm{Hg}\left(318.20^{\circ} \mathrm{F}\right)$
Freezing/Melting Point: $-38 \operatorname{deg} \mathrm{C}\left(-36.40^{\circ} \mathrm{F}\right)$
Decomposition Temperature: Not available
Solubility in water: Insoluble
Specific Gravity/Density: $1.5060 \mathrm{~g} / \mathrm{ml}$
Molecular Formula: C4H7BrO2
Molecular Weight: 167.00
Section 10 - Stability and Reactivity
Chemical Stability:
Conditions to Avoid:
Incompatibilities with Other Materials
Hazardous Decomposition Products
Hazardous Polymerization

Stable under normal temperatures and pressures.
Ignition sources, excess heat.
Oxidizing agents, reducing agents, acids, bases.
Carbon monoxide, carbon dioxide, hydrogen bromide.
Has not been reported.

Section 11-Toxicological Information
RTECS\#: CAS\# 105-36-2: AF6000000
LD50/LC50: RTECS: Not available.
Carcinogenicity: Ethyl bromoacetate - Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65.
Other: The toxicological properties have not been fully investigated.

Section 12 - Ecological Information
Not available

## Section 13 - Disposal Considerations

Dispose of in a manner consistent with federal, state, and local regulations.
Section 14 - Transport Information
US DOT
Shipping Name: ETHYL BROMOACETATE
Hazard Class: 6.1
UN Number: UN1603
Packing Group: II
Canada TDG
Shipping Name: ETHYL BROMOACETATE
Hazard Class: 6.103
UN Number: UN1603
Packing Group: II

Section 15 - Regulatory Information

Hazard Symbols: T+
Risk Phrases:
R 26/27/28 Very toxic by inhalation, in contact with skin and if swallowed.
Safety Phrases:
S 7/9 Keep container tightly closed and in a well-ventilated place.
S 26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.
S 45 In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).

WGK (Water Danger/Protection)
CAS\# 105-36-2: Not available

## Canada

CAS\# 105-36-2 is listed on Canada's DSL List
Canadian WHMIS Classifications: D1A, B3, D2B
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\# 105-36-2 is listed on Canada's Ingredient Disclosure List

## US Federal

TSCA
CAS\# 105-36-2 is listed on the TSCA
Inventory. MSDS Creation Date: 5/01/1998


Revision \#7 Date 7/20/2009

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