This Product Safety Summary is intended to provide a general overview of the chemical substance. It contains basic information and is not intended to provide emergency response information, medical information or treatment information. The summary cannot be relied on to provide in-depth safety and health information. In-depth safety and health information must be obtained from the Material Safety Data Sheet ((M)SDS) for the chemical substance.

**Chemical Identity**

**Name:** tetradecyl chloroformate

**CAS number:** 56677-60-2

**Molecular formula:** $C_{15}H_{29}ClO_2$

**Structure**

![Structure of Tetradecyl Chloroformate]

**IUPAC name:**
tetradecyl chlorocarbonate

**BASF brand names:**
Myristyl Chloroformate

For synonyms see end of document

**Uses and Applications**

Tetradecyl chloroformate is used as an intermediate for chemical synthesis mainly for the production of organic peroxides in industrial settings generally under strictly controlled conditions.
Health Information

Human Health Safety Assessment
Note: The information contained in the table below may be useful to someone handling the concentrated substance such as a manufacturer or transporter. Consumers are not likely to come in contact with the concentrated substance. The data does not replace the data given in the (M)SDS. For more information and recommended protective measures please refer to the (M)SDS.

<table>
<thead>
<tr>
<th>Effect Assessment</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute Toxicity</td>
<td>Virtually nontoxic after a single ingestion.</td>
</tr>
<tr>
<td>Irritation</td>
<td>Skin contact causes irritation.</td>
</tr>
<tr>
<td></td>
<td>Not irritating to the eyes.</td>
</tr>
<tr>
<td>Sensitization</td>
<td>Caused skin sensitization in animal studies.</td>
</tr>
<tr>
<td>Mutagenicity</td>
<td>The substance was not mutagenic in bacteria.</td>
</tr>
</tbody>
</table>

Environmental Information

Environment Safety Assessment
Note: The information in this chapter is intended to provide brief and general information of this substance’s environmental impact. The results in the table below refer to testing performed with the concentrated substance. The data does not replace the data given in the (M)SDS. For more information and recommended protective measures please refer to the (M)SDS.

<table>
<thead>
<tr>
<th>Effect Assessment</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aquatic Toxicity</td>
<td>The substance hydrolyses. The hydrolysis product n-tetradecanol is chronically very toxic to aquatic life.</td>
</tr>
<tr>
<td>Persistence and degradability</td>
<td>The substance hydrolyses and the hydrolysis product n-tetradecanol is readily biodegradable.</td>
</tr>
<tr>
<td>Bioaccumulation potential</td>
<td>Accumulation in organisms is not to be expected.</td>
</tr>
</tbody>
</table>
Tetradecyl chloroformate is a colorless to yellow liquid which does not have flammable or explosive properties.

Note: The results in the table below refer to testing performed with the concentrated substance. The data does not replace the data given in the (M)SDS. For more information and recommended protective measures please refer to the (M)SDS.

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical state</td>
<td>Liquid</td>
</tr>
<tr>
<td>Melting / freezing point</td>
<td>4 °C at 1013 hPa</td>
</tr>
<tr>
<td>Boiling point</td>
<td>Decomposes before boiling</td>
</tr>
<tr>
<td>Flash point</td>
<td>No flash point up to 100°C</td>
</tr>
<tr>
<td>Flammability</td>
<td>Non flammable</td>
</tr>
<tr>
<td>Explosive properties</td>
<td>Non explosive</td>
</tr>
<tr>
<td>Self-ignition temperature</td>
<td>227 °C at 1013 h Pa</td>
</tr>
</tbody>
</table>

Workplace exposure: Tetradecyl chloroformate is used as an intermediate in industrial settings under strictly controlled conditions. Therefore, releases and subsequent worker exposure are unlikely. Nevertheless, workers should follow the recommended safety measures in the extended Safety Data Sheet (eSDS).

Consumer exposure: There is no intended use of Tetradecyl chloroformate in consumer products. The substance is designed for chemical synthesis and used in industrial or laboratory settings only. In addition, there is no indirect exposure via the environment to be expected. Consequently there is no relevant consumer exposure caused by intended uses.

Environmental exposure: Tetradecyl chloroformate is used as an intermediate in industrial settings under strictly controlled conditions. The substance hydrolyses and the hydrolysis product n-tetradecanol is readily biodegradable and has no acute toxic effects in the range of the substances water solubility. However, the substance is chronically very toxic to aquatic life. Nevertheless, a risk for the environment is considered to be
negligible since no significant releases into the environment are expected. Conclusively, all identified uses are safe for the environment based on the scientific facts summarized above and when carried out in compliance with recommended risk management measures and applicable regulations.

**Recommended Handling Measures**

The recommended safety measures generally apply in contact with the concentrated substance. It is NOT intended to replace the comprehensive guidance found in the (M)SDS, only supplement it. Please refer to the (M)SDS for specific safety and first aid measures.

When using concentrated chemicals always make sure that there is adequate ventilation. Always use appropriate chemical resistant gloves to protect your hands and skin and always wear eye protection such as chemical goggles. Do not eat, drink, or smoke where chemicals are handled, processed, or stored. Wash hands and skin following contact. If the substance gets into your eyes, rinse eyes thoroughly for at least 15 minutes with tap water and seek medical attention. For specific advice please consult the corresponding (Material) Safety Data Sheet of the substance.

All effluent releases that may include the substance must be directed to a (municipal) waste water treatment plant that removes the substance from the final releases to the receiving water.

**Regulatory Information / Classification and Labeling**

Under GHS substances are classified according to their physical, health, and environmental hazards. The hazards are communicated via specific labels and the (M)SDS. GHS attempts to standardize hazard communication so that the intended audience (workers, consumers, transport workers, and emergency responders) can better understand the hazards of the chemicals in use.

Note: The hazard statements and symbols presented here refer to the hazard properties of the concentrated substance and are meant to provide a brief overview of the substance’s labeling. It is not intended to be comprehensive or to replace information found in the (M)SDS.

**Labeling according to UN GHS**

UN GHS is the basis for country specific GHS labeling
Signal word:
Warning

Hazard statements:
H315: Causes skin irritation.
H317: May cause an allergic skin reaction.
H410: Very toxic to aquatic life with long lasting effects.

Additional information


Most commonly used synonyms

» Myristylchlorformiat
» Myristyloxy carbonyl chloride
» Formic acid, chloro-, tetradecyl ester (6CI)
» Carbonochloridic acid, tetradecyl ester (9CI)

Disclaimer

IMPORTANT: While the data and information contained herein are presented in good faith and believed to be accurate at the date of printing, it is provided for your guidance only and may be revised in the future. No warranties of any kind, either express or implied, of merchantability, fitness for a particular purpose or of any other nature are made regarding the data or information provided. Further, it is expressly understood that the data and information furnished by BASF hereunder are given gratis and BASF assumes no obligation or liability whatsoever resulting from use of or reliance on the data and information given.

Date of Issue: January 2013
Contact

For further information on this substance or GPS safety summaries in general, please contact: info.gps@basf.com