



Material Safety Data Sheet

FC21-06 Perfluorohexyl Propyl Epoxide

Revised 15-September-2011

1. PRODUCT AND COMPANY IDENTIFICATION

Material Identification

Product name: FC21-06
Chemical name: Perfluorohexyl Propyl Epoxide
(2,2,3,3,4,4,5,5,6,6,7,7,7-Tridecafluoroheptyl)oxirane
Chemical formula: CH₂(O)CHCH₂(CF₂CF₂)₃F
C₉H₅F₁₃O

Company Identification

Distributor: Fluoryx, Inc.
1933 Davis St., Suite 293
San Leandro, CA 94577
USA
Emergency call: +86-1346-4812437
+1-510-329-2811

2. COMPOSITION/INFORMATION ON INGREDIENTS

Components

Material	CAS Number	EINECS	TSCA Listed	Molecular Wt
Perfluorohexyl Propyl Epoxide	38565-52-5	Not available	Not available	376.12

3. HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

Combustible.

HMIS Rating

Health: 0
Flammability: 2
Reactivity: 0

NFPA Rating

Health: 0
Flammability: 2
Reactivity: 0

For additional information on toxicity, please refer to Section 11.

4. FIRST AID MEASURES

Inhalation:	If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Call a physician.
Skin Contact:	Flush skin with soap and water after contact. Wash contaminated clothing before reuse.
Eye Contact:	In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Call a physician.
Ingestion:	If swallowed, wash out mouth with water provided person is conscious. Call a physician.

5. FIRE FIGHTING MEASURES

Flammable Properties

Flash point:

91 °C

Method:

Closed cup.

Hazardous Decomposition Products:

Hazardous decomposition products include carbon dioxide, carbon monoxide, and hydrogen fluoride. Toxic gases or particles may be formed during combustion. These products may cause severe eye, nose, throat, and lung irritation or toxic effects.

Extinguishing Media:

Water spray, foam, dry chemical, CO₂.

Fire Fighting Instructions:

Evacuate personnel to a safe area. Keep personnel removed and upwind of fire. Wear self-contained breathing apparatus. Wear full protective equipment. Avoid breathing toxic decomposition products.

6. ENVIRONMENTAL SECTION

No data available.

General: Do not discharge into drains or rivers.

7. ACCIDENTAL RELEASE MEASURES

Personal Precautions:

Refer to section 9 of SDS for personal protection details. If outside, do not approach from downwind. If outside keep bystanders upwind and away from danger point. Mark out the contaminated area with signs and prevent access to unauthorized personnel. Turn leaking containers leak-side up to prevent the escape of liquid.

Environmental Precautions:

Do not discharge into drains or rivers. Contain the spillage using bunding.

Clean-Up Procedures:

Absorb into dry earth or sand. Transfer to a closable, labeled salvage container for disposal by an appropriate method.

8. HANDLING AND STORAGE

Handling Requirements:

Avoid direct contact with the substance. Ensure there is sufficient ventilation of the area. Do not handle in a confined space. Avoid the formation or spread of mists in the air. Use only in a fume hood.

Storage Conditions:	Store in cool, well-ventilated area. Keep container tightly closed.
Suitable Packaging:	Must only be kept in original packaging.

9. EXPOSURE CONTROLS AND PERSONAL PROTECTION

Engineering measures:	Ensure there is sufficient ventilation of the area.
Personal Protective Equipment	
Eye/face protection:	Wear safety goggles. Ensure eye wash and safety shower are at hand.
Respirators:	Self-contained breathing apparatus must be available in case of emergency.
Protective clothing:	Where there is potential for skin contact have available and wear as appropriate impervious gloves, apron, pants, and jacket.
Hand protection:	Protective gloves.

10. PHYSICAL AND CHEMICAL PROPERTIES

Boiling Point	80 °C @ 41 mm Hg
Melting Point	Not measured
Flash Point	91 °C (closed cup)
Molecular Weight	376.12 g/mol
Density	1.637 g/mL @ 25 °C
Solubility in Water	Negligible
pH	Not measured
Refractive Index	1.381 @ 25 °C
Odor	Not measured
Form	Clear liquid
Color	Colorless liquid

11. STABILITY AND REACTIVITY

Stability:	Stable under normal conditions.
Materials to Avoid:	Strong oxidizing agents.
Hazardous Decomposition Products:	In combustion, emits toxic fumes including carbon monoxide, carbon dioxide, and hydrogen fluoride.
Hazardous Polymerization Reactions:	Will not occur.

12. TOXICOLOGICAL INFORMATION

RTECS Number:	Not listed
Acute Toxicity	
LD50:	No data reported
Skin irritation:	No data available
Eye irritation:	No data available

Human experience:

Excessive exposures may affect human health, as follows:

Inhalation:

Material may be irritating to mucous membranes and upper respiratory tract.

Skin contact:

Irritation.

Eye contact:

Irritation.

13. ECOLOGICAL INFORMATION

No data available.

General:

Take care to prevent chemicals from entering the ground, water courses or drainage systems.

14. DISPOSAL CONSIDERATIONS

Disposal Operations:

This combustible material may be burned in a chemical incinerator equipped with an afterburner and scrubber. Observe all federal, state, and local environmental regulations.

Disposal of Packaging:

Dispose of as special waste in compliance with local and national regulations. Observe all federal, state and local environmental regulations.

The user's attention is drawn to the possible existence of regional or national regulations regarding disposal.

15. TRANSPORTATION INFORMATION

DOT

Proper Shipping Name: Combustible liquid, n.o.s.

UN#: UN1993

Class: COMBUSTIBLE LIQUID

Packing Group: Packing Group III

Hazard Label: None

PIH: Not PIH

IATA

Non-Hazardous for Air Transport

16. REGULATORY INFORMATION

US CLASSIFICATION AND LABEL TEXT

US Statements: Combustible.

UNITED STATES REGULATORY INFORMATION

SARA LISTED: No

CANADA REGULATORY INFORMATION

WHMIS Classification: This product has been classified in accordance with the hazard criteria of the CPR, and the MSDS contains all the information required by the CPR.

DSL: No

NDSL: Yes

17. OTHER INFORMATION

Legal Disclaimer:

For R&D use only. Not for drug, household, or other uses. The previous information is based upon our current knowledge and experience of our product and is not exhaustive. It applies to the product as defined by the specifications. In case of combinations or mixtures, one must confirm that no new hazards are likely to exist. In any case, the user is not exempt from observing all legal, administrative and regulatory procedures relating to the product, personal hygiene, and integrity of the work environment. Unless noted to the contrary, the technical information applies only to pure product.

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End of MSDS