



SAFETY DATA SHEET

According to JIS Z 7253:2019 **Revision date** 23-Mar-2023 Revision Number 2.03

Section 1: PRODUCT AND COMPANY IDENTIFICATION

Product Name	L-Threonine Methyl Ester Hydrochloride		
Product Code	357-16691,355-16692		
Manufacturer	FUJIFILM Wako Pure Chemical Corporation 1-2 Doshomachi 3-Chome		
	Chuo-ku, Osaka 540-8605, Japan Phone: +81-6-6203-3741 Fax: +81-6-6203-5964		
Supplier	FUJIFILM Wako Pure Chemical Corporation 1-2 Doshomachi 3-Chome, Chuo-ku, Osaka 540-8605, Japan Phone: +81-6-6203-3741 Fax: +81-6-6203-2029		
Emergency telephone number Recommended uses Restrictions on use	+81-6-6203-3741 / +81-3-3270-8571 For research use only Seek expert judgment when using for purposes other than those recommended.		

Section 2: HAZARDS IDENTIFICATION

GHS classification <u>Classification of the substance or mixture</u> Skin corrosion/irritation Serious eye damage/eye irritation

Category 2 Category 2A

Pictograms



Warning

Hazard statements

- H315 Causes skin irritation
- H319 Causes serious eye irritation

Precautionary statements-(Prevention)

- · Wash face, hands and any exposed skin thoroughly after handling
- Wear protective gloves/protective clothing/eye protection/face protection

Precautionary statements-(Response)

• IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing

- · If eye irritation persists: Get medical advice/attention
- IF ON SKIN: Wash with plenty of soap and water
- If skin irritation occurs: Get medical advice/attention
- Take off contaminated clothing and wash before reuse

Precautionary statements-(Storage)

Not applicable

Precautionary statements-(Disposal)

Not applicable

	Section 3. COMPOSITION
Other hazards	Not available
Others	

Section 3: COMPOSITION/INFORMATION ON INGREDIENTS

Single Substance or Mixture Substance

Formula

C5H11NO3·HCI

Not applicable

Chemical Name	Weight-%	Molecular weight	ENCS	ISHL No.	CAS RN
L-Threonine Methyl	97	169.61	N/A	2-(6)-1155	39994-75-7
Ester Hydrochloride					

Note on ISHL No.:

* in the table means announced chemical substances.

Impurities and/or Additives:

Section 4: FIRST AID MEASURES

Inhalation

Remove to fresh air. If symptoms persist, call a physician.

Skin contact

Wash off immediately with soap and plenty of water. If symptoms persist, call a physician.

Eye contact

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediate medical attention is required.

Ingestion

Rinse mouth. Never give anything by mouth to an unconscious person. Call a physician or poison control center immediately. Do not induce vomiting without medical advice.

Protection of first-aiders

Use personal protective equipment as required.

Section 5: FIRE FIGHTING MEASURES

Suitable extinguishing media

Water spray (fog), Carbon dioxide (CO2), Foam, Extinguishing powder, Sand

Unsuitable extinguishing media

No information available

Specific hazards arising from the chemical product

Thermal decomposition can lead to release of irritating and toxic gases and vapors.

Special extinguishing method

No information available

Special protective actions for

fire-fighters

Use personal protective equipment as required. Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Section 6: ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

For indoor, provide adequate ventilation process until the end of working. Deny unnecessary entry other than the people involved by, for example, using a rope. While working, wear appropriate protective equipments to avoid adhering it on skin, or inhaling the gas. Work from windward, and retract the people downwind.

Environmental precautions

To be careful not discharged to the environment without being properly handled waste water contaminated.

Methods and materials for contaminent and methods and materials for cleaning up

Sweep up and gather scattered particles, and collect it in an empty airtight container.

Recoverly, neutralization No information available

Secondary disaster prevention measures

Clean contaminated objects and areas thoroughly observing environmental regulations.

Section 7: HANDLING AND STORAGE

Handling

Technical measures

Avoid contact with strong oxidizing agents. Use with local exhaust ventilation.

Precautions

Do not rough handling containers, such as upsetting, falling, giving a shock, and dragging Prevent leakage, overflow, and scattering. Not to generate steam and dust in vain. Seal the container after use. After handling, wash hands and face, and then gargle In places other than those specified, should not be smoking or eating and drinking Should not be brought contaminated protective equipment and gloves to rest stops Deny unnecessary entry of non-emergency personnel to the handling area

Safety handling precautions

Avoid contact with skin, eyes or clothing. Use personal protective equipment as required.

Strong oxidizing agents

Storage

Safe storage conditions Storage conditions

Container protected from light, and store tightly closed in freezer (-20°C). Packed with an inert gas. Glass

Safe packaging material Incompatible substances

Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Engineering controls

In case of indoor workplace, seal the source or use a local exhaust system. Provide the safety shower facility, and handand eye-wash facility. And display their position clearly.

Exposure limits

This product, as supplied, does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.

Personal protective equipment Respiratory protection

Hand protection

Eye protection

Dust mask (JIS T8151) chemical protective gloves (JIS T 8116) protective eyeglasses or chemical safety goggles Long-sleeved work clothes

Skin and body protection General hygiene considerations

Handle in accordance with good industrial hygiene and safety practice.

Section 9: PHYSICAL AND CHEMICAL PROPERTIES

Form	
Color	White -
Appearance	crystal
Odor	no data
Melting point/freezing point	64 °C
Boiling point, initial boiling point and boiling range	no data
Flammability	no data
Evaporation rate:	no data
Flammability (solid, gas):	no data
Upper/lower flammability or	
explosive limits	
Upper:	no data
Lower:	no data
Flash point	no data
Auto-ignition temperature:	no data

White - pale yellow crystalline powder - powder no data available 64 °C no data available no data available no data available no data available

no data available no data available no data available Decomposition temperature: pH Viscosity (coefficient of viscosity) Dynamic viscosity Solubilities n-Octanol/water partition coefficient:(log Pow) Vapour pressure Specific Gravity / Relative density Vapour density Particle characteristics no data available no data available

Section 10: STABILITY AND REACTIVITY

Stability

 Reactivity
 no data available

 Chemical stability
 May be altered by light.

 Hazardous reactions
 None under normal processing

 Conditions to avoid
 Extremes of temperature and direct sunlight

 Incompatible materials
 Strong oxidizing agents

 Hazardous decomposition products
 Carbon monooxide (CO), Carbon dioxide (CO2), Nitrogen oxides (NOx), Hydrogen chloride (HCI) gas

Section 11: TOXICOLOGICAL INFORMATION

Acute toxicity

Skin irritation/corrosion Serious eye damage/ irritation Respiratory or skin sensitization Reproductive cell mutagenicity Carcinogenicity

Reproductive toxicity STOT-single exposure STOT-repeated exposure Aspiration hazard no data available

no data available no data available no data available no data available no data available

no data available no data available no data available no data available

Section 12: ECOLOGICAL INFORMATION

Ecotoxicity

No information available

Other data

no data available

Persistence and degradability Bioaccumulative potential Mobility in soil Hazard to the ozone layer No information available No information available No information available No information available

Section 13: DISPOSAL CONSIDERATIONS

Waste from residues

Disposal should be in accordance with applicable regional, national and local laws and regulations.

Contaminated container and contaminated packaging

Disposal should be in accordance with applicable regional, national and local laws and regulations.

Section 14: TRANSPORT INFORMATION

ADR/RID UN number Proper shipping name: UN classfication Subsidiary hazard class Packing group Marine pollutant	Not regulated - Not applicable
IMDG	Not regulated
UN number	-
Proper shipping name:	
UN classfication	
Subsidiary hazard class	
Packing group	
Marine pollutant (Sea)	Not applicable
Transport in bulk according to	No information available
Annex II of MARPOL 73/78 and the IBC Code	
	Not regulated
UN number	-
Proper shipping name:	
UN classfication	
Subsidiary hazard class	
Packing group	
Environmentally Hazardous	Not applicable
Substance	

Section 15: REGULATORY INFORMATION

International Inventories EINECS/ELINCS	-
TSCA	-
Japanese regulations	
Fire Service Act	Not applicable
Poisonous and Deleterious	Not applicable
Substances Control Law	
Industrial Safety and Health Act	tNot applicable
Act on the Evaluation of	Not applicable
Chemical Substances and	
Regulation of Their	
Manufacture, etc	
Regulations for the carriage	Not applicable
and storage of dangerous	
goods in ship	
Civil Aeronautics Law	Not applicable
Pollutant Release and Transfer	Not applicable
Register Law	
(2023.4.1-)	
Export Trade Control Order	Not applicable
	Section 16. OTHED INFORMATION

Section 16: OTHER INFORMATION

Key literature references and sources for data etc.

NITE: National Institute of Technology and Evaluation (JAPAN) http://www.safe.nite.go.jp/japan/db.html IATA dangerous Goods Regulations RTECS:Registry of Toxic Effects of Chemical Substances Japan Industrial Safety and Health Association GHS Model SDS Dictionary of Synthetic Oraganic Chemistry , SSOCJ, Koudansha Scientific Co.Ltd. Chemical Dictionary, Kyouritsu Publishing Co., Ltd. etc

Record of SDS revisions

The following contents were revised. Prodauct and company Identification. Exposure controls/personal protection. Regulatory information.

Disclaimer

This SDS is according to JIS Z 7253: 2019. 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, 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.

GHS Classification is according to JIS Z7252(2019). *JIS: Japanese Industrial Standards

End of Safety Data Sheet