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**1. PRODUCT AND COMPANY IDENTIFICATION**

Product name	2,2,4-Trimethylpentane
Synonyms	Isooctane
Grade	ACS, HPLC, Pesticide, Anapremium
Company	Anaqua Chemicals Supply 1510 Eldridge Parkway, Suite 110-268 Houston, TX 77077, USA
Telephone	(281) 668-0032
Fax	(281) 668-0033

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**2. COMPOSITION/ INFORMATION ON INGREDIENTS**

Formula	$\text{CH}_3\text{C}(\text{CH}_3)_2\text{CH}_2\text{CH}(\text{CH}_3)\text{CH}_3$
CAS-No.	540-84-1
Index-No.	601-009-00-8
Ec-No.	208-759-1
Concentration	> 99 %

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**3. HAZARDS IDENTIFICATION****GHS Classification**

Flammable liquid	Category 2
Skin irritation	Category 2
Special target organ toxicity-single exposure	Category 3
Aspiration hazard	Category 1
Chronic aquatic toxicity	Category 1
Acute aquatic toxicity	Category 1

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**4. FIRST AID MEASURES**

Inhalation	If breathed in, move to fresh air. If not breathing, give artificial respiration. Consult a physician.
Ingestion	Rinse mouth with water. Consult a physician immediately.
Skin Contact	Immediately wash off with plenty of water for at least 15 minutes. Consult a physician.
Eye Contact	Rinse through with plenty of water for at least 15 minutes. Consult a physician.
Note to Physician	Treat symptomatically

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## 5. FIRE-FIGHTING MEASURES

Suitable extinguishing media	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Specific hazards during fire fighting	Combustible material. Container may explode when heated. Vapors may form explosive mixtures with air at ambient temperature.
Special protective equipment for fire-fighters	Wear self contained breathing apparatus for fighting if necessary.

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## 6. ACCIDENTAL RELEASE MEASURES

Personal precautions	Use personal protective clothing and ventilation equipments. Avoid breath in vapors, mist or gas. Ensure adequate ventilation.
Environmental precautions	Do not release into drains.
Methods for cleaning up	Soak up with inert absorbent material and dispose in suitable, closed containers.

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## 7. HANDLING AND STORAGE

Handling	Wear personal protective equipments. Avoid breath in vapors, mist or gas. Keep away from hot surface, open fire and any sources of ignition. Take measures against electrostatic charge.
Storage	Keep containers tightly closed in a dry, cool and well-ventilated place. Keep away from source of ignition.

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## 8. EXPOSURE CONTROLS/ PERSONAL PROTECTION

### Occupational exposure controls

Engineering Measures	Ensure that eye washer and emergency showers are close to the work place. Ensure adequate ventilation. Work under hood.
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### Personal protective Equipment

Respiratory protection	Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU)
Hand protection	Wear appropriate protective gloves.
Eye protection	Tightly fitting safety glasses.
Skin and body protection	Protective clothes should be selected specifically for the work place according to concentration and quantity of the chemical handled.
Hygiene Measures	Handle in accordance with good industrial hygiene and safety practice. Wash hands and face before breaks and at the end of working day.

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## 9. PHYSICAL AND CHEMICAL PROPERTIES

Form	Liquid
Color	Colorless
pH	No data available
Oxidizing properties	No data available
Melting point	-107 °C (-160.6 °F)
Boiling point	98-99 °C (208.4-210.2 °F)
Flash point	-12 °C (10.4 °F)
Lower explosion limit	1.1 % (V)
Upper explosion limit	6 % (V)
Vapor pressure	51 hPa at 20.0 °C (68.0 °F)
Density	0.69 g/mL at 20 °C
Water solubility	0.56 g/l at 25 °C
Partition coefficient: n-octanol/ water	log Pow: 4.09
Molecular weight	114.23

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## 10. STABILITY AND REACTIVITY

Storage stability	Stable under recommended storage conditions
Conditions to avoid	Sources of ignition. Excess heat.
Materials to avoid	Strong oxidizing agents, Strong acids, Strong bases
Hazardous decomposition products	Carbon monoxide, Carbon dioxide

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## 11. TOXICOLOGICAL INFORMATION

Acute toxicity	LD50 Oral 2,500 mg/kg (Rat) LC50 Inhalation 34.7 mg/l (Rat) 4 h
Skin irritation	No data available
Eye irritation	No data available
Sensitization	No data available
Specific target organ toxicity – single exposure (GHS)	May cause drowsiness or dizziness
Specific target organ toxicity – repeated exposure (GHS)	No data available

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## 12. ECOLOGICAL INFORMATION

Persistence and degradability	No data available
Ecotoxicity	No data available
Mobility	No available information

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## 13. DISPOSAL CONSIDERATIONS

Product	Chemical should be disposed of in accordance with local environmental regulations. Contact a licensed professional waste disposal service to dispose of this chemical.
Packaging	Empty containers should be disposed of in accordance with local environmental regulations and taken for local recycling, recovery or waste disposal.

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## 14. TRANSPORT INFORMATION

### IATA

UN-Number: 1262 Class: 3 Packing group: II

Proper shipping name: Octanes

### IMDG

UN-Number: 1262 Class: 3 Packing group: II

Proper shipping name: Octanes

EMS-No. F-E, S-E

### ADR/RID

UN-Number: 1262 Class: 3 Packing group: II

Proper shipping name: Octanes

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## 15. REGULATORY INFORMATION

### Hazard statements

H225: Highly flammable liquid and vapor

H304: Maybe fatal if swallowed and enter airways

H315: Cause skin irritation

H336: May cause drowsiness or dizziness

H400: Very toxic to aquatic life

### Precautionary statements

P210: Keep away from heat/sparks/open flames/hot surfaces.-No smoking.

P261: Avoid breathing dust/fume/gas/mist/vapors/spray

P273: Avoid release to the environment

P301+P310: If swallowed: Immediately call a Poison center or doctor/physician

### DSL Status

All components of this product are on the Canadian DSL list.

### GHS-Labeling

Pictogram



Signal word *Danger*

Labeling according to EC Directive

Symbol(s): F-Highly flammable

Xn-Harmful

N-Dangerous for the environment

R-phrase(s): 11-38-50/53-65-67

Highly flammable. Irritating to skin. Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment. Harmful: may cause lung damage if swallowed. Vapor may cause drowsiness or dizziness.

S-phrase(s): 9-16-29-33-60-61-62

Keep container in a well-ventilated place. Keep away from sources of ignition- No smoking. Do not empty into drains. Take precautionary measures against static discharges. This material and its container must be disposed of as hazardous waste. Avoid release to the environment. Refer to special instructions/Safety data sheet. If swallowed, do not induce vomiting; seek medical advice immediately and show this container or label.

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## **16. OTHER INFORMATION**

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