

SAFETY DATA SHEET

Section 1 - Identification of Substance or Mixture and Company

Product identify:		
Product name:	(R)-(+)-4-Methyl-1,3-dioxolan-2-one	
Synonyms:	(R)-Propylene Carbonate	
Catalog number:	PI-12235	
Relevant identified uses of the substance or mixture and uses advised against		
Identified uses:	Laboratory chemicals, Manufacture of substances	
Details of the supplier of the safety data sheet		
Company identification:	PI Chemicals Ltd.	
	633 Eshan Road,	
	Pudong New Area, Shanghai China, 201203	
Telephone number:	+86-21-58953700	
Fax number:	+86-21-58953701	
E-mail address:	info@pipharm.com	
Emergency telephone number		
Emergency number:	+86-21-58953706	

Section 2 - Hazards Identification

Classification of the substance or mixture: Regulation (EC) No 1272/2008 Skin irritation Category 2 Eye irritation Category 2A Specific target organ toxicity - single exposure (Category 3)

Label elements

Classification according to (EC) No 1272/2008



Signal word: Warning
Hazard statement(s):
H315: Causes skin irritation.
H319 Causes serious eye irritation.
H335: May cause respiratory irritation.



Precautionary statement(s)

P261: Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray.

P305 + P351 + P338: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P342 + P311: IF experiencing respiratory symptoms: call a POISON CENTER or doctor/physician.

Accroding to EU Directive 67/548/EEC or 1999/45/EC.

Symbol(s): Xn Harmful

Risk phrases:

R 36/37/38: Irritating to eyes, respiratory system and skin

Safety phrases:

S 23: Do not breathe gas/fumes/vapour/spray.

S 26: In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S 36/37: Wear suitable protective clothing and gloves.

HMIS classification:

Health hazard: 0 Flammability: 1 Physical hazards 0

NFPA rating:

Health hazard: 0 Fire: 1 Reactivity hazard: 0

Section 3: Composition & Information on Ingredients

Molecular formula:	$C_4H_6O_3$
Molecular weight:	102.09

Component		Concentration
CAS Number:	16606-55-6	98%
EC Number:		

Section 4 - First Aid Measures

Eye:	Flush eyes with plenty of water for at least 15 minutes. Get medical aid if symptoms appear.
Skin:	Wash skin with plenty of water at least 15 minutes while removing contaminated clothing and
	shoes. Get medical aid if irritation develops and persists.
Ingestion:	Wash mouth out with water. Get medical aid immediately.
Inhalation:	Remove from exposure and move to fresh air immediately. If breathing is difficult, give
	oxygen. If not breathing, give artificial respiration. Get medical aid.

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Section 5 – Fire-Fighting Measures

Extinguishing media:Use water spray, dry chemical, carbon dioxide, or appropriate foam.Special hazards arising from the substance or mixture:Carbon oxidesAdvice for firefighters:Wear a self-contained breathing apparatus for fire fighting if necessary

Section 6 - Accidental Release Measures

Personal precautions, protective equipment and emergency procedures:

Use proper personal protective equipment as indicated in Section 8. *Environmental precautions:* Prevent further spillage or leakage when safe and capable *Methods and materials for containment and cleaning up:*

Vacuum or sweep up material and keep in a suitable closed container for disposal. Do not flush with water.

Section 7 - Handling and Storage

Precautions for safe handling:

Provide appropriate exhaust ventilation at places where dust is formed. Avoid contact with skin, eyes and clothes. Avoid inhalation of vapors and spray mist.

Conditions for safe storage, including any incompatibilities:

Store in a cool, dry place. Keep tightly closed. Moisture sensitive.

Section 8 - Exposure Controls/Personal Protection

Control parameters:

Contains no materials with occupational exposure limits.

Exposure controls:

Ensure well ventilation, good industrial hygiene and safety practice.

Personal protective equipment

Eye/Face protection:

Wear appropriate protective eyeglasses under the standards such as EN166(EU) or type ABEK(EN14387).

Skin/Body protection:

Wear appropriate protective gloves which have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN374 derived from it to prevent skin exposure. Dispose of contaminated gloves in accordance with applicable laws. Wash and dry hands.

Wear appropriate protective clothing to prevent skin exposure.

Respiratory protection:

Use an approved respirator and components under appropriate government standards such as NIOSH(US) or CEN(EU) if exposure limits are exceeded or if irritation or other symptoms are experienced.



Section 9- Physical and Chemical Properties

Physical state:	Liquid
Color:	Colorless
Odour:	Weak odor
Melting point/freezing point:	No data available
Initial boiling point and boiling range:	240 °C (464 °F) - lit.
Flash point:	132 °C (270 °F) - closed cup
Evaporation rate: Flammability(solid, gas): Upper/lower flammability	No data available No data available
or explosive limits:	No data available
Vapour pressure:	No data available
Vapour density:	No data available
Relative density: Solubility: Partition coefficient: n-octanol/water:	1.189 g/cm3 at 25 °C (77 °F) No data available No data available No data available
Auto-ignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity:	No data available

Section 10-Stability and Reactivity

Reactivity:	No data available
Chemical stability:	Stable under recommended temperatures and pressures.
Possibility of hazardous reactions:	No data available
Conditions to avoid:	Moisture sensitive.
Incompatible materials:	Strong oxidizing agents
Hazard Decomposition products:	Carbon monoxide(CO), Carbon dioxide(CO2)

Section 11 - Toxicological Information

Acute toxicity:

Component: (R)-(+)-4-Methyl-1,3-dioxolan-2-oneLD50 Oral No data availableSkin corrosion/irritation:No data availableSerious eye damage/eye irritation:No data availableRespiratory or skin sensitization:May cause allergic reactions.Germ cell mutagenicity:No data available

Carcinogenicity: Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65. *Reproductive toxicity:* No data available

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Specific target organ toxicity(STOT)-single exposure: No data availableSpecific target organ toxicity (STOT)-repeated exposure: No data availableAspiration hazard:No data availableAdditional information:RTECS#: not available

Section 12 – Ecological Information

Toxicity:	No data available	
Component: (R)-(+)-4-Methyl-1,3-dioxolan-2-one		
LC50 No data available		
Persistence and degradability:	No data available	
Bioaccumulative potential:	No data available	
Component: (R)-(+)-4-Methyl-1,3-dioxolan-2-one		
Mobility in soil:	No data available	
Results of PBT and vPvB assessment:	No data available	
Other adverse effects:	No data available	

Section 13 - Disposal Consideration

Waste treatment methodsProduct:Dispose of in accordance with federal, state and local environmental regulationsContaminated packaging:Dispose of as unused product

Section 14 - Transport Information

IATA Not dangerous goods IMDG Not dangerous goods RID/ADR Not dangerous goods DOT(US) Not dangerous goods

Section 15 - Regulatory Information

Safety, health and environmental regulations/legislation specific for the substance or mixture No data available Chemical safety assessment:No data available

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Section 16 – Other Information

SDS creation date:	Jun 19, 2013
Update:	Oct 10, 2013

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