Material Safety Data Sheet



POLYPHOSPHORIC ACID FOR SYNTHESIS (Phospholeum, tetraphosphoric acid) VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01 Page 1 of 8

Product Code : 16942

1. Identification of the substance/mixture and of the company/undertaking 1.1. Product identifier **Trade name : POLYPHOSPHORIC ACID FOR SYNTHESIS Product code** : 16942 **Identification of the product** : Phospholeum, tetraphosphoric acid CAS No: 8017-16-1 1.2. Relevant identified uses of the substance or mixture and uses advised against Use : Industrial. For professional use only. **1.3.** Details of the supplier of the safety data sheet **Company identification : MOLYCHEM** Office: 78/80 Babu Genu Road, Souri Bldg., 2nd Floor, Mumbai – 400 002 (INDIA) Tel: +91 22 4066 8111, 2205 7772 . Fax: + 91 22 2203 4442. Email: info@molychem.net Works: Plot No. B/9, Badlapur M.I.D.C., OPP. Shobhavat Textile Co., Kulgaon, Badlapur (E), Dist.-Thane-421 503. **1.4. Emergency telephone number** Emergency number : +91 22 4066 8111 (10:00am - 6:00 pm). 2. Hazards identification 2.1 Classification of the substance or mixture Classification according to Regulation (EC) No 1272/2008 Skin corrosion (Category 1B), H314 For the full text of the H-Statements mentioned in this Section, see Section 16. 2.2 Label elements Labelling according Regulation (EC) No 1272/2008 **Symbol**(s) : C: Corrosive **R** Phrase(s) : R34 : Cause burns. **S** Phrase(s) : S26 : In the case of contact with eyes, rinse immediately with plenty of water and seek medical advise. S36/37/39 : Wear suitable protective clothing and gloves & eye/face protecting. S45: In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible). Labelling according Regulation (EC) No 1272/2008 Hazard pictograms

Material Safety Data Sheet	MOLYCHEM
POLYPHOSPHORIC ACID FOR SYNTHESIS (Phospholeum, tetraphosphoric acid)	VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01
Product Code : 16942	Page 2 of 8
Signal word: Danger	
Hazard statement(s)	
H314 Causes severe skin burns and eye dam	age
Precautionary statement(s)	
•	hing/eve protection/face
P280 Wear protective gloves/ protective clot protection.	
protection. P305 + P351 + P338 IF IN EYES: Rinse cau	

P310 Immediately call a POISON CENTER/doctor.

Supplemental Hazard Statements none

2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

3. Composition/information on ingredients

3.1 Substances	
CAS-No. : 8017-16-1	

Substance name	Contents	CAS No
Polyphosphoric acid	100 %	8017-16-1

Substance.

Contains no other components or impurities which will influence the classification of the product.

4. First aid measures

4.1 Description of first aid measures

• General advice

Consult a physician. Show this safety data sheet to the doctor in attendance.

• If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

• In case of skin contact

Take off contaminated clothing and shoes immediately. Wash off with soap and plenty of water. Consult a physician.

• In case of eye contact

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

Material Safety Data Sheet



POLYPHOSPHORIC ACID FOR SYNTHESIS		
(Phospholeum, tetraphosphoric acid)		

VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01 Page 3 of 8

• If swallowed

Product Code : 16942

Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

4.2 Most important symptoms and effects, both acute and delayed

The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11

4.3 Indication of any immediate medical attention and special treatment needed No data available

<u>5. Firefighting measures</u>

5.1 Extinguishing media

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

5.2 Special hazards arising from the substance or mixture

Thermal decomposition may produce toxic fumes of phosphorus oxides and/or phosphine, Phosphoric acid Oxides of phosphorus

5.3 Advice for firefighters

Wear self-contained breathing apparatus for firefighting if necessary.

5.4 Further information

No data available

6. Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Use personal protective equipment. Avoid breathing vapours, mist or gas. Ensure adequate ventilation.

Evacuate personnel to safe areas.

For personal protection see section 8.

6.2 Environmental precautions

Do not let product enter drains.

6.3 Methods and materials for containment and cleaning up

Soak up with inert absorbent material and dispose of as hazardous waste. Keep in suitable, closed containers for disposal.

6.4 Reference to other sections

For disposal see section 13.

7. Handling and storage

7.1 Precautions for safe handling

Avoid inhalation of vapour or mist.

For precautions see section 2.2.

Material Safety Data Sheet

M	ĴĻY	С	н	Е	м

DATE OF ISSUE : 26-08-2019

VERSION: 02

Page 4 of 8

SUPERSEDES : 01

POLYPHOSPHORIC ACID FOR SYNTHESIS	
(Phospholeum, tetraphosphoric acid)	

Product Code : 16942

7.2 Conditions for safe storage, including any incompatibilities

Store in cool place. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Hygroscopic. Store under inert gas.

Storage class (TRGS 510): 8B: Non-combustible, corrosive hazardous materials **7.3 Specific end use(s)**

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

8. Exposure controls/personal protection

8.1 Control parameters

8.2 Exposure controls

Appropriate engineering controls

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

Personal protective equipment

• Eye/face protection

Tightly fitting safety goggles. Faceshield (8-inch minimum). Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

If used in solution, or mixed with other substances, and under conditions which differ from EN 374, contact the supplier of the CE approved gloves. This recommendation is advisory only and must be evaluated by an industrial hygienist and safety officer familiar with the specific situation of anticipated use by our customers. It should not be construed as offering an approval for any specific use scenario.

Body Protection

Complete suit protecting against chemicals, The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

• Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use a full-face respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator.

Material Safety Data Sheet	MOLYCHEM
POLYPHOSPHORIC ACID FOR SYNTHESIS (Phospholeum, tetraphosphoric acid)	VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01
Product Code : 16942	Page 5 of 8

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU). **Control of environmental exposure** Do not let product enter drains. 9. Physical and chemical properties 9.1 Information on basic physical and chemical properties Odour Threshold: No data available **pH**: No data available Melting point/freezing point: 16 °C Initial boiling point and boiling range: 300 °C at 1013 hPa Flash point :No data available **Evaporation rate**: No data available Flammability (solid, gas): No data available Upper/lower flammability or explosive limits: No data available Vapour pressure :No data available Vapour density : No data available Relative density :2,060 g/cm3 Water solubility No data available Partition coefficient: noctanol/ water : No data available Auto-ignition temperature : No data available **Decomposition temperature:** No data available Viscosity: No data available **Explosive properties**: No data available **Oxidizing properties** No data available 9.2 Other safety information No data available **10. Stability and reactivity 10.1 Reactivity** No data available **10.2 Chemical stability** Stable under recommended storage conditions. **10.3 Possibility of hazardous reactions** No data available **10.4 Conditions to avoid** Keep away from direct sunlight. Avoid moisture. **10.5 Incompatible materials**

Material Safety Data Sheet	MOLYCHEM
POLYPHOSPHORIC ACID FOR SYNTHESIS (Phospholeum, tetraphosphoric acid)	VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01
Product Code : 16942	Page 6 of 8

Bases, Reacts with water to generate heat and form posphoric acid. The reaction is not violent

10.6 Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Thermal decomposition may produce toxic fumes of phosphorus oxides and/or phosphine, Phosphoric acid Other decomposition products - No data available Hazardous decomposition products formed under fire conditions. - Oxides of phosphorus In the event of fire: see section 5

<u>11. Toxicological information</u>

11.1 Information on toxicological effects

• Acute toxicity

•Skin corrosion/irritation

Serious eye damage/eye irritation

Causes serious eye damage. Risk of corneal clouding.

Respiratory or skin sensitisation

•Germ cell mutagenicity

Carcinogenicity

IARC: No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

•Reproductive toxicity

Specific target organ toxicity - single exposure

Acute oral toxicity - If ingested, severe burns of the mouth and throat, as well as a danger of perforation of the oesophagus and the stomach. Acute inhalation toxicity - mucosal irritations, Cough, Shortness of breath, Possible damages:, damage of respiratory tract

Specific target organ toxicity - repeated exposure

•Aspiration hazard

Additional Information

RTECS: Not available

Material is extremely destructive to tissue of the mucous membranes and upper respiratory tract, eyes, and skin., Cough, Shortness of breath, Headache, Nausea

<u>12. Ecological information</u>

12.1 Toxicity

12.2 Persistence and degradability

- 12.3 Bioaccumulative potential
- **12.4 Mobility in soil**
- 12.5 Results of PBT and vPvB assessment

Material Safety Data Sheet	MOLYCHEM
POLYPHOSPHORIC ACID FOR SYNTHESIS (Phospholeum, tetraphosphoric acid)	VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01
Product Code : 16942	Page 7 of 8
	· · · · · · · · · · · · · · · · · · ·

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher. **12.6 Other adverse effects 13. Disposal considerations 13.1** Waste treatment methods Product Offer surplus and non-recyclable solutions to a licensed disposal company. **Contaminated packaging** Dispose of as unused product. **14. Transport information** 14.1 UN number ADR/RID: 3264 IMDG: 3264 IATA: 3264 14.2 UN proper shipping name ADR/RID: CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S. (Polyphosphoric acid) IMDG: CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S. (Polyphosphoric acid) IATA: Corrosive liquid, acidic, inorganic, n.o.s. (Polyphosphoric acid) **14.3 Transport hazard class(es)** ADR/RID: 8 IMDG: 8 IATA: 8 14.4 Packaging group ADR/RID: II IMDG: II IATA: II 14.5 Environmental hazards ADR/RID: no IMDG Marine pollutant: no IATA: no 14.6 Special precautions for user No data available **15. Regulatory information** 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006. **15.2 Chemical safety assessment** For this product a chemical safety assessment was not carried out

<u>16. Other information</u> Abbreviations and acronyms : PBT: persistent, bioaccumulative and toxic.

Material Safety Data Sheet	MOLYCHEM
POLYPHOSPHORIC ACID FOR SYNTHESIS (Phospholeum, tetraphosphoric acid)	VERSION : 02 DATE OF ISSUE : 26-08-2019 SUPERSEDES : 01
Product Code : 16942	Page 8 of 8

vPvB: very persistent and very bioaccumulative

Sources of key data used : REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006

Further information : None.

In accordance with REACH Regulation (CE) N° 1907/2006 and with CLP Regulation (CE) N° 1272/2008 DISCLAIMER OF LIABILITY The information in this SDS was obtained from sources which we believe are reliable. However, the information is provided without any warranty, express or implied, regarding its correctness. The conditions or methods of handling, storage, use or disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product. This MSDS was prepared and is to be used only for this product. If the product is used as a component in another product, this MSDS information may not be applicable.

End of document Prepared by: MOLYCHEM (INDIA)

For questions contact: MOLYCHEM Office: 78/80 Babu Genu Road, Souri Bldg., 2nd Floor, Mumbai – 400 002 (INDIA) Tel: +91 22 4066 8111, 2205 7772 . Fax: + 91 22 2203 4442. Email : info@molychem.net Works: Plot No. B/9, Badlapur M.I.D.C.,OPP.Shobhavat Textile Co., Kulgaon, Badlapur (E), Dist.-Thane-421 503

(The statements contained herein are offered for informational purposes only and are based upon technical data that MOLYCHEM believes to be accurate. It is intended for use only by persons having the necessary technical skills and at their own discretion and risk. Since conditions and manner of use are outside our control, we make NO WARRANTY, EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS OR OTHERWISE.)