

Material Safety Data Sheet POLYPROPYLENE

Section 1 - Product Identification

Chemical Formula : $(C_3H_6)_n$
Company Identification : Tradeasia International Pte. Limited
Address : 133 Cecil Street # 12-03 Keck Seng Tower, Singapore
Tel: +65-6227 6365
Fax: +65-6225 6286
Email: contact@chemtradeasia.com

Recommended use of the chemical and restrictions on use
Industrial use only. Raw material for plastics processing industry.

Section 2 – Composition/Information on Ingredients

Chemical Name	CAS No	Purity, %
Polypropylene homopolymer	9003-07-0	min. 99.9

Section 3 – Hazards Identification

Not classified as dangerous for supply/use.

Section 4 – First-Aid Measures

- 4.1 Inhalation** Remove patient from exposure. Keep patient at rest and give oxygen if breathing is difficult. If symptoms develop, obtain medical attention.
- 4.2 Skin Contact** After contact with skin, wash immediately with plenty of soap and water. In case of burns from hot material immediately cool affected skin as long as possible with cold water. Obtain medical attention.
- 4.3 Eye Contact** Remove particles by irrigating with eye wash solution or clean water, holding the eyelids apart. If symptoms persist, obtain medical attention.
- 4.4 Ingestion** Unlikely to be hazardous if swallowed. Provided the patient is conscious, wash out mouth with water and give 200-300 ml (half a pint) of water to drink. Do not induce vomiting. If symptoms develop, obtain medical attention.
- 4.5 Further Medical Treatment** Unlikely to be required but if necessary treat symptomatically.

Section 5 – Fire Fighting Measures

- 5.1 Extinguishing Media** As appropriate for surrounding fire. Extinguish preferably with foam, carbon dioxide or dry chemical.
- 5.2 Unsuitable Extinguishing Media** Do not use water jet or waterspray.

- 5.3 Fire Fighting Protective Equipment** A self contained breathing apparatus and suitable protective clothing should be worn in fire conditions.
- 5.4 Hazardous Decomposition Product(s)** Combustion or thermal decomposition will evolve toxic and irritant vapours.
- 5.5 Other** Can melt and burn in a fire. Molten material tends to flow or drip and will propagate fire.

Section 6 – Accidental Release Measures

- 6.1 Personal Precautions** Caution - spillages may be slippery. Ensure suitable personal protection (including respiratory protection) during removal of spillages. Dust clouds are sensitive to ignition by electrostatic discharge.
- 6.2 Environmental Exposure Controls** Avoid release to the environment. Do not allow to enter drains, sewers or watercourses.
- 6.3 Methods for cleaning up** Sweep up and shovel into waste drums or plastic bags.

Section 7 – Handling and Storage

- 7.1 HANDLING** Control dust formation. Do not eat, drink or smoke at the work place. Wash face and hands before eating, drinking or smoking. Will accumulate static charges that may cause an electric spark (ignition source). Take precautionary measures against static discharges.
- 7.2 STORAGE** Keep only in the original container. Keep container tightly closed. Keep in a cool, well ventilated place. Keep away from heat and direct sunlight. This product should be kept away from naked flames and other sources of ignition.
- Storage Temperature: Ambient.
 Storage Life: Stable at ambient temperature.
 Specific use: Industrial use only.

Section 8 – Exposure Controls/Personal Protection

Provide adequate ventilation when using the material and follow the principles of good occupational hygiene to control personal exposures.

OCCUPATIONAL EXPOSURE LIMITS

SUBSTANCE.	CAS No.	LTEL (8 hr TWA ppm)	LTEL (8 hr TWA mg/m ³)	STEL (ppm)	STEL (mg/m ³)	Note:
Polypropylene Homopolymer:	9003-07-0	No Occupational Exposure Limit assigned.				
Dust.			10			Total Dust.
			4			Respirable Dust.

8.1 Respirators	No special requirements. Provide adequate ventilation, including appropriate local extraction if dusts, fumes or vapours are likely to be evolved. Where engineering controls are not fitted or inadequate wear suitable respiratory protective equipment.
8.2 Eye Protection	Eye protection with side protection (EN 166).
8.3 Gloves	Wear suitable gloves if prolonged skin contact is likely. When dealing with hot material: Insulating gloves EN 407 (heat).
8.4 Other	Protective working garments (e.g. safety shoes EN 344, long sleeved protective working garments). Contaminated clothing should be thoroughly cleaned.
8.5 Environmental precautions	Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

Section 9 – Physical and Chemical Properties

Form	Solid. Granular.
Colour	White. Off-white.
Odour	Odourless.
pH (Value)	Not applicable.
Decomposition Temperature (°C)	> 300 (572°F)
Boiling Point (°C)	Not applicable.
Melting Point (°C)	140 - 170 (284 – 338°F)
Flash Point (°C) [Closed cup]	> 300 (> 572°F)
Auto Ignition Temperature (°C)	> 410 (>770°F)
Explosive Properties	Not explosive. Unlikely to represent a dust hazard under normal handling conditions. Minimum explosive limit:: 10 mg/m ³ (typically).
Minimum Ignition Energy (mJ)	25 (typically)
Oxidising Properties	Not applicable.
Vapour Pressure (Pascal)	Not applicable.
Specific Gravity	0.85 – 0.95
Solubility (Water)	Insoluble.
Percent Volatile by volume (%)	< 0.1

Section 10 – Stability and Reactivity

10.1 Chemical Stability	Stable under normal conditions. Decomposes at temperatures above 300°C.
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- 10.2 Conditions to avoid** Heat and direct sunlight.
- 10.3 Materials to avoid** Direct contact with open flames, self igniting and explosive materials.
- 10.4 Hazardous Decomposition Product(s)** Carbon monoxide, Carbon dioxide, Hydrocarbons and Acrid smoke.

Section 11 – Toxicological Information

Low toxicity under normal conditions of handling and use.

- 11.1 Ingestion** Low oral toxicity. Polypropylene Homopolymer: LD50 (rat) : >5000 mg/kg
- 11.2 Inhalation** Low acute toxicity. Dusts and vapours or fumes evolved during thermal processing may cause irritation to the respiratory system.
- 11.3 Skin Contact** No evidence of irritant effects from normal handling and use.
- 11.4 Eye Contact** Dust may have irritant effect on eyes. Permanent damage is unlikely.
- 11.5 Long Term Exposure** Chronic effects are unlikely.

Section 12 – Ecological Information

- 12.1 Environmental Fate and Distribution** Solid insoluble in water. Floats on water. The product has low mobility in soil.
- 12.2 Persistence and Degradation** The product is non-biodegradable.
- 12.3 Toxicity** Low toxicity to aquatic organisms.
- 12.4 Effect on Effluent Treatment** Unlikely to affect biological treatment processes.

Section 13 – Disposal Considerations

- 13.1 Regulatory information** Do not allow to enter drains, sewers or watercourses. Disposal should be in accordance with local, state or national legislation.
- 13.2 Recommended:** Normal disposal is via incineration operated by an accredited disposal contractor.

Section 14 – Regulatory Information

- EC Classification** Not classified as dangerous for supply/use.
- Hazard Symbol** Not applicable.
- Risk Phrases** Not applicable.
- Safety Phrases** Not applicable.

INTERNATIONAL INVENTORIES
EINECS (Europe)

EINECS: Polymer. Monomers included.

Section 15 : Additional Information

15.1. Disclaimer of Liability

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