



**ARIHANT CHEMICAL CORPORATION
& J.J ENTERPRISE**

For paints / inks / plastic / Rubber industries Raw material available with us under self import / Manufacturing / Trading.

MATERIAL SAFETY DATA SHEET :- POLYSIL – MCT- 8 (PRECIPITATED SILICA)

IDENTIFICATIO OF PRODUCT

PRODUCT NAME- PRECIPITATED SILICA

CHEMICAL NAME- SILLICON DIOXIDE

GRADE NAME – POLYSIL MCT -8

CAS NO -112926-00-8 (SILICA) 9002-88-4 (POLYETHYLENE WAX)

EC NO- 231-545-4 (SILICA)

SECTION 2: HAZARDS IDENTIFICATION

Synthetic Amorphous Silica is not considered to be hazardous in accordance with Directive 67/548/EEC.

2.1 Classification of the substance : no classification according to Directive 67/548/EEC criteria

2.2 Label Elements : - no single word label

2.3 Other Hazards: - Prolonged exposure with skin, eyes and respiratory tract may cause irritation resulting in mind restlessness, eyes closing and skin dryness.

SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS

3.1 Substance:

Ingredients	EC No.	CAS No.	Content	Classification
Silicon dioxide	231-545-4	112926-00-8 (7631-86-9 old)	98%(Anhydrous basis)	No classification according to Directive 67/548/EEC criteria
Polyethylene Wax		9002-88-4	6.0 – 9.0	

SECTION 4: FIRST AID MEASURES

No special first aid measures required

4.1 Description of first aid measures :

Inhalation

Remove to fresh air. Possible effects are cough & sneering. If breathing is difficult, get medical attention.

Skin Contact

Rinse with water and soap. Cover the irritated skin with emollient.

Eye Contact

Possible discomfort is due to foreign substance (Particles effect). Rinse the eyes with plenty of water for 15 minutes.

Get medical attention if necessary.

Ingestion

Clean mouth with water and drink plenty of water. Do not induce vomiting unless directed to do so by medical personnel.

4.2 Most Important symptoms and effects, both acute and delayed: as described in section 4.1 above

4.3 Indication of any Medical Attention and Special Treatment needed :

No immediate medical attention required

Movement of exposed individual from area to fresh air is recommended

There is no requirement for removal and special handling of clothing and shoes from the exposed individual

No personal protective equipment are recommended for the first aid responder

The material is not combustible. No special protection required beyond normal standard safety and good industrial hygienic practice.

SECTION 5: FIRE FIGHTING MEASURES

5.1 Extinguishing media:

Not combustible. Stable, amorphous silica can be used as a fire extinguishing agent . Dry chemical powder, appropriate foam, water spray or Carbon dioxide can also be used as extinguishing media.

Unsuitable extinguishing media

High-pressure water jet

5.2 Special hazards arising from the substance:

Product is considered not to be flammable. Danger of dust explosion. Sufficient measures must be taken to retain fire-control water and should not be allowed to enter drains or watercourses. Dispose of contaminated water and soil according to local regulations.

5.3 Advice for Fire Fighters :

A self-contained breathing apparatus and suitable protective clothing should be worn by fire fighters.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, Protective Equipment and Emergency Procedures

For non- emergency personnel: If dust occurs, it is recommended to use mask with P2 filter and safety glasses with side shield. Take precautionary measures against electrostatic discharge. Ventilate the area.

For emergency personnel : Suitable Personal Protective Clothes in full sleeves recommended in regular cotton/ nylon fabric and a dust mask along with safety glasses with side shield and a helmet in the manufacturing premises.

6.2 Environmental precautions :

Prevent any spillage from entering drains or water courses.

6.3 Methods and Material for Containment and clean up :

Mechanically take up or sweep up the spillage. Avoid raising dust.

Transfer to a suitable container for waste disposal. Ventilate area.

No other special information needed

6.4 Reference to other sections : Section 8 & Section 13

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe Handling:

To avoid dust generation, this substance should only be handled by trained personnel wearing suitable protective equipment (see section 8-personal protection).

Avoid inhalation, skin, and eye contact.

Avoid creating dust by proper enclosures.

Do not handle near open flame, sources of heat, static charge or ignition. Take precautionary measures against static discharge. All metal parts of the mixing and processing equipment must be earthed. Ensure all equipment is electrically earthed before beginning transfer operations.

Good general ventilation is required.

When using, do not eat, drink or smoke at the workplace.

Wash hands with soap and water after handling.

7.2 Conditions for Safe Storage, including any incompatibilities :

Store in closed bags or containers tightly closed and properly labeled.

Store at ambient temperature and well-ventilated area.

Do not store together with volatile chemicals as they may be adsorbed onto the product.

The material will be highly susceptible to odour, moisture and microbial infestation (for food grade applications) if stored in damp atmosphere , opened or exposed bags.

Take precautions against static charge by ensuring good earthing of equipment, particularly in flammable environment.

7.3 Specific end Uses:

The material will be used for specialty applications as referred in subsection 1.2.

As per Chemical Safety Report the use is identified in Cosmetics, Personal care, Paper, Pulp & Board corroborating with SU 3, SU 10, SU 6, PC 0, PC 28, PC 39, PC 26 & PROC 2, 3, 5, 9.

Storage conditions as per subsection 7.2 would be applicable

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control Parameters:

Exposure limit values

Type of limit: TWA 10mg/m³, the value is for total dust containing no asbestos & <1% crystalline silica.

Air sampling can be recommended to monitor silica dust particles.

8.2 Exposure Controls :

Appropriate Engineering Controls:

Use process enclosure, local exhaust ventilation or other controls to minimize airborne levels of the product.

Individual Protection Measures, such as Personal Protective Equipment:

Wear recommended personal protective equipment as appropriate and detailed below:



Eye/ Face protection

Wear safety glasses.

Eye wash facilities and a safety shower should be easily accessible.

Respiratory protection

Seek professional advice prior to respirator selection. Atmospheric level should be maintained below the exposure limit. If airborne concentration is high use mask or respirator.

Hand protection

Wear chemical protective gloves.

Before breaks and at the end of work thoroughly wash hands with soap and water and then apply protection cream.

Skin protection

Wear full sleeve clothes protective clothing.

Wash contaminated clothing before reuse.

Clean footwear before reuse.

Environmental exposure controls

All necessary precautions must be taken to avoid release of dust particles into the environment.

Refer to Local, State or National Legislation for Environmental and Pollution control.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on Basic Physical and Chemical Properties:

Form & Colour	: Free flowing white powder amorphous
Odour	: Odourless
Substance type	: Inorganic
pH	: 6.0 – 8.5
Boiling point/boiling range	: > 1700°C
Flash point	: conclusive, but not sufficient for classification
Flammability (solid, gas)	: conclusive, but not sufficient for classification
Explosive properties	: conclusive, but not sufficient for classification
Oxidizing properties	: conclusive, but not sufficient for classification
Vapour pressure	: No Vapour pressure at ambient Temperature
Specific Gravity	: 2 ± 0.1
Solubility – water	: Not Soluble
Solubility – other	: soluble in 10% NaOH (1gm in 10gm 10% Solution)
Partition coefficient	: Not applicable

Vapor density : Not applicable

Evaporation rate : Not applicable

9.2 Other information:

Melting point/melting range : Approx. 1710°C

Mean Particle Size Distribution : 6.6 - 9.2 µm (Max)

Conductivity : less than 2400 µS/cm

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity: This is a non-reactive material but should not be stored next to strong acids or bases. Can react with chlorinated rubber and magnesium.

10.2 Chemical Stability: Stable under ordinary conditions of use and storage.

10.3 Possibilities of Hazardous Reaction: Nil

10.4 Conditions to avoid

Keep away from direct sunlight, heat and sources of ignition or moisture.

Take precautionary measures against static charge.

10.5 Incompatible materials: Avoid contact with strong oxidizers, Chlorinated rubber and Magnesium.

10.6 Hazardous decomposition products

No hazardous decomposition products under normal conditions of storage.

Stable and inert product.

May include oxides of carbon on burning.

Hazardous polymerization products not reported.

SECTION 11: TOXICOLOGICAL INFORMATION

11.1 Information on Toxicological Effects :

As per EU Directive 67/548/EEC this substance is described as non-hazardous. It is an inert material hence not toxic.

Inhalation : No clinical symptoms, except restlessness & eye closing. Non-toxic.

Ingestion : No demonstrable health risk due to SAS exposure.

Skin contact : May be irritating to skin due to desiccative and defatting property resulting in skin dryness. Non-toxic.

Eye contact : Data not available; may be irritating to eyes.

Relevant Hazard Classes :

Acute toxicity : conclusive, but not sufficient for classification

Skin Corrosivity/irritation : conclusive, but not sufficient for classification

Respiratory Sensitization : conclusive, but not sufficient for classification

Repeated-dose toxicity : conclusive, but not sufficient for classification

Germ Cell Mutagenicity : conclusive, but not sufficient for classification

Carcinogenicity : conclusive, but not sufficient for classification

Reproductive toxicity : conclusive, but not sufficient for classification

Others : not applicable

SECTION 12: ECOLOGICAL INFORMATION

12.1 Toxicity : conclusive, but not sufficient for classification

12.2 Persistence and Degradability : conclusive, but not sufficient for classification

12.3 Bioaccumulative potential : conclusive, but not sufficient for classification

12.4 Mobility in soil : conclusive, but not sufficient for classification

12.5 Results of PBT and vPvB assessment : not assessed to be PBT or vPvB

12.6 Other adverse effects : conclusive, but not sufficient for classification

SECTION 13: DISPOSAL CONSIDERATIONS

Product & Contaminated Packaging: In accordance with local, Federal and state environmental regulations.

13.1 Waste Treatment Methods :

Land filling

Substance is inert hence there are no special physical / chemical properties that may affect treatment

Sewage disposal is discouraged

There are no special precautions on above recommended waste treatment except local, federal, state environmental regulations

SECTION 14: TRANSPORT INFORMATION

Not classified as dangerous in the meaning of transport regulations.

This product is not classified as dangerous for transport in accordance with CDG, IMDG, ADR, RID, ICAO/IATA.

Unused SAS is not classified as a dangerous good or hazardous waste hence no UN number is applicable.

14.1 UN number: Not applicable

14.2 UN Proper Shipping Name: Not applicable

14.3 Transport Hazard Class (es): Not applicable

14.4 Packing Group: Not applicable

14.5 Environmental Hazard: Not applicable

14.6 Special Precautions for use: Not applicable

14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code : Not applicable

SECTION 15: REGULATORY INFORMATION

This product is not classified as dangerous for supply in accordance with Directive 67/548/EEC.

15.1 Safety, Health and Environmental Regulations / Legislation specific for the substance : Nil

15.2 Chemical Safety Assessment: Not required, since classified as non-hazardous for all end-points.

SECTION 16: OTHER INFORMATION

This information is furnished without warranty expressed or implied, except that it is accurate to the best of knowledge with M/s. Madhu Silica Pvt. Ltd. The data on this sheet is related only to the specific material designated therein.

Madhu Silica assumes no legal responsibility for use or reliance upon these data.

Workers may be trained for proper PPE usage for protection of personal health.

Appropriate training in bag handling, transferring substance in relevant mixtures be given to avoid dust explosion in the work environment.

Classification and Labeling Danger Symbol – No single word Label or classification

Risk Phrases – N.A.

MSDS according to Regulation (EU) No. 453/2010 & (EU) No.1907/2006

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