



OMAR ASSOCIATES (PVT.) LIMITED

Mineral Division



TALC POWDER

1. Product Identification

Synonyms: Agalite; snow goose; talcum; talc U.S.P.

CAS No.: 14807-96-6

Molecular Weight: 96.33

Chemical Formula: H₂O₃Si_{3/4} Mg

HS Code: 2526

2. Hazards Identification

Health Rating: 4 - Extreme (Cancer Causing, if Asbestos is found)

Flammability Rating: 0 - None

Reactivity Rating: 0 - None

Contact Rating: 1 - Slight

Lab Protective Equip: GOGGLES; LAB COAT

Storage Color Code: Blue (Health)

Potential Health Effects

Inhalation:

Inhalation of large amounts of this fine dust may lead to pulmonary edema. May cause irritation to the upper respiratory tract. Tickling cough is a common symptom.

Ingestion:

Large doses may cause gastric irritation, nausea, and diarrhea.

Skin Contact:

May cause irritation.

Eye Contact:

May cause redness or irritation of eyes.

Chronic Exposure:

Prolonged inhalation of dust is associated with respiratory effects. Long term excessive exposures to talc may cause Talcosis, a pulmonary fibrosis which may in turn lead to severe and permanent damage to the lung. Crystalline silica: Chronic inhalation of dust can produce silicosis, a disease of the lungs. Cardiopulmonary impairment may occur. Chronic inhalation of crystalline silica is a lung cancer hazard.

Aggravation of Pre-existing Conditions:

No information found.

3. First Aid Measures

Inhalation:

Remove to fresh air. Get medical attention for any breathing difficulty.

Skin Contact:

Wash exposed area with soap and water. Get medical advice if irritation develops.

Eye Contact:

Wash thoroughly with running water. Get medical advice if irritation develops.

4. Fire Fighting Measures

Fire:

Not considered to be a fire hazard.

Explosion:

Not considered to be an explosion hazard.

Fire Extinguishing Media:

Use any means suitable for extinguishing surrounding fire.

Special Information:

In the event of a fire, wear full protective clothing and NIOSH-approved self-contained breathing apparatus with full face piece operated in the pressure demand or other positive pressure mode.

5. Accidental Release Measures

Ventilate area of leak or spill. Wear appropriate personal protective equipment as specified in Section 8. Spills: Sweep up and containerize for reclamation or disposal. Vacuuming or wet sweeping may be used to avoid dust dispersal. Talc accumulations on walking surfaces will cause very slippery conditions.

6. Handling and Storage

Keep in a tightly closed container, stored in a cool, dry, ventilated area. Protect against physical damage. Containers of this material may be hazardous when empty since they retain product residues (dust, solids); observe all warnings and precautions listed for the product.

7. Exposure Controls/Personal Protection

Airborne Exposure Limits:

-OSHA Permissible Exposure Limit (PEL):

20 mppcf for talc containing no asbestos

-ACGIH Threshold Limit Value (TLV):

2 mg/m³ (TWA) respirable dust for talc containing no asbestos

OSHA PERMISSIBLE LIMITS (PELs):

- For silica, amorphous, including natural diatomaceous earth (112926-00-8):
(80 mg/m³) / (%SiO₂), (TWA).

- For silica, crystalline, quartz (14808-60-7):
(30mg/m³)/(%SiO₂ + 2), (TWA), total dust;
(10 mg/m³)/(%SiO₂ + 2), (TWA), respirable fraction;
where "%SiO₂" is the percentage of crystalline silica
determined by airborne samples, as defined by
29 CFR 1910.1000, Z-3.

- For silica, crystalline, tridymite (15468-32-3) or cristobalite (14464-46-1):
Use one-half of the quartz exposure limits.

ACGIH THRESHOLD LIMIT VALUES:

- For silica gel & precipitated silica (11926-00-8):
10 mg/m³ (TWA).

- For diatomaceous earth, uncalcined (61790-53-2):
10 mg/m³ (TWA), inhalable particulate;
3 mg/m³ (TWA), respirable particulate;

(for particulate matter containing no asbestos and < 1% crystalline silica).

- For fused silica (60676-86-0):
0.1 mg/m³ (TWA), respirable fraction.

- For silica, crystalline, quartz (14808-60-7):
0.05 mg/m³ (TWA), respirable fraction, A2 - Suspected Human Carcinogen.

- For silica, crystalline, tridymite (15468-32-3):
0.05 mg/m³ (TWA), respirable fraction.

- For silica, crystalline, cristobalite (14464-46-1):
0.05 mg/m³ (TWA), respirable fraction.

- For silica, crystalline, tripoli (1317-95-9):
0.1 mg/m³ of contained respirable quartz (TWA), respirable fraction.

Ventilation System:

A system of local and/or general exhaust is recommended to keep employee exposures below the Airborne Exposure Limits. Local exhaust ventilation is generally preferred because it can control the emissions of the contaminant at its source, preventing dispersion of it into the general work area. Please refer to the ACGIH document, *Industrial Ventilation, A Manual of Recommended Practices*, most recent edition, for details.

Personal Respirators (NIOSH Approved):

If the exposure limit is exceeded and engineering controls are not feasible, a half face piece particulate respirator (NIOSH type N95 or better filters) may be worn for up to ten times the exposure limit or the maximum use concentration specified by the appropriate regulatory agency or respirator supplier, whichever is lowest. A full-face piece particulate respirator (NIOSH type N100 filters) may be worn up to 50 times the exposure limit, or the maximum use concentration specified by the appropriate regulatory agency, or respirator supplier, whichever is lowest. If oil particles (e.g. lubricants, cutting fluids, glycerin, etc.) are present, use a NIOSH type R or P filter. For emergencies or instances where the exposure levels are not known, use a full-face piece positive-pressure, air-supplied respirator. **WARNING:** Air-purifying respirators do not protect workers in oxygen-deficient atmospheres. Where respirators are required, you must have a written program covering the basic requirements in the OSHA respirator standard. These include training, fit testing, medical approval, cleaning, maintenance, cartridge change schedules, etc. See 29CFR1910.134 for details.

Skin Protection:

Wear protective gloves and clean body-covering clothing.

Eye Protection:

Safety glasses. Maintain eye wash fountain and quick-drench facilities in work area.

8. Physical and Chemical Properties

Hegman Grind	3- 6
Density (g/cm ³)	2.7- 2.85
Specific Gravity	2.6- 2.85
Oil Absorption	30-55
Solubility in H ₂ O	Insoluble
Appearance	White powder
Odor	None
Mohs Hardness @20°C	1.0- 1.5
pH	8.4-9.4
Crystallography	Lamellar

G.E. Brightness	85- 97
Refractive Index	1.59- 1.60

9. Stability and Reactivity

Stability:

Stable under ordinary conditions of use and storage.

Hazardous Decomposition Products:

No information found.

Hazardous Polymerization:

Will not occur.

Incompatibilities:

Manganese trifluoride, fluorine monoxide, chlorine trifluoride.

Conditions to Avoid:

Dusting

10. Toxicological Information

Toxicological Data:

No LD50/LC50 information found relating to normal routes of occupational exposure.

Talc: irritation skin human: 300 ug/3D-I mild; investigated as a tumorigen.

Silica, Amorphous:

- diatomaceous earth: investigated as a tumorigen.

Silica, Crystalline:

- tripoli: investigated as a tumorigen.
- tridymite: investigated as a tumorigen and mutagen.
- quartz: investigated as a tumorigen and mutagen.
- cristobalite: investigated as a tumorigen.
- fused: investigated as a tumorigen.

Carcinogenicity:

For Silica, Crystalline:

- Cristobalite (14464-46-1), quartz (14808-60-7), and tridymite (15468-32-3) are listed by NTP as known to be a human carcinogen.
- NIOSH considers cristobalite, tridymite, quartz, and tripoli (1317-95-9) to be potential occupational carcinogens.

11. Disposal Considerations

Whatever cannot be saved for recovery or recycling should be managed in an appropriate and approved waste disposal facility. Processing, use or contamination of this product may change the waste management options. State and local disposal regulations may

differ from federal disposal regulations. Dispose of container and unused contents in accordance with federal, state and local requirements.

12. Transport Information

Not regulated.

13. Other Information

NFPA Ratings: Health: **1** Flammability: **0** Reactivity: **0**

Label Hazard Warning:

CAUTION! CHRONIC INHALATION MAY CREATE A RESPIRATORY HAZARD. MAY AFFECT EYES, RESPIRATORY SYSTEM AND CARDIOVASCULAR SYSTEM. MAY AFFECT LUNGS. CANCER HAZARD. CONTAINS CRYSTALLINE SILICA WHICH CAN CAUSE CANCER. Risk of cancer depends upon duration and level of exposure.

Label Precautions:

Keep container closed.
Use only with adequate ventilation.
Do not breathe dust.
Do not get in eyes, on skin, or on clothing.
Wash thoroughly after handling.

Label First Aid:

If inhaled, remove to fresh air. Get medical attention for any breathing difficulty. In case of eye contact, immediately flush eyes with plenty of water for at least 15 minutes.

Product Use:

Laboratory Reagent.

Disclaimer:

Omar Minerals, provides the information contained herein in good faith but makes no representation as to its comprehensiveness or accuracy. This document is intended only as a guide to the appropriate precautionary handling of the material by a properly trained person using this product. Individuals receiving the information must exercise their independent judgment in determining its appropriateness for a particular purpose.
