

MATERIAL SAFETY DATA SHEET

Sand

SECTION 1 . Product and Company Identification

Product Name and Synonym: Sand
Product Code: S0857
Material Uses:
Manufacturer: Science Stuff
1104 Newport Ave
Austin, TX 78753
(512) 837-6020
Entry Date : 6/18/2013
Print Date: 6/18/2013
24 Hour Emergency Assistance : Chemtrec 800-424-9300
Canutec 613-996-6666

Health:	0
Flammability:	0
Reactivity:	0

Hazard Rating:
Least Slight Moderate High Extreme
0 1 2 3 4
NA=Not Applicable NE=Not Established

SECTION 2 HAZARD IDENTIFICATION

Generally not hazardous in normal handling, however good laboratory practices should always be used. Avoid long term exposure to skin or by inhalation.

Physical state: Solid [Granular solid.]

OSHA/HCS status: This material is considered hazardous by the OSHA Hazard Communication Standard (29CFR 1910.1200)

Emergency Overview:

WARNING!

HARMFUL IF INHALED.

SUSPECT CANCER HAZARD - MAY CAUSE CANCER. MAY CAUSE DAMAGE TO THE FOLLOWING ORGANS: LUNGS, RESPIRATORY TRACT, EYES.

Contains crystalline silica, which may cause lung disease and/or cancer.

WARNING: This product contains a chemical known to the State of California to cause cancer.

Avoid contact with eyes, skin and clothing. Use only with adequate ventilation. Keep container tightly closed and sealed until ready for use. Wash thoroughly after handling. Do not ingest.

Routes of entry: Inhalation. Ingestion.

Potential acute health effects

Inhalation: Toxic by inhalation.

Ingestion: No known significant effects or critical hazards.

Skin: No known significant effects or critical hazards.

Eyes: Slightly irritating to the eyes.

Potential chronic health effects

Carcinogenicity: May cause cancer. Risk of cancer depends on duration and level of exposure.

Mutagenicity: No known significant effects or critical hazards.

Teratogenicity: No known significant effects or critical hazards.

Developmental effects: No known significant effects or critical hazards.

Fertility effects: No known significant effects or critical hazards.

Target organs: May cause damage to the following: lungs, upper respiratory tract, eyes.

Sand

Medical conditions aggravated by over-exposure: Pre-existing disorders involving any target organs mentioned in this MSDS as being at risk may be aggravated by over-exposure to this product.

SECTION 3 MIXTURE COMPONENTS

SARA 313	Component	CAS Number	Percent Comp.	Dimension	Exposure Limits
<input type="checkbox"/>	Sand	CAS# 14808-60-7	100%	W/W	TLV 0.1 mg/m ³

SECTION 4 FIRST AID MEASURES

Generally not hazardous in normal handling, however good laboratory practices should always be used. Avoid long term exposure to skin or by inhalation.

FIRST AID: SKIN: Wash exposed area with soap and water. If irritation persists, seek medical attention.

EYES: Wash eyes with plenty of water for at least 15 minutes, lifting lids occasionally. Seek Medical Aid. INHALATION: Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen

INGESTION: Give several glasses of milk or water. Vomiting may occur spontaneously, but it is not necessary to induce. Never give anything by mouth to an unconscious person.

SECTION 5 FIRE FIGHTING MEASURES

Fire Extinguisher Type: Any means suitable for extinguishing surrounding fire

Fire / Explosion Hazards: None Known.

Fire Fighting Procedure: Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and clothing.

SECTION 6 ACCIDENTAL RELEASE MEASURES

Clean up with dustless method, vacuum, or well sweeping. Provide ventilation

Personal precautions: No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.

Environmental precautions: Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution.

Methods for cleaning up

Spill: Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor. Note: see section 1 for emergency contact information and section 13 for waste disposal.

SECTION 7 HANDLING AND STORAGE

Store in a cool dry place. This Material is not considered hazardous. Handle using safe laboratory practices.

SECTION 8 EXPOSURE CONTROLS/PERSONAL PROTECTION

Respiratory Protection:	NIOSH/MSHA-approved respirator
Ventilation	Local Exhaust <input checked="" type="checkbox"/> Mechanical <input checked="" type="checkbox"/>
Protective Gloves:	Wear appropriate gloves to prevent skin exposure
Eye Protection:	Splash Goggles
Other Protective Equipment:	Wear appropriate clothing to prevent skin exposure

Sand

OSHA PEL Z3 (United States, 9/2005)

TWA: 250 mppcf 8 hour(s) Form: Respirable

TWA: 10 mg/m³ 8 hour(s) Form: Respirable

TWA: 30 mg/m³ 8 hour(s) Form: Total dust.

OSHA PEL 1989 (United States, 3/1989)

TWA: 0.1 mg/m³ (as quartz) 8 hour(s) Form: Respirable dust

ACGIH TLV (United States, 1/2008)

TWA: 0.025 mg/m³ 8 hour(s) Form: Respirable fraction

NIOSHA REL (United States, 6/2008)

TWA: 0.05 mg/m³ 10 hour(s) Form: respirable dust

Engineering measures: Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.

Hygiene measures: Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking, and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Personal Protection

Eyes: Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts.

Recommended:

safety glasses with side-shields,

Skin: Personal protective equipment for the body should be selected based on the task being performed and risks involved and should be approved by a specialist before handling this product.

Body recommended:

lab coat

Respiratory: Use a properly fitted, air-purifying or air-fed respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

Hands: Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.

Recommended: nitrile rubber

Environmental exposure controls: Emissions from ventilation or work process equipment should be checked to ensure they comply with the

Sand

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

Melting Point:	3110° F	Percent Volatile by Volume:	N/A
Boiling Point:	4046° F	Evaporation Rate	N/A
Vapor Pressure:	N/A	Evaporation Standard	
Vapor Density:	N/A	Auto Ignition Temp	Not applicable
Solubility in Water:	insoluble	Lower Flamm. Limit in Air	Not applicable
Appearance /Odors:	White to tan granules, odorless	Upper Flamm. Limit in Air	Not applicable
Flash Point:	N/A		
Specific Gravity:	2.65		

SECTION 10 STABILITY AND REACTIVITY INFORMATION

Stability:	Stable
Conditions to Avoid:	High temperatures.
Materials to Avoid:	Strong oxidizing agents, acids.Strong alkalis
Hazardous Decomposition Products:	Not known to occur
Hazardous polymerization:	Will Not Occur
Conditions to Avoid:	None known

SECTION 11 Toxicological Information

Sand (Quartz)

LDLo	Intratracheal	Rat	250 mg/kg
LDLo	Intratracheal	Rat	200 mg/kg
LDLo	Intravenous	Rat	90 mg/kg
TDLo	Intratracheal	Rat	50 mg/kg
TDLo	Intratracheal	Rat	30 mg/kg
TDLo	Intratracheal	Rat	25 mg/kg
TDLo	Intratracheal	Rat	15.69 mg/kg
TDLo	Intratracheal	Rat	10 mg/kg
TDLo	Intratracheal	Rat	5 mg/kg
TDLo	Intratracheal	Rat	1.5 mg/kg
TDLo	Intratracheal	Rat	1 mg/kg
TDLo	Intratracheal	Rat	1250 mg/kg
TDLo	Intratracheal	Rat	150 mg/kg
TDLo	Intratracheal	Rat	100 mg/kg
TDLo	Oral	Rat	120 mg/kg

Carcinogenicity
May cause cancer. Risk of cancer depends on duration and level of exposure.
Mutagenicity
No known significant effects or critical hazards.
Teratogenicity
No known significant effects or critical hazards.

SECTION 12 Ecological Information

Environmental effects: No known significant effects or critical hazards.
Other adverse effects: No known significant effects or critical hazards.

Sand

SECTION 13 Disposal Considerations

The information presented only applies to the material as supplied. The identification based on characteristic(s) or listing may not apply if the material has been used or otherwise contaminated. It is the responsibility of the waste generator to determine the toxicity and physical properties of the material generated to determine the proper waste identification and disposal methods in compliance with applicable regulations. Disposal should be in accordance with applicable regional, national and local laws and regulations.

SECTION 14 Transport Information

DOT Classification: Not Regulated

DOT Regulations may change from time to time. Please consult the most recent D.O.T. regulations.

SECTION 15 Regulatory Information

United States

HCS Classification:
Toxic material
Carcinogen
Target organ effects

U.S. Federal regulations:

United States inventory (TSCA 8b): listed
TSCA (Toxic Substance Control Act): This product is listed on the TSCA Inventory.
SARA 302/304/311/312 extremely hazardous substances: No products were found.
SARA 302/304 emergency planning and notifications: No products were found.
SARA 302/304/311/312 hazardous chemicals: Sand (Quartz)
SARA 311/312 MSDS distribution- Chemical inventory- hazard identification: Sand (Quartz)
Immediate (acute) health hazard, Delayed (chronic) health hazard
Clean Water Act (CWA) 307: No products were found
Clean Water Act (CWA) 311: No products were found
Clean Air Act (CAA) 112 accidental release prevention: No products were found
Clean Air Act (CAA) 112 regulated flammable substance: No products were found
Clean Air Act (CAA) 112 regulated toxic substance: No products were found.

DEA List I Chemicals : not listed
(Precursor Chemicals)
DEA List II Chemicals : not listed
(essential Chemicals)

Massachusetts Substance : This material is listed.
New Jersey Hazardous Substances : This material is listed.
Pennsylvania RTK Hazardous Substances : This material is listed.

California Prop. 65

WARNING: this product contains a chemical known to the State of California to cause cancer.

Ingredient name: Sand (Quartz)
Cancer: Yes Reproductive: No No significant risk level: No Maximum acceptable dosage level: No

Canada
WHMIS (Canada) :
Class D-2B: Material causing other toxic effects (Toxic)

Canadian lists :
CEPA Toxic Substance: This material is not listed.
Canadian ARET: This material is not listed.
Canadian NPRI: This material is not listed.
Alberta Designated Substances: This material is not listed.
Ontario Designated Substances: This material is not listed.
Quebec Designated Substances: This material is not listed.

CEPA DSL/ CEPA NDSL : CEPA DSL:
This material is listed or exempted.

Sand

This product has been classified in accordance with the hazard criteria of the CPR and the MSDS contains all the information required by the CPR.

SECTION 16

Additional Information

Flammability

Health

Reactivity

Revisions

NFPA

0.1

The information herein is believed to be accurate and is offered in good faith for the user's consideration and investigation. No warranty either expressed or implied is made for the completeness or accuracy of the information whether originating from the above mentioned company or not. Users of this material should satisfy themselves by independent investigation of current scientific and medical knowledge that the material can be used safely.