

NISSAN CHEMICAL INDUSTRIES, LTD.

Revised OCT. 1999

MATERIAL SAFETY DATA SHEET

SECTION I

TRADE NAME: **SNOWTEX-40**

CHEMICAL NAME/SYNONYMS: Colloidal Silica/Silicon Dioxide, Amorphous Silica

FORMULA: $(SiO_2)_n$

CAS REGISTRY NO: 7631-86-9 ; Amorphous Silica

EINECS INVENTORY No: Reported in EINECS and included in EINECS Reg.No.2315454

TSCA INVENTORY STATUS: Reported in TSCA Inventory. Various physical forms of silica(silicon dioxide) are included in TSCA Inventory at CAS Reg.No.7631-86-9.

ID NOS./CODES NIOSH Registry No.: VV7322000

MANUFACTURER'S NAME: Nissan Chemical Industries, Ltd.

ADDRESS :Kowa-Hitotsubashi Building, 7-1, 3-chome, Kanda-nishiki-cho, Chiyoda-ku
Tokyo, Japan

EMERGENCY AND PRODUCT INFORMATION TELEPHONE NO:

JAPAN ; Nissan Chemical Industries, Ltd.

TEL : 81-3-3296-8065

U.S.A. : Nissan Chemical America Corporation

TEL : 1-713-532-4745

10777 Westheimer, Suite 150 Houston, TX 77042

TRANSPORTATION EMERGENCY TELEPHONE NO: CHEMTREC: 1-800-424-9300 (U.S.A.)

SECTION II - HAZARDOUS INGREDIENTS

MATERIAL

wt%

Amorphous Silica

40-41

Na₂O

Below 0.6

SECTION III - PHYSICAL DATA

BOILING POINT (at 760mmHg;°C)

: 100

SPECIFIC GRAVITY (20°C)

: 1.28-1.35

VAPOR DENSITY

: Vapor is water

EVAPORATION RATE (BUTYL ACETATE=1)

: Less Than 1

VAPOR PRESSURE(at 25°C;mmHg)

: 24

SOLUBILITY IN WATER

: 100%

COLOR

: Colorless

FORM, APPEARANCE AND ODOR

: Liquid, Clear to opalescent and Odorless
1/3

SECTION IV - FIRE AND EXPLOSION HAZARD DATA

FLASH POINT: None
FLAMMABLE LIMITS: None
UNUSUAL FIRE AND EXPLOSION HAZARDS: None

SECTION V - HEALTH HAZARD DATA

Amorphous Silica

OSHA: Silica (Amorphous)

PEL, - TWA : 20 mppcf (million particle / cubic foot)

PEL, - TWA : 0.8 mg/m³ (Total dust)

ACGIH:

Silica (Amorphous) fume : TLV-TWA 2.0 mg/m³ (Respirable)

Silica (Amorphous) fused : TLV-TWA 0.1 mg/m³ (Respirable)

EFFECT OF OVEREXPOSURE: Handle with care to avoid contact with eyes, skin and clothing contact.

EMERGENCY AND FIRST AID PROCEDURES: (CONSULT PHYSICIAN)

SKIN - May cause slight irritation. The material is not likely to be hazardous by skin contact, but cleaning the skin after advisable.

EYES - May cause mild irritation. Immediately flush eyes with plenty of water for at least 15 minutes. Call physician.

SWALLOWED - No specific intervention is indicated as the material is not likely to be hazardous by ingestion. However, if symptoms occur, consult physician.

INHALATION - Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.
Call physician.

SECTION VI - REACTIVITY DATA

STABILITY : Stable (Conditions to avoid is under 0°C, over 40°C)

INCOMPATIBILITY (Materials to avoid): Unknown

HAZARDOUS DECOMPOSITION PRODUCTS : Not applicable

HAZARDOUS POLYMERIZATION : Will not occur

SECTION VII - SPILL OR LEAK PROCEDURES

WASTE DISPOSAL METHOD: Dispose of in compliance with all applicable Federal, state, and local regulations.

SECTION VIII - SPECIAL PROTECTION INFORMATION

SAFETY PRECAUTIONS

- Avoid contact eyes, skin, and clothing.
- Avoid breathing aerosols and mists (also dust from dried-down product).
- Wash thoroughly after handling.
- Wash contaminated clothing before reuse and before the material dries.

Colloidal Silica:

- ①When spilled and dried, colloidal silica usually aggregate into amorphous state. In such state, its particle are too big to be inhaled.
- ②When sprayed, however, mists of the liquid or dried particles are formed which can be inhaled.
- ③It is reported that inhaled dust or mist of colloidal silica cause pneumoconiosis and silicosis but its details process is not clear yet.
- ④If large amount of colloidal silica contact eyes, it may cause irritation.
- ⑤Long contact with skin may cause mild irritation.

RESPIRATORY PROTECTION(Specify type):	Not required
VENTILATION	: None
PROTECTIVE GLOVES	: Neoprene gloves
EYE PROTECTION	: Chemical goggles
OTHER PROTECTIVES EQUIPMENT	: Protective clothing if skin contact is appreciable

SECTION IX - SPECIAL PRECAUTIONS

STORAGE CONDITION : Keep 0°C - 40°C. Keep container tightly closed.
Store at above 0°C to avoid irreversible precipitation of silica. Must not be stored on a place exposed to direct sunlight.

OTHER PRECAUTIONS : For manufacturing only. Not for food or drug use.

SHIPPING INFORMATION : Not regulated as a hazardous material by DOT or IMO.

The data in this Material Safety Data Sheet relates only to the specific material designated herein and does not relate to use in combination with any other material or in any process.

- THE END -

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CERTIFICATE OF ANALYSIS



Nissan Chemical Industries, Ltd.
Sodegaura Plant

Quality Management Section
11-1 Kitasode Sodegaura City
Chiba-Prefecture, Japan

We hereby certify that under mentioned commodity has been manufactured by us, and that the results of our test were as mentioned below.

Commodity	SNOWTEX 40	Lot No.	120114
Quantity	40kg	Date of Shipment	Mar. 13. 2000

Item	Unit	Analysis Result
Specific Gravity (20°C)		1.306
pH (20°C)		9.9
Viscosity(Ostwald 25°C)	mPa·s	12.1
SiO ₂	%	40.5
Na ₂ O(T)	%	0.47

Note	
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