MATERIAL SAFETY DATA SHEET
MED-4528

NuSil Technology urges each customer or recipient of this MSDS to study it carefully to become aware of and understand the hazards associated with the product. The reader should consider consulting reference works or individuals who are experts in ventilation, toxicology, and fire prevention, as necessary or appropriate to the use and understanding of the data contained in this MSDS.

To promote safe handling, each customer or recipient should: (1) notify its employees, agents, contractors, and others whom it knows or believes will use this material of the information regarding hazards or safety; (2) furnish this same information to each of its customers for the product; and (3) request its customers to notify their employees, customers and other users of the product of this information.

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

NuSil Technology 1050 Cindy Lane Carpinteria, California 93013 USA (805) 684-8780	**EMERGENCY** TELEPHONE NUMBERS: (800) 424-9300 **CHEMTREC** (805) 684-8780 OUTSIDE OF THE USA (703) 527-3887 **CHEMTREC**

PRODUCT NAME: **MED-4528**
CHEMICAL NAME: N/A
CHEMICAL FAMILY: Silicone Elastomer
FORMULA: Proprietary
MOLECULAR WEIGHT: N/A
SYNONYMS: N/A
CAS # : Mixture

2. HAZARDOUS INGREDIENTS

%	MATERIAL	CAS #	EXPOSURE VALUE	CLASSIFICATION
20	Silica, amorphous	07631-86-9	See Section 8	See Section 7
<2	Dimethylmethylhydrogen Copolysiloxane	68037-59-2	None Established	See Section 7

3. HAZARDS IDENTIFICATION

EFFECTS OF SINGLE OVEREXPOSURE:

SWALLOWING:
Small amounts transferred to the mouth by fingers during use, etc., should not injure. Swallowing large amounts may cause digestive discomfort.

SKIN ABSORPTION:
No evidence of adverse effects from available information.

INHALATION:
No evidence of adverse effects from available information.

SKIN CONTACT:
No evidence of adverse effects from available information.

EYE CONTACT:
Direct contact may cause temporary discomfort with mild redness, dryness, and irritation.

EFFECTS OF REPEATED OVEREXPOSURE:
No injury from silica or dust should occur during reasonable use. If use creates respirable particles, some respiratory system injury may occur. However, since the silica in this product is compounded into the polymer matrix, it is not expected to present the same hazards as neat silica.

MEDICAL CONDITIONS AGGRAVATED BY OVEREXPOSURE:
A knowledge of the available toxicology information and of the physical and chemical properties of the material suggests that overexposure is unlikely to aggravate existing medical conditions.

SIGNIFICANT LABORATORY DATA WITH POSSIBLE RELEVANCE TO HUMAN HEALTH HAZARD EVALUATION:
None currently known.

OTHER EFFECTS OF OVEREXPOSURE:
None currently known.

4. FIRST AID MEASURES

EMERGENCY AND FIRST AID MEASURES:

SWALLOWING:
No emergency care anticipated

SKIN:
Wash with soap and water.

INHALATION:
Short-term harmful health effects are not expected from vapor generated at ambient temperature.

EYES:
Immediately flush eyes with water for at least 15 minutes. Obtain medical attention if discomfort persists.

NOTES TO PHYSICIAN:
There is no specific antidote. Treatment of overexposure should be directed at the control of symptoms and the clinical condition of the patient. NOTE: Do not induce vomiting. Emesis of this material may prove difficult due to its high viscosity. Aspiration may cause lung damage.

5. FIRE FIGHTING MEASURES

FLASH POINT (test method(s)): >300°F (Tag Closed Cup)

FLAMMABLE LIMITS IN AIR (by volume):
LOWER: N/A UPPER: N/A

EXTINGUISHING MEDIA:
Apply alcohol-type or universal-type foams by manufacturers' recommended techniques for large fires. Use carbon dioxide or dry chemical media for small fires.

SPECIAL FIRE FIGHTING PROCEDURES:
Do not aim extinguisher stream directly into a pool of hot, burning liquid as this may cause frothing, and may intensify the fire. Use self-contained breathing apparatus when fighting fire in an enclosed area.

UNUSUAL FIRE AND EXPLOSION HAZARDS:
This product contains polydimethylsiloxane which can generate formaldehyde as a byproduct of oxidative thermal decomposition at temperatures greater than 150°C (300°F). See Section 10 for further information.

6. ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IF MATERIAL IS RELEASED OR SPILLED:
Spills should be contained with mechanical barriers. Transfer spilled material to a suitable container for disposal.

WASTE DISPOSAL METHOD:
Dispose of in accordance with all Federal, State and local regulations.

7. HANDLING AND STORAGE

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE:
Normal precautions common to safe manufacturing practice should be followed in handling and storage.

Store below 90°F (32°C)

Keep container closed, in a cool dry place.	S3/S7/S8
Avoid contact with skin and eyes	S24/S25
In case of fire, do not breathe fumes	S41

Any proposed use of this product in elevated-temperature processes should be thoroughly evaluated to assure that safe operating conditions are established and maintained.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

OCCUPATIONAL EXPOSURE VALUES AND SOURCE:
Silica, amorphous : 10 mg/m^3 - 8 hours TWA (ACGIH,)
6 mg/m^3 - 8 hours TWA (OSHA, NIOSH)

RESPIRATORY PROTECTION:
Use NIOSH approved respirator or self-contained breathing apparatus as needed to maintain personnel exposure below established Occupational Exposure Values.

VENTILATION:
General (mechanical) room ventilation with local ventilation as needed to maintain exposure below established Occupational Exposure Value.

PROTECTIVE GLOVES: PVC-coated.

EYE PROTECTION: Safety glasses.

OTHER PROTECTIVE EQUIPMENT: Eye bath and safety shower.

9. PHYSICAL AND CHEMICAL PROPERTIES (based on typical material)

BOILING POINT: N/A
SPECIFIC GRAVITY (H_2O=1): 1.12
FREEZING POINT: N/A
VAPOR PRESSURE : < 5 mm Hg
VAPOR DENSITY (air=1): N/A

EVAPORATION RATE (Butyl Acetate=1): N/A
SOLUBILITY IN WATER (By wt): < 0.1 %
APPEARANCE: White
ODOR: Slight Odor
PHYSICAL STATE : Viscous Liquid
PERCENT VOLATILES (by wt): See Section 15

Note: The above information is not intended for use in preparing product specifications.

10. STABILITY AND REACTIVITY DATA

STABILITY: Stable.

CONDITIONS TO AVOID: None.

INCOMPATIBILITY: Oxidizing materials can cause a reaction.

HAZARDOUS COMBUSTION OR DECOMPOSITION PRODUCTS:
Burning can produce carbon monoxide, carbon dioxide, oxides of silicon, and hydrocarbons. Carbon monoxide is highly toxic if inhaled; carbon dioxide in sufficient concentrations can act as an asphyxiant. Acute overexposure to the products of combustion may result in irritation of the respiratory tract.

Traces of formaldehyde may be generated due to oxidative thermal decomposition at temperatures greater than 150°C (300°F). Exposure to formaldehyde can cause adverse effects such as skin and respiratory sensitization and eye and throat irritation. Formaldehyde is a potential carcinogen. Evaluate and control exposure to formaldehyde when warranted by conditions of use.

HAZARDOUS POLYMERIZATION: Will not occur.

11. TOXICOLOGICAL INFORMATION

COMPONENT:
MED-4528:

Acute Oral LD_{50} (mg/kg):	500-5000 (Rat) Inferred from ingredient hazard(s)
Acute Dermal LD_{50} (mg/kg):	1000-2000 (Rbt.) Inferred from ingredient hazard(s)
Acute Inhalation LC_{50} (mg/l):	2-20 (Rat) Inferred from ingredient hazard(s)
Other:	N/A.
Ames Test:	N/A.

Refer to Section 3 for further discussion of the health hazards associated with this preparation.

12. ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION:	Complete information not yet available.
CHEMICAL FATE INFORMATION:	Complete information not yet available.

13. DISPOSAL CONSIDERATIONS

Dispose of in accordance with all Federal, State, and local regulations.

14. TRANSPORT INFORMATION

DOT HAZARD CLASSIFICATION: None

I.A.T.A. HAZARD CLASSIFICATION: None (Not Regulated)

15. REGULATORY INFORMATION

STATUS ON SUBSTANCE LISTS:
The concentrations shown are maximum or ceiling levels (weight %) to be used for calculations for regulations. Trade Secrets are indicated by "TS".

C.H.I.P. REGULATIONS

Chemicals (Hazards Information and Packaging) Regulations 1993 requires physico-chemical and health hazard determination of all substances and preparations manufactured, transported, stored, modified, or consumed within the EEC. Components present in this product at a level which could require reporting under the statute are:
**** NONE ****

FEDERAL EPA

Comprehensive Environmental Response Compensation and Liability Act of 1980 (CERCLA) requires notification of the National Response Center of release of quantities of Hazardous Substances equal to or greater than the reportable quantities (RQ's) in 40 CFR 302.4. Components present in this product at a level which could require reporting under the statute are: **** NONE ****

Superfund Amendments and Reauthorization Act of 1986 (SARA) Title III requires emergency planning based on Threshold Planning Quantities (TPQ's) and release reporting based on Reportable Quantities (RQ's) in 40 CFR 355 (used for SARA 302, 304, 311, and 312). Components present in this product at a level which could require reporting under the statute are: **** NONE ****

Superfund Amendments and Reauthorization Act of 1986 (SARA) Title III requires submission of annual reports of release of toxic chemicals that appear in 40 CFR 372 (for SARA 313). This information must be included in all MSDS's that are copied and distributed for this material. Components present in this product at a level which could require reporting under this statute are: **** NONE ****

INVENTORY STATUS
The ingredients of this product are listed on, or are exempt from listing on, the TSCA inventory.

STATE-RIGHT-TO-KNOW

CALIFORNIA Proposition 65
This product contains no levels of listed substances, which the State of California has found to cause cancer, birth defects or other reproductive harm, which would require a warning under the statute.

MASSACHUSETTS 105 CMR 670.000 Right-To-Know, Substance List (MSL)
Hazardous Substances and Extraordinarily Hazardous Substances on the MSL must be identified when present in products. Components present in this product at a level which could require reporting under the statute are:

MATERIAL	CAS NUMBER	UPPER BOUND CONCENTRATION
Silica, amorphous	07631-86-9	20 %

PENNSYLVANIA Right-To-Know, Hazardous Substance List
Hazardous Substances and Special Hazardous Substances on the List must be identified when present in products. Components present in this product at a level which could require reporting under the statute are:

MATERIAL	CAS NUMBER	UPPER BOUND CONCENTRATION
Silica, amorphous	07631-86-9	20 %

CALIFORNIA SCAQMD RULE 443.1 VOC'S:
Volatile Organic Components (VOC's) = Substances with vapor pressure of $\geq$ 0.5 mm Hg at 104°C (219.2°F).
This product contains < 1 % by weight VOC's.

OTHER REGULATORY INFORMATION:
EPA Hazard Categories: None

COMMENTS:
This product is an oil in the context of the U.S. Clean Water Act. Spills to U.S. surface waters, or to watercourse or sewer leading to U.S. surface waters, that cause a visible sheen must be reported to the National Response Center.

C.H.I.P. Regulations:

Designation:	**MED-4528**
Symbol:	N/A
Indication of Danger:	N/A
Safety Phrases: (Ref. Sect. 7)	S3/S7/S8/S24/S25/S41

16. OTHER INFORMATION

HMIS FORMAT:
Health: 1 Flammability: 1 Reactivity: 0

We believe that the information contained herein is current as of the date of this Material Safety Data Sheet, and is offered in good faith. Since the use of this information and of these opinions and the conditions of the use of the product are not within the control of NuSil Technology, it is the user's obligation to determine the conditions of safe use of the product.
-NuSil Technology Regulatory Compliance Department

Effective Date: January 12, 2004