



Revision date: Initial version

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Page: 1/12

**Trade name:** Nano Clean

### SECTION 1: Identification

**Product identifier used on the label:**

**Product Name:** Nano Clean

**Other means of identification:**

**Product Code Number:** NCC.

**Recommended use of the chemical and restrictions on use:**

**Recommended use:** Cleaner for Nano Mold Coating.

**Recommended restrictions:** Uses other than as recommended above.

**Name, address, and telephone number of the chemical manufacturer, importer, or other responsible party:**

**Company Name:** Nanoplas, Inc.  
**Company Address:** 2950 Prairie St., SW,  
Suite 900, Grandville, MI 49418  
**Company Telephone:** 616-452-3707  
08:30 -17:00 Eastern Standard Time (EST)  
**Company Contact Name:** John Hoff  
**Company Contact Email:** john@nanomoldcoating.com  
**Emergency phone number:** 616-452-3707 (24 hours)

### SECTION 2: Hazard(s) identification

**Classification of the chemical in accordance with paragraph (d) of §1910.1200:**

Skin corrosion, Category 1C.  
Serious eye damage, Category 1.

**GHS Signal word:** DANGER

**GHS Hazard statement(s):** Causes severe skin burns and eye damage.  
Causes serious eye damage.

**GHS Hazard symbol(s):**



**GHS Precautionary statement(s):** Do not breathe dusts or mists.  
Wash skin thoroughly after handling.  
Wear protective gloves/protective clothing/eye protection/face protection.  
If swallowed: Rinse mouth. Do NOT induce vomiting.  
If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.  
Wash contaminated clothing before reuse.  
If inhaled: Remove person to fresh air and keep comfortable for breathing.  
Immediately call a poison center/doctor.  
Specific treatment (see section 4 on this SDS and any additional information on this label)  
If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.  
Store locked up.  
Dispose of contents/container to a suitable treatment site in accordance with local/regional/national/international regulations.

**Hazard(s) not otherwise Classified (HNOC):** None known.

**Percentage of ingredient(s) of unknown acute toxicity:**  
13.5% of the mixture consists of ingredients of unknown acute toxicity (oral/inhalation).  
15.5% of the mixture consists of ingredients of unknown acute toxicity (dermal).

**SECTION 3: Composition/information on ingredients**

**Mixture:** Hazardous mixture.

Chemical name	CAS#	Concentration (weight %)
Glycol Ether	112-34-5	4 - 8%
Sodium Metasilicate	13517-24-3	4 - 6%
Benzensulfonic Acid	68584-22-5	3 - 5%
Proprietary Surfactant	Proprietary	2 - 5%
Sodium Hydroxide	1310-73-2	< 2%

Note: The balance of the ingredients are not classified as hazardous or are below the concentration limit to be classified as hazardous, under the criteria of the Federal OSHA Hazard Communication Standard 29CFR 1910.1200.

The specific chemical identity and/or exact percentage (concentration) of composition has been withheld as a trade secret due to the proprietary nature of some of the components.

**SECTION 4: First-aid measures**

**Description of necessary measures, subdivided according to the different routes of exposure, i.e., inhalation, skin and eye contact, and ingestion:**

**Inhalation:** Remove exposed person to fresh air if adverse effects are observed. Call a poison center or doctor if exposed or you feel unwell.

**Skin contact:** Wash with soap and water. Remove contaminated clothing. If skin irritation occurs, get medical attention. Launder contaminated clothing before reuse.

**Eye contact:** Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists, get medical attention.

**Ingestion:** Treat symptomatically. Get medical attention.

**Most important symptoms/effects, acute and delayed:** Causes severe skin burns and eye damage. May cause respiratory tract irritation.

**Indication of immediate medical attention and special treatment needed:** If any symptoms are observed, contact a physician and give them this SDS sheet.

## SECTION 5: Fire-fighting measures

### **Suitable (and unsuitable) extinguishing media:**

**Suitable extinguishing media:** Not flammable. Use extinguishing media suitable for type of surrounding fire such as carbon dioxide, dry chemical, or foam. Water can be used to cool and protect exposed material.

**Unsuitable extinguishing media:** No information available.

### **Specific hazards arising from the chemical (e.g., nature of any hazardous combustion products):**

Hazardous combustion products include smoke, carbon monoxide, carbon dioxide, sulfur oxides, aldehydes and other products of incomplete combustion.

**Special protective equipment and precautions for fire-fighters:** Wear self-contained breathing apparatus and protective clothing. Fight fire from a protected location. Wear self-contained breathing apparatus and protective clothing. In addition, wear other appropriate protective equipment as conditions warrant (see Section 8).

## SECTION 6: Accidental release measures

**Personal precautions, protective equipment and emergency procedures:** Protect people. Isolate area. Avoid contact with skin and eyes. Stop leak if it can be done safely. Wash exposed body areas thoroughly after handling. Wear appropriate protective equipment, such as gloves, goggles and protective clothing, as conditions warrant (see Section 8). See Sections 2 and 7 for additional information on hazards and precautionary measures.

### **Methods and materials for containment and cleaning up:**

Avoid contamination of drinking water, natural water, ground water or any waterway. Losses incidental to correct applications of this product in its intended uses are not expected to be harmful to the environment.

Collect spill and transfer to suitable properly labeled containers for recycling and/or disposal. Flush residue with plenty of water.

## SECTION 7: Handling and storage

**Precautions for safe handling:** Avoid breathing dust, fume, gas, mist, vapors or spray. Wash thoroughly after handling. Launder contaminated clothing before reuse. Dispose of packaging or containers in accordance with local, regional, national and international regulations.

**Conditions for safe storage, including any incompatibles:** Keep containers tightly closed in a dry, cool and well-ventilated place. Store only in approved containers. Protect from atmospheric moisture. Do not store near potential sources of ignition. See section 10 for incompatible materials.

**SECTION 8: Exposure controls/personal protection**

OSHA permissible exposure limit (PEL), American Conference of Governmental Industrial Hygienists (ACGIH) Threshold Limit Value (TLV), and any other exposure limit used or recommended by the chemical manufacturer, importer, or employer preparing the safety data sheet, where available.

<b>US OSHA HAZARDOUS COMPONENTS (29 CFR 1910.1200) (Table Z-1 Limits for Air Contaminants):</b>		
<b>Substance</b>	<b>PEL-TWA (8 hour)</b>	<b>PEL-STEL (15 min)</b>
Glycol Ether	No data available	No data available
Sodium Metasilicate	No data available	No data available
Benzensulfonic Acid	No data available	No data available
Proprietary Surfactant	No data available	No data available
Sodium Hydroxide	2 mg/m <sup>3</sup>	2 mg/m <sup>3</sup> (ceiling)

<b>US ACGIH Threshold Limit Values</b>		
<b>Substance</b>	<b>TLV-TWA (8 hour)</b>	<b>TLV-STEL (15 min)</b>
Glycol Ether	10 ppm	No data available
Sodium Metasilicate	No data available	No data available
Benzensulfonic Acid	No data available	No data available
Proprietary Surfactant	No data available	No data available
Sodium Hydroxide	2 mg/m <sup>3</sup>	2 mg/m <sup>3</sup> (ceiling)

**Appropriate engineering controls:** Use material in well-ventilated area only. Good general ventilation (typically 10 air changes per hour) should be sufficient in most cases. Ventilation rates should be matched to conditions. If exposure limits have not been established, maintain airborne levels to an acceptable level.

Use appropriate personal protective equipment and clothing to avoid skin contact.

**Individual protection measures, such as personal protective equipment:**

**Eye/face protection:** When handling solutions of the material use safety glasses as described by OSHA's eye and face protection regulations in 29 CFR 1910.133.

**Skin and hand protection:** Use good industrial hygiene practices to avoid skin contact. Use protective clothing impervious to this material. Handle with impervious gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

**Respiratory protection:** Use NIOSH/MSHA approved full face piece respirator with a High Efficiency Particulate Air (HEPA) filter if the recommended exposure limit is exceeded. Use self-contained breathing apparatus for entry into confined space, for other poorly ventilated areas and for large spill clean-up sites. Consult with an industrial hygienist to determine the appropriate respiratory protection for your specific use of this material. A respiratory protection program compliant with all applicable regulations must be followed whenever workplace conditions require the use of a respirator.

**General hygiene considerations:** Long sleeve shirt is recommended. Do not wear rings, watches or similar apparel that could entrap the material and cause a skin reaction. Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

**SECTION 9: Physical and chemical properties**

**Appearance (physical state, color, etc.):**

<b>Physical state:</b>	Liquid
<b>Color:</b>	Clear
<b>Odor:</b>	Neutral odor
<b>Odor threshold:</b>	Not available
<b>pH:</b>	Not determined
<b>Melting point/freezing point:</b>	100 °F
<b>Initial boiling point and boiling range:</b>	Not determined
<b>Flash point:</b>	> 338 °F COC (Minimum)
<b>Evaporation rate:</b>	Not determined
<b>Flammability (solid, gas):</b>	Not applicable
<b>Upper/lower flammability or explosive limits</b>	
<b>Flammability limit – lower (%):</b>	Not applicable
<b>Flammability limit – upper (%):</b>	Not applicable
<b>Explosive limit – lower (%):</b>	Not applicable
<b>Explosive limit – upper (%):</b>	Not applicable
<b>Vapor pressure:</b>	Not determined

**Vapor density:** Not determined  
**Relative density:** 0.89  
**Solubility (ies):** Complete in water, insoluble in other solvents.  
**Partition coefficient (n-octanol/water):** Not determined  
**Auto-ignition temperature:** Not determined  
**Decomposition temperature:** Not determined  
**Viscosity (dynamic):** 15.5 Centistokes (100 °C)

**SECTION 10: Stability and reactivity**

**Reactivity:** Material is not expected to be reactive.  
**Chemical stability:** Material is normally stable at moderately elevated temperatures and pressures.  
**Possibility of hazardous reactions:** Hazardous polymerization will not occur.  
**Conditions to avoid:** Not determined.  
**Incompatible materials:** Avoid contact with oxidizing agents.  
**Hazardous decomposition Products:** Smoke, carbon monoxide, carbon dioxide, aldehydes and other products of incomplete combustion. Under combustion conditions, oxides of the following elements will be formed: sulfur.

**SECTION 11: Toxicological information**

**Information on likely routes of exposure:**  
**Inhalation:** May be a route of entry.  
**Ingestion:** May be a route of entry.  
**Skin:** Expected to be a route of entry.  
**Eyes:** Expected to be a route of entry.

**Symptoms related to the physical, chemical, and toxicological characteristics:**  
Causes severe skin burns and eye damage. May cause nose, throat, and lung irritation. Swallowing material may cause irritation of the gastrointestinal lining, nausea, vomiting, diarrhea, and abdominal pain.

**Delayed and immediate effects and chronic effects from short or long-term exposure:**  
Chronic exposure may result in an increase in the severity of the symptoms described above.

**Numerical measures of toxicity (such as acute toxicity estimates):**

**Ingredient Information:**

Substance	Test Type (species)	Value
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## Nano Clean

Glycol Ether	LD <sub>50</sub> Oral (Rat)	7291 mg/kg
	LD <sub>50</sub> Dermal (Rabbit)	2764 mg/kg
	LC <sub>50</sub> Inhalation (Mouse)	No data available
Sodium Metasilicate	LD <sub>50</sub> Oral (Rat)	No data available
	LD <sub>50</sub> Dermal (Rabbit)	No data available
	LC <sub>50</sub> Inhalation (Mouse)	No data available
Benzenesulfonic Acid	LD <sub>50</sub> Oral (Rat)	> 5000 mg/kg
	LD <sub>50</sub> Dermal (Rabbit)	> 5000 mg/kg
	LC <sub>50</sub> Inhalation (Mouse)	> 1.9 mg/l (4hr)
Proprietary Surfactant	LD <sub>50</sub> Oral (Rat)	No data available
	LD <sub>50</sub> Dermal (Rabbit)	No data available
	LC <sub>50</sub> Inhalation (Mouse)	No data available
Sodium Hydroxide	LD <sub>50</sub> Oral (Rat)	No data available
	LD <sub>50</sub> Dermal (Rabbit)	No data available
	LC <sub>50</sub> Inhalation (Mouse)	No data available

**Skin corrosion/irritation:**

Based on data from components this product causes severe skin burns. Prolonged or repeated skin contact as from clothing wet with material may cause dermatitis. Symptoms may include redness, edema, drying, and cracking of the skin.

**Serious eye damage/eye irritation:**

Based on data from components this product causes severe eye damage.

**Respiratory sensitization:**

Not expected to cause respiratory sensitization.

**Skin sensitization:**

Not expected to cause skin sensitization.

**Germ cell mutagenicity:**

No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

**Carcinogenicity:**

No information available on the mixture, however none of the components are listed in the National Toxicology Program (NTP) Report on Carcinogens (latest edition) or has been found to be a potential carcinogen in the International Agency for Research on Cancer (IARC) Monographs (latest edition), or by OSHA.



**Reproductive toxicity:** No information available on the mixture, however none of the components have been classified for reproductive toxicity (or are below the concentration threshold for classification).

**Specific target organ toxicity- Single exposure:** No information available on the mixture, however none of the components have been classified for STOT SE (or are below the concentration threshold for classification).

**Specific target organ toxicity- Repeat exposure:** No information available on the mixture, however none of the components have been classified for STOT RE (or are below the concentration threshold for classification).

**Aspiration hazard:** No information available on the mixture, however none of the components have been classified for aspiration hazards (or are below the concentration threshold for classification).

**SECTION 12: Ecological information**

**Ecotoxicity (aquatic and terrestrial, where available):**

**Product data:** No data available.

**Ingredient Information:**

Substance	Test Type	Species	Value
Glycol Ether	LC <sub>50</sub>	Fish - Lepomis macrochirus	1300 mg/l - 96 h
	EC <sub>50</sub>	Daphnia magna (Water flea)	> 100 mg/l - 48 h
	EC <sub>50</sub>	Algae - Desmodesmus subspicatus (Scenedesmus subspicatus)	> 100 mg/l - 96 h
Sodium Metasilicate	LC <sub>50</sub>	Fish	No data available
	EC <sub>50</sub>	Daphnia	No data available
	EC/LC <sub>50</sub>	Algae	No data available
Benzenesulfonic Acid	LC <sub>50</sub>	Fish - Cyprinodon variegatus	> 10000 mg/L - 96h
	EC <sub>50</sub>	Daphnia	> 1000 mg/l - 48h

## Nano Clean

	EC/LC <sub>50</sub>	Algae - Pseudokirchnerella subcapitata	> 1000 mg/l - 96h
Proprietary Surfactant	LC <sub>50</sub>	Fish	No data available
	EC <sub>50</sub>	Daphnia	No data available
	EC/LC <sub>50</sub>	Algae	No data available
Sodium Hydroxide	LC <sub>50</sub>	Fish	No data available
	EC <sub>50</sub>	Daphnia	No data available
	EC/LC <sub>50</sub>	Algae	No data available

**Persistence and Degradability:** At least 25% of the components in this product show limited biodegradation based on OECD 302-type test data.

**Bioaccumulative Potential:** 1 - 10% of the components display no potential to bioconcentrate.

**Mobility in Soil:** Not established.

**Other adverse effects (such as hazardous to the ozone layer):** Avoid release to the environment.

### SECTION 13: Disposal considerations

#### Description of waste residues and information on their safe handling and methods of disposal, including the disposal of any contaminated packaging.

All disposal methods must be in compliance with all federal, state/provincial and local laws and regulations. Waste characteristics and compliance with applicable laws are the responsibility solely of the waste generator.

For unused and uncontaminated product, the preferred options include sending to a licensed, permitted, reclaimer, landfill or wastewater treatment system.

Contaminated packaging: Contaminated packaging may contain traces of the product and therefore should be disposed of in the same way as product.

### SECTION 14: Transport Information

#### US Department of Transportation Classification (49CFR)

Identification number	UN 3264
Proper shipping name	Corrosive Liquid, NOS (contains Sodium Metasilicate and Benzenesulfonic Acid)
Class / Division	8
Packing group	II
Bulk Quantity:	85000 KG, 187391 lbs.
Intermediate Quantity:	11000 KG, 24251 lbs.
Non-Bulk Quantity:	400 KG, 882 lbs.

## Nano Clean

### IMDG (Transport by sea)

Identification number UN 3264  
Proper shipping name Corrosive Liquid, NOS (contains Sodium Metasilicate and Benzenesulfonic Acid)  
Class / Division 8  
Packing group II

### IATA (Country variations may apply)

Identification number UN 3264  
Proper shipping name Corrosive Liquid, NOS (contains Sodium Metasilicate and Benzenesulfonic Acid)  
Class / Division 8  
Packing group II

### Environmental hazards

Marine pollutant: No.

### Transport in bulk (according to Annex II of MARPOL 73/78 and the IBC Code)

No further relevant information available.

### Special precautions which a user needs to be aware of, or needs to comply with, in connection with transport or conveyance either within or outside their premises.

No data available

## SECTION 15: Regulatory Information

### USA:

**United States Federal Regulations:** This SDS complies with the OSHA, 29 CFR 1910.1200. The product is classified as hazardous under OSHA.

**Toxic Substances Control Act (TSCA)** – All of the ingredients are listed on the U.S. EPA TSCA Inventory List.

**CERCLA Hazardous Substance List, 40 CFR 302.4:** None listed.

**Section 302 Extremely Hazardous Substance (40 CFR 355, Appendix A):** None listed

### SARA HAZARD DESIGNATION SECTIONS 311/312 (40 CFR 370):

Acute Health Hazard	YES
Chronic Health Hazard	NO
Fire Hazard	NO

Reactivity Hazard	NO
Sudden Release of Pressure Hazard	NO

**Section 313 Toxic Chemicals (40 CFR 372.65):** None listed

**STATE REGULATIONS:**

This SDS contains specific health and safety data is applicable for state requirements. For details on your regulatory requirements you should contact the appropriate agency in your state.

**California Proposition 65 (California Safe Drinking Water and Toxic Enforcement Act of 1986):** No components are listed on Prop 65.

**Massachusetts Right to Know:** Sodium hydroxide is listed on the Massachusetts Right to Know List.

**New Jersey Right to Know:** Glycol Ether, Disodium metasilicate nonhydrate and Sodium hydroxide are listed on the New Jersey Right to Know list.

**Pennsylvania Right to Know:** Glycol Ether, Disodium metasilicate nonhydrate and Sodium hydroxide are listed on the Pennsylvania Right to Know List.

**SECTION 16: Other Information**

Revision Date: Feb 08, 2016

**DISCLAIMER:** This document has been prepared in accordance with the SDS requirements of the OSHA Hazard Communication Standard 1910.1200. To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its subsidiaries assumes any liability whatsoever for completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.