

# MSDS- Voga Hard-Top

PAGE 1 / 8

VOGEL SYSTEMS Safety data sheet

Date /Revised: 19.09.2022

Product: **MSDS- Voga Hard-Top**

Version: 1.0

Date of print 20.09.2022

## 1. Identification

### Product identifier

**Voga Hard-Top**

### Relevant identified uses of the substance or mixture and uses advised against

Relevant identified uses: Product for construction chemicals Recommended use: for industrial and professional users



### Details of the supplier of the safety data sheet

E-mail address: [info@vogel-systems.de](mailto:info@vogel-systems.de)

### Emergency telephone number

International emergency number

VOGEL SYSTEMS Safety data sheet

Date /Revised: 19.09.2022

Product: **MSDS- Voga Hard-Top**

Version: 1.0

Date of print 20.09.2022

**1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING****1. Product identifier**Product name **Voga Hard-Top****2. Relevant identified uses of the substance or mixture and uses advised against**Identified uses : **Surface hardening compound for fresh concrete floors****3. Details of the supplier of the safety data sheet**Supplier

Company name : Vogel co.

E-mail address: [info@vogel-systems.de](mailto:info@vogel-systems.de)**2. COMPOSITION/INFORMATION ON INGREDIENTS****GHS Classification****Skin Irritation** – Category 2**Serious Eye Damage** – Category 1**Signal Word:** ☐ ☐ **Danger****GHS Pictogram:****Hazard Statements (H-codes):****H315** – Causes skin irritation**H318** – Causes serious eye damage**Precautionary Statements (P-codes):****P264** – Wash hands thoroughly after handling**P280** – Wear protective gloves and eye protection**P302 + P352** – IF ON SKIN: Wash with plenty of water**P305 + P351 + P338** – IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing**P310** – Immediately call a POISON CENTER or doctor**Other Hazards**

Product is highly alkaline and may cause burns to eyes or skin on prolonged contact.

May damage surfaces made of aluminum, zinc, or soft metals.

Does not meet criteria for PBT or vPvB under REACH.

VOGEL SYSTEMS Safety data sheet

Date /Revised: 19.09.2022

Product: **MSDS- Voga Hard-Top**

Version: 1.0

Date of print 20.09.2022

**3. COMPOSITION**

Component	CAS No.	Concentration (% w/w)	Classification
<b>Sodium silicate</b>	8-09-1344	%25–15	Skin Irrit. 2 (H315), Eye Dam. 1 (H318)
<b>Water</b>	5-18-7732	%85–75	Not classified

**Note:**

The formulation may contain minor proprietary performance additives in non-hazardous concentrations.

All components are either listed or exempt under applicable chemical inventory regulations (e.g., TSCA, REACH).

**4. FIRST AID MEASURES****Inhalation**

- Move the person to fresh air and keep at rest in a position comfortable for breathing.
- If symptoms such as coughing or throat irritation persist, seek medical attention.

**Skin Contact**

- Immediately remove contaminated clothing.
- Rinse affected skin thoroughly with water and wash with mild soap.
- If skin irritation persists or a rash appears, seek medical advice.

**Eye Contact**

- Rinse cautiously with clean, gently flowing water for at least 15 minutes, holding eyelids open.
- Remove contact lenses if present and easy to do, then continue rinsing.
- Seek **immediate** medical attention. Product may cause **serious and potentially permanent eye injury**.

**Ingestion**

- Rinse mouth with water. **Do not induce vomiting.**
- If the person is conscious, provide small sips of water.
- Seek medical attention if discomfort occurs.

**Notes to Physician**

- Treat symptomatically.
- Product is an alkaline silicate solution; may cause corrosive damage to mucous membranes or eyes.
- Consider irrigation or burn care if exposure is significant.

**5. FIRE FIGHTING MEASURES****• Suitable Extinguishing Media**

This product is non-flammable. Use extinguishing agents appropriate for the surrounding fire:

Water spray or fog  
Alcohol-resistant foam  
Dry chemical powder  
Carbon dioxide (CO<sub>2</sub>)

**• Unsuitable Extinguishing Media**

None known.

**• Specific Hazards Arising from the Chemical**

Product does not burn but may emit steam or mist when heated.

In fire conditions, decomposition of packaging or impurities may generate:

Carbon monoxide (CO)  
Carbon dioxide (CO<sub>2</sub>)  
Irritating or toxic fumes

- **Firefighter Protective Equipment and Precautions**

Wear full protective clothing and self-contained breathing apparatus (SCBA).

Cool containers with water spray to prevent pressure buildup from heat.

Prevent fire-fighting runoff from entering drains or waterways.

- **Additional Information**

Product may react with acids in fire conditions to form heat and gel-like silica.

Ensure containment of any spilled or leaking material post-fire to avoid environmental impact.

## 6. ACCIDENTAL RELEASE MEASURES

- **Personal Precautions**

Avoid contact with skin and eyes.

Ensure adequate ventilation.

Wear appropriate personal protective equipment (see Section 8):

- Chemical-resistant gloves

- Safety goggles or face shield

- Protective clothing

- **Environmental Precautions**

Prevent large quantities from entering drains, surface waters, or soil.

Notify local authorities if spill leads to environmental contamination.

- **Methods for Containment and Cleanup**

- **Containment:**

- Stop the source of the leak if safe to do so.

- Dike or contain spill using inert absorbent material (e.g., sand or earth).

- **Cleanup:**

- Absorb liquid with suitable non-combustible material.

- Collect into labeled, sealable containers for proper disposal.

- Rinse area with water and collect rinseate for pH adjustment (neutralize to pH 6–9) before disposal.

- **Reference to Other Sections**

For protective equipment: see Section 8

For disposal considerations: see Section 13

## 7. HANDLING AND STORAGE

### Handling

- Use only in well-ventilated areas.
- Avoid contact with skin, eyes, and clothing.
- Do not breathe mist or spray.
- Wear appropriate personal protective equipment (see Section 8).
- Do not mix with acids or incompatible materials unless specifically directed.
- Wash hands and exposed areas thoroughly after handling.
- Ensure containers are properly labeled and kept closed when not in use.

### Storage

- Store in original, tightly sealed containers.
- Keep in a cool, dry, and well-ventilated area at **5–35 °C**.
- Protect from freezing, direct sunlight, and excessive heat.
- Store away from strong acids, reactive metals (e.g., aluminum, zinc), and foodstuffs.
- Use on a first-in, first-out (FIFO) basis to ensure product quality.

### Shelf Life:

- 12 months from the date of manufacture under recommended storage conditions.

**8. EXPOSURE CONTROLS AND PERSONAL PROTECTION**

Substance	TWA (8h)	Source
Sodium silicate	None established	—
Alkaline mist (nuisance dust)	10 mg/m <sup>3</sup> (inhalable)	ACGIH TLV

- **Engineering controls:** Local exhaust ventilation
- **Respiratory:** Organic-vapour/particulate respirator if limits exceeded
- **Eye:** Splash-resistant goggles
- **Skin:** Nitrile or neoprene gloves; full protective clothing
- **Hygiene:** Wash hands before breaks and after work

**9. PHYSICAL AND CHEMICAL PROPERTIES**

Property	Value
Appearance	Clear to slightly hazy liquid
Odour	Odourless
Odour threshold	Not applicable
pH	11.0 – 12.5 (strongly alkaline)
Melting point / Freezing point	~0 °C (may be damaged by freezing)
Initial boiling point	>100 °C
Flash point	Not applicable (non-flammable)
Evaporation rate	Similar to water
Flammability (solid/gas)	Not applicable
Explosion limits	Not applicable
Vapour pressure	~23 mm Hg at 20 °C (water component)
Vapour density	Not determined
Relative density	1.20 – 1.35 g/cm <sup>3</sup>
Solubility in water	Fully miscible
Partition coefficient (n-octanol/water)	Not applicable (inorganic)
Auto-ignition temperature	Not applicable
Decomposition temperature	Not determined
Viscosity	<100 mPa·s (water-like)
VOC content	0 g/L (compliant with VOC regulations)

**10. STABILITY AND REACTIVITY****Reactivity**

- Alkaline aqueous solution; reacts exothermically with acids to form heat and insoluble silica gel.
- Can etch reactive metals such as aluminum and zinc.

**Chemical Stability**

- Stable under normal storage and handling conditions.

**Possibility of Hazardous Reactions**

- No hazardous polymerization expected.
- Contact with acids or reactive metals may release heat or hydrogen gas (in case of metal contact).

**Conditions to Avoid**

- Freezing temperatures (can destabilize product).
- Excessive heat or direct sunlight.
- Incompatible materials (see below).

**Incompatible Materials**

- Strong acids (e.g., hydrochloric, sulfuric)
- Ammonium salts
- Reactive metals (aluminum, zinc, magnesium)
- Organic peroxides and oxidizers

**Hazardous Decomposition Products**

- None under normal use.
- In fire or extreme heat:
  - Water vapor
  - Carbon oxides from packaging
  - Silica dust (if dried and abraded)
  - Irritating alkaline vapors or mist

**Note:** The product is chemically stable when stored and used as directed. Avoid unintended reactions with incompatible substances.

**11. TOXICOLOGICAL INFORMATION****• Acute Toxicity**

**Oral (rat):** LD<sub>50</sub> > 5,000 mg/kg (low toxicity)

**Dermal (rabbit):** LD<sub>50</sub> > 5,000 mg/kg (low toxicity)

**Inhalation (rat):** LC<sub>50</sub> > 5 mg/L (mist; not expected under normal use)

**• Skin Corrosion/Irritation**

**Category 2:** Causes skin irritation due to alkaline pH. May result in dryness, redness, or chemical burns upon prolonged or repeated contact.

**• Serious Eye Damage/Irritation**

**Category 1:** Causes serious eye damage. Risk of permanent eye injury if not promptly and thoroughly rinsed.

**• Respiratory or Skin Sensitization**

**Not classified:** No sensitizing effects reported under normal use.

**• Germ Cell Mutagenicity**

**Not classified:** No mutagenic effects reported in available studies.

**• Carcinogenicity**

**Not classified:** No ingredients listed by IARC, NTP, OSHA, or EU as carcinogens.

**• Reproductive Toxicity**

**Not classified:** No known effects on fertility or fetal development.

**• Specific Target Organ Toxicity – Single Exposure (STOT-SE)**

May cause respiratory irritation if high concentrations of mist or spray are inhaled.

**• Specific Target Organ Toxicity – Repeated Exposure (STOT-RE)**

**Not classified:** No long-term organ damage reported under expected use conditions.

**• Aspiration Hazard**

**• Not applicable:** Product is water-based and poses no aspiration risk.

**Note:** Direct eye exposure is the most serious hazard; always use appropriate PPE when handling the product.

**12. ECOLOGICAL INFORMATION**

- **Ecotoxicity**

- **Aquatic Toxicity:**

Sodium silicate is not classified as acutely toxic to aquatic life.

**LC<sub>50</sub> / EC<sub>50</sub> (fish, Daphnia, algae):** > 100 mg/L (estimated)

High pH may cause **localized harm** to aquatic organisms if released in large quantities.

- **Persistence and Degradability**

Product is **inorganic and not biodegradable**.

Silicates will eventually precipitate and bind with soil or minerals, forming stable compounds.

- **Bioaccumulative Potential**

- **Not bioaccumulative**

Log K<sub>ow</sub> < 1 (for sodium silicate)

- **Mobility in Soil**

High mobility when diluted in water.

Reacts with CO<sub>2</sub> and minerals to form immobile silica gel or calcium silicate in soil.

- **Other Adverse Effects**

• **Not classified** as PBT (Persistent, Bioaccumulative, Toxic) or vPvB under REACH.

No ozone-depleting substances present.

• **Environmental Note:** Avoid uncontrolled release to surface water or storm drains. Neutralize large spills and manage wastewater appropriately.

**13. DISPOSAL CONSIDERATIONS**

- **Waste Treatment Methods**

- **Unused Product / Liquid Waste:**

Do **not** dispose of directly into drains, sewers, or natural waterways.

Collect in suitable containers and dispose of through a licensed hazardous or industrial waste contractor.

Neutralize to pH 6–9 prior to disposal if allowed by local regulations.

- **Used or Contaminated Product:**

Allow any excess material to fully cure into a solid form (by reaction with CO<sub>2</sub> or drying).

Dispose of cured product as non-hazardous construction waste, following local rules.

- **Rinse Water / Wash Solutions:**

Should be collected and **pH-adjusted to 6–9** before disposal to sewer (if permitted).

Manage as industrial wastewater in accordance with municipal or environmental authority requirements.

- **Packaging:**

Triple-rinse empty containers.

Recycle containers if facilities are available, or dispose of as non-hazardous waste after thorough rinsing.

Do not reuse containers for food or drink storage.

- **Regulatory Considerations**

Comply with Egypt's Environmental Law No. 4/1994 and all relevant local waste management regulations.

Large-scale industrial users should maintain disposal documentation and use authorized waste handling services.

**Note:** Always dispose of product and packaging responsibly and in accordance with national and local regulations.

VOGEL SYSTEMS Safety data sheet

Date /Revised: 19.09.2022

Product: **MSDS- Voga Hard-Top**

Version: 1.0

Date of print 20.09.2022

**14. TRANSPORT INFORMATION**

Mode of Transport	UN Number	Proper Shipping Name	Transport Hazard Class	Packing Group
Road / Rail (ADR/RID)	Not regulated	Not classified as dangerous goods	—	—
Sea (IMDG)	Not regulated	Not classified as dangerous goods	—	—
Air (IATA/ICAO)	Not regulated	Not classified as dangerous goods	—	—

**15. Regulatory Information****GHS Classification (Egypt / EU)****Hazard Classes:**

Skin Irritation – Category 2

Eye Irritation – Category 2A

STOT SE (Respiratory Irritation) – Category 3

**Signal Word:** Warning**Pictogram:****Hazard Statements:**

H315: Causes skin irritation

H319: Causes serious eye irritation

H335: May cause respiratory irritation

**European Union (REACH/CLP)**

All components are either registered under REACH or exempt.

Product classified and labelled according to Regulation (EC) No 1272/2008 (CLP).

**United States (OSHA / TSCA / SARA)****TSCA:** All ingredients are listed or exempt.**OSHA HCS (29 CFR 1910.1200):** Product is considered hazardous.**Egyptian Regulation****Environmental Law No. 4/1994 (and amendments):**

Requires proper classification, labelling, and waste handling for chemical substances.

Compliance with national disposal and emissions standards is mandatory.

**GHS Implementation:** Egypt aligns with GHS Rev. 6 standards for classification and labelling.**Other International Inventories****Canada (DSL/NDSL):** All components listed.**Australia (AICS):** All components listed.**16. OTHER INFORMATION**

DISCLAIMER OF LIABILITY The information in this SDS was obtained from sources which we believe are reliable. However, the information is provided without any warranty, express or implied, regarding its correctness. The conditions or methods of handling, storage, use or disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product. This SDS was prepared and is to be used only for this product. If the product is used as a component in another product, this SDS information may not be applicable