



WHEN THE **HEAT** IS ON, KEEP YOUR COOL WITH **AVS!**

## Safety Data Sheet (SDS)

**SDS-104**  
**May 2019**

### Product: AVSil® Silica Twisted Rope (TR) & AVSil® Silica Braided Rope (BR)

#### 1. Chemical Product and Company Identification

**Trade Name:** AVSil® Silica Rope, TR & BR

**Synonyms:** TR-H-1/4, TR-H-3/8, TR-H-1/2, TR-H-3/4,  
TR-H-1, BR-H-1/4, BR-H-3/8, BR-H-1/2,  
BR-H-5/8, BR-H-3/4, BR-H-1

**Manufacturer:**

AVS Industries LLC  
21 Bellecor Drive  
Unit C  
New Castle, DE 19720

Phone Product Information (302) 221-1720  
Revision Date: May 31, 2019

#### DESCRIPTION

**No Hazard Rating is available for this Product**

#### 2. Hazard Identification

**Emergency Overview:**

Off-White or tan colored flexible woven fabric with no odor.

**Effects of Overexposure:**

**Eye Contact:** Slight irritation may be caused in contact with eyes.

**Skin Contact:** Temporary irritation of skin may be produced.

**Inhalation:** Inhalation of airborne fibers may cause irritation to the mouth, nose and throat.

**Ingestion:** May cause temporary irritation of the digestive tract, but not an expected route of entry in industrial uses.

**Chronic Hazards:** There are no known chronic health effects associated with the use of this product under normal working conditions.

**Primary routes of entry:** Skin contact, inhalation, ingestion & eye contact.

**Carcinogenicity Information:** None of the components present in this material at concentrations equal to or greater than 0.1% are listed by IARC, NTP, OSHA, or ACGIH as a carcinogen.

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**3. Composition and Information on Ingredients**

<b>Ingredients(s)</b>	<b>CAS Number</b>	<b>Approx. Percent</b>
Amorphous Silica	7631-86-9	96%

**4. First Aid Information**

Eye Contact: Flush eyes immediately with large amounts of water for at least 15 minutes holding eyelids open while flushing. Seek medical attention promptly.

Skin Contact: Wash contaminated skin thoroughly with mild soap and cool water. Seek medical attention if irritation persists.

Inhalation: Remove person from source of exposure and then seek medical attention immediately.

Ingestion: Seek medical attention immediately.

**5. Fire Fighting Measures**

Flash Point: N.A.

Lower Explosive Limit (%): N.A.

Upper Explosive Limit (%): N.A.

Autoignition Temperature: N.D.

Extinguishing Media: Carbon dioxide, water, foam or dry chemical as suitable for type of surrounding fire.

Unusual Fire & Explosion Hazards: During sustained fire irritating and/or toxic gases may be generated by combustion.

Fire Fighting Instructions: Wear full fire fighting protective equipment including self-contained breathing apparatus.

**6. Accidental Release Measures**

Step to be taken in case material is released or spilled:

Dust or loose fibers can be vacuumed or swept with the aid of a dust suppressant.

Dispose according to federal, state, and local environmental regulations.

**7. Handling and Storage**

Keep material in a clean dry place, and keep container closed.

Particular care should be taken when working with "used" material to minimize dust. If exposure limits are exceeded or if irritation is experienced, NIOSH approved respiratory protection should be worn.

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**8. Exposure Controls and Personal Protection**

**ENGINEERING CONTROLS:**

Ventilation: General ventilation and/or local exhaust ventilation should be utilized to maintain exposures below the TLV.

Respiratory Protection: Use an approved disposable dust respirator designed for nuisance type dusts.

Eye Protection: Safety glasses with side shields or chemical splash goggles must be worn to prevent eye contact. A good safety practice is to have an eyewash station readily available near the work area.

Protective Clothing: Wear rubber gloves when handling this product. Personnel that are more susceptible to irritation from fibers or dusts should wear full-body coveralls.

Hygienic Practices: Use good personal hygiene practices. The use of protective creams before handling the material may prove beneficial.

**EXPOSURE LIMITS:**

Amorphous Silica

PEL (OSHA) 80mg/m<sup>3</sup> ÷ % SiO<sub>2</sub> or 20 mppcf

TLV (ACGIH) 10 mg/m<sup>3</sup> (inhalable); 3 mg/m<sup>3</sup> (respirable)

NIOSH 6 mg/m<sup>3</sup>

IDHL 3000 mg/m<sup>3</sup>

**9. Physical and Chemical Properties**

Physical and Chemical Properties of Base Silica Rope Only

**PHYSICAL DATA:**

Boiling Point: 4046° F

Melting Point: >3000° F

Solubility in Water: Insoluble

Vapor Pressure: N.D.

Vapor Density: N.D.

Specific Gravity: 2.2

Color: Off-white or tan colored

Odor: None

Physical State: Twisted or Braided Rope

**10. Stability and Reactivity**

Chemical Stability: Product is stable at normal temperature and storage conditions.

Incompatibilities: Basic phosphates, hydrofluoric acid, and some oxides and hydroxides.

Hazardous Polymerization: Hazardous polymerization will not occur under normal conditions.

Hazardous Combustion and Decomposition Products (Coating Only): Oxidation of the coating produces carbon monoxide and carbon dioxide.

**11. Toxicological Information**

Material which has been subjected to elevated temperatures (>1800°F) may undergo partial conversion to cristobalite, a form of crystalline silica, which may cause respiratory illness. The amount of cristobalite present will depend on the temperature and length of service. The OSHA PEL for cristobalite is 0.05 mg/m<sup>3</sup> (respirable).

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**12. Ecological Information**

No information is available; however, toxicity is expected to be low based on the insolubility in water of the product.

**13. Disposal Considerations**

Dispose of waste material in accordance with applicable federal, state, and local environmental regulations.

**14. Transportation Information**

DOT Proper Shipping Name: Silica Rope  
DOT Hazardous Class: None  
DOT UN/NA Number: None  
Emergency Response Guide Number: None

**15. Regulatory Information**

U.S. FEDERAL REGULATIONS AS FOLLOWS:

SARA Section 313: This product contains the following substances subject to the reporting requirements of Section 313 of Title III of the Superfund Amendment and Reauthorization Act of 1986 and 40 CFR Part 372: None

TSCA: The chemical substances in this product are on the TSCA Section 8 Inventory.

EXPORT NOTIFICATION: This product contains the following chemical substances subject to the reporting requirements of TSCA 12(B) if exported from the United States: None

INTERNATIONAL REGULATIONS AS FOLLOWS:

Canadian WHMIS: This MSDS has been prepared in compliance with Controlled Product Regulations except for the use of the 16 headings.

Canadian WHMIS CLASS: Not Regulated.

DSL: The chemical substances in this product are listed on the Domestic Substances List (DSL).

**16. Other Information**

This Material Safety Data Sheet was revised in its entirety in May 2019.

ABBREVIATIONS:

- 1) ACGIH – American Conference of Governmental Industrial Hygienists
- 2) OSHA – Occupational Safety and Health Administration
- 3) NIOSH – National Institute of Occupational Safety and Health
- 4) IARC – International Agency for Research on Cancer
- 5) NTP – National Toxicology Program
- 6) TLV – Threshold Limit Value
- 7) PEL – Permissible Exposure Limit
- 8) TWA – Time Weighted Average
- 9) STEL – Short Term Exposure Limit
- 10) IDHL – Immediately Dangerous to Life or Health
- 11) N.A. – Not Applicable
- 12) N.D. – Not Determined
- 13) N.E. – Not Established
- 14) DSL – Domestic Substances List

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