

#### EU safety data sheet according to (EG) Nr. 1907/2006

**Product name:** Aerogel Composite Noncombustible Insulation Board AG-BRP2

Current version: 1.0.0, issued: 28.04.2023 Replaced version: -, issued: -

SECTION 1: Identification of the substance/mixture and of the company/undertaking

#### 1.1 Product identifier

**Product name:** Aerogel Composite Noncombustible Insulation Board AG-BRP2

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

Zhou Global Sourcing GmbH Bocksgasse 11 73525 Schwäbisch Gmünd Telephone no. +49 (0) 7171 9059 799 e-mail info@insulation1.de

# 1.3 Emergency telephone number GERMANY: CHEMTREC 0800-181-7059

#### SECTION 2: composition of the substance or mixture

Chemical Name	CAS No.	weight-%
Modified Silica Aerogel	102262-30-6	1-5%
Polystyrene Foam	9003-53-6	8-15%
Silicon Powder	69012-64-2	10-20%
Cement	65997-15-1	55-70%

#### SECTION 3: Hazard statements

#### Health Hazards:

According to the National "List of Hazardous Chemicals" and "GB 6944-2005 Classification and Code of Dangerous Goods Names," this product is not classified as a hazardous substance or mixture.

According to the European Commission's "Registration, Evaluation, Authorization, and Restriction of Chemicals" (REACH), this product is not classified as a hazardous substance or mixture.

### **Carcinogenicity:**

Component	ACGIH	IARC
Modified Silica Aerogel	None	None
Polystyrene Foam	None	None
Silicon Powder	None	None
Cement	None	None

ACGIH: American Conference of Governmental Industrial Hygienists Standard; IARC: International Agency for Research on Cancer, comprehensive evaluation of 900 factors and exposure locations for human carcinogenicity.

Eye contact:	Lift eyelids and flush with flowing water or saline solution, seek medical
	attention.

**Skin contact:** The product may cause dryness of the skin, wash with water.

Ingestion:This product is not for consumption. In case of large ingestion, it may<br/>cause irritation or blockage of the digestive tract. Seek medical attention.

Inhalation: Inhalation of product dust can irritate the upper respiratory tract.

# **Environmental hazards:**

According to the National Hazardous Waste List, this product poses no harm to the environment.

#### SECTION 4: First aid measures

Eye contact:	Lift eyelids and flush with plenty of water for at least 15 minutes. If irritation persists, seek medical attention.
Skin contact:	Remove contaminated clothing and shoes, thoroughly wash the skin with soap and plenty of water. Use clean clothing after washing.
Ingestion:	If discomfort occurs, seek medical attention immediately.
Inhalation:	Move to fresh air. If discomfort persists, seek medical attention immediately.

SECTION 5: Fire-fighting measures

Self-ignition point:	Not applicable.
Flashpoint:	Not applicable.
Upper explosion limit:	Not applicable.
Lower explosion limit:	Not applicable.

#### Hazardous combustion products:

In the event of a fire, the main combustion products are CO2, CO, and H2O.

# **Firefighting methods:**

Firefighters must extinguish the fire according to standard procedures, wearing protective clothing, and fighting the fire from upwind to avoid inhaling harmful smoke. Use appropriate firefighting facilities suitable for the surrounding environment.

# Suitable extinguishing agents:

Dry powder, foam, mist water, or carbon dioxide.

### **Firefighting precautions:**

This product has good thermal insulation properties, and the heat inside the roll material can cause secondary combustion if not promptly eliminated.

### SECTION 6: Leak and Spill Emergency Handling

#### 6. 1 **Personal protective measures:**

Wear chemical protective clothing and a dust mask (full-face respirator).

# 6. 2 Emergency handling:

The product is insoluble in water, so it is strictly prohibited to discharge large amounts into domestic water or drainage systems to avoid pipeline blockage.

#### 6. 3 **Precautions**:

Avoid generating dust as much as possible during cleaning. Vacuum cleaners are recommended for cleaning.

#### SECTION 7: Handling and storage

#### 7.1 Handling

During the use of aerogel composite non-combustible insulation boards, dust may be generated. Strict adherence to occupational health standards is required to control the amount of dust in the workplace. As aerogel dust is hydrophobic, it is recommended to use a vacuum cleaner for cleaning. It is advisable for operators to wear designated dust masks, safety goggles, and gloves and avoid contact with the skin, eyes, or clothing. Thoroughly clean up after handling.

#### 7.2 Storage

Store in a cool, dry, well-ventilated warehouse. It is best not to unpack the packaging of the aerogel composite non-combustible insulation boards before use to reduce dust generation. Waste materials after cutting should be disposed of promptly.

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

Engineering controls:	Ensure comprehensive ventilation during the production process. Minimize dust levels as much as possible. Provide safety showers and washing facilities.
Respiratory protection:	It is recommended to wear a self-contained breathing apparatus with a dust filter.
Eye protection:	Wear chemical safety goggles.
Skin protection:	Wear standard work clothing.

Hand protection: Wear regular rubber gloves.

Other protection:No smoking, eating, or drinking in the workplace. Hands should be<br/>washed before meals. After work, take shower and change clothes.<br/>Contaminated clothing should be stored separately and used after<br/>washing. Maintain good hygiene practices.

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SECTION 9: Physical and chemical properties

Appearance and character	Gray, board-like
Solubility	Insoluble in water and any solvents.
Relative density (water=1)	Not applicable
рН	Not applicable
Melting Point	Not applicable
Boiling Point	Not applicable
Saturated vapor pressure (kPa)	Not applicable
Main use	Thermal insulation

# SECTION 10: Stability and reactivity

Chemical stability	Stable under normal operating, usage, and transportation	
	conditions.	
Incompatible materials	Solvents	
Conditions to avoid contact	High temperatures above the operating temperature,	
	open flames.	
Polymerization hazard	None	
Oxidation, decomposition	Oxidation can produce small amounts of CO, CO <sub>2</sub> , and	
products	H <sub>2</sub> O.	

# SECTION 11: Toxicological information

Acute Toxicity:	Dust may cause irritation to the eyes and skin and a drying sensation.
Eye irritation:	Not irritating to the eyes under experimental conditions, but long-
	term repeated use may cause dryness.
Skin irritation:	Not irritating to the skin under experimental conditions, but long-
	term repeated use may cause dryness.
Reproductive toxicity:	None.
Carcinogenicity:	None.
Mutagenicity:	None.
Teratogenicity:	None.

SECTION 12: Disposal Considerations

Disposal method:	Not classified as hazardous waste, it can be disposed of in accordance with regulations, similar to other industrial waste, through landfilling.
Dangerous goods number:	Not regulated for transportation.
Danger class:	None.
UN number:	None.
Packaging category:	None.
Packaging marking:	None.
Packaging method:	Double-layer plastic bags.
Transportation precautions	Maintain the integrity of the packaging as much as possible, avoid dust, and strictly prohibit mixing and transporting with organic solvents. When stopping midway, keep away from open flames and heat sources. Follow the designated routes for road transportation.

# SECTION 13: Regulatory Information

#### **Reference regulations:**

Regulations for the Safe Use of Chemicals in the Workplace (Ministry of Labor Announcement [1996] No. 423)

Regulations on the Safety Management of Hazardous Chemicals (State Council Decree No. 344)

National List of Hazardous Wastes (Circular on Environmental Protection [2008])

List of Hazardous Chemicals (2002 Edition)

B 6944-2005 Classification and Numbering of Hazardous Goods

Registration, Evaluation, Authorization and Restriction of Chemicals (REACH)

American Conference of Governmental Industrial Hygienists (ACGIH)

International Agency for Research on Cancer (IARC)

## SECTION 14: Other Information

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Zhou Global Sourcing GmbH shall not be held liable for any damage resulting from handling of or contact with the above product.