



## TECHNICAL DATA

**Product name:** Modified Synthesis of Amorphous Silica Aerogel Slurry

**Current version:** 1.0.0, **issued:** 22.02.2023 **Replaced version:** -, **issued:** -

### Product description

<b>Brief description</b>	AG-SWJ Aerogel slurry for composite thermal insulation products is made of high-performance SiO <sub>2</sub> aerogel as the main raw material, combined with an inorganic high-temperature binder, and adopts a unique special process to disperse hydrophobic SiO <sub>2</sub> aerogel particles in an aqueous medium to prepare a highly efficient thermal insulation High-performance slurry. This product perfectly solves the dust problem of aerogel during use and transportation, and retains the structure of the aerogel to the greatest extent.
<b>Material type</b>	Viscous lotion or paste
<b>Colour</b>	White/grey
<b>Product features</b>	<ol style="list-style-type: none"><li>(1) Excellent thermal insulation performance: the thermal conductivity at room temperature can be as low as 0.025W/m·k.</li><li>(2) Class A2 Flame retardant performance.</li><li>(3) Good viscosity, suitable for secondary composite insulation products.</li><li>(4) Environmental protection: The product is composed of inorganic materials, does not contain harmful substances to the human body, and is safe and reliable.</li></ol>
<b>Applications</b>	Composite insulation materials such as tube shells and fiber materials.

### Technical parameters

Property	Value/Assessment
Package	Barreled
Color	White/gray
Shape	Viscous lotion or paste
Thermal conductivity after drying [ W/(m·K) ]	≤ 0.025 ~ 0.030 (at 25°C)
Flame retardant [ level ]	A2
Density [ kg/m <sup>3</sup> ]	400 ~ 600 (wet slurry) 200 ~ 300 (dry slurry)
Grain size [ μm ]	15/50
Aerogel solid content [ % ]	7 ~ 12
Temperature resistance range [ °C ]	<400
Shelf life	6 months

### Transportation and storage

The products are carried out according to the general transportation method, and should be protected from rain and exposure during transportation. When storing the product, keep the package tightly sealed, and ensure that it is dry, ventilated and avoid direct sunlight. The storage temperature is 5°C ~ 35°C.

### Operation requires attention Matters

1. before the slurry is used, there is a layered liquid at the bottom, which is normal, and it can be used after stirring evenly.
2. For the liquid at the bottom of the slurry, customers can adjust the viscosity according to their needs, or add no more than 20% of water to adjust the viscosity.
3. When the slurry becomes dry or the viscosity is high due to external reasons, dust may be generated during operation, which is normal.
4. When there is dust in the operation, the customer can first use the liquid at the bottom of the slurry, or add no more than 50% of water to cover the surface of the wet slurry, then slowly stir to become a wet slurry, and finally high-speed stirring can be used.
5. After use, the slurry must be sealed and kept away from light in an environment below 35°C.

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6. The slurry can be used in alkaline or acidic environment, but it is not suitable to be mixed with organic solvents in large quantities.
7. The addition amount of aerogel slurry in coatings or composites ranges from 35% to 70%.

Note: The product technical information and related data described in the above materials are the experimental test values of our company, which are for reference only, not as legal interpretation and guarantee. Before use, please use it after testing and confirmation according to the working conditions required by your company.