



Silene® 732D

Semi Reinforcing Silica for Rubber

Silene® 732D is a synthetic, white, amorphous silicon dioxide powder used in black and non-black rubber compounds as a semi-reinforcing filler and /or extender.

Silene® 732D Typical Properties and Characteristics

Specific Surface Area, BET-1	Surface Area, BET-5	pH	Na ₂ SO ₄	Apparent Tamped Density	Physical Form
35 m ² /g	33 m ² /g	8.5	2% Max	240 g/L	Powder

Registration Number

CAS No. 112926-00-8	synthetic precipitated amorphous silica
CAS No. 7631-86-9	TSCA Chemical Substance Inventory (SiO ₂)
231-545-4	European EINECS

Mechanical Rubber Goods

The benefits of using Silene® 732D in colored hose cover, wire insulation, sporting goods, and cable jacketing applications are fast extrusion and calendaring, firmness of uncured stocks, smooth surfaces, flexibility, and resilience.

◆ Excellent processing and flow

Silene® 732D is the lowest surface area product in the Hi-Sil® silica family of products. Because of its lower surface area, Silene® 732D does not exhibit the increase in stiffness and processing viscosity normally encountered with higher surface area silica products.

◆ Faster curing

Rubber compounds using Silene® 732D exhibit cure rates much faster than those compounds using higher surface area silica products. Lower surface area silica is typically less reactive to amines and zinc oxide that can reduce accelerator and activator effectiveness.

◆ Improved extruding, calendaring, and dynamic properties

Finished compounds utilizing Silene® 732D exhibit smooth consistent appearance, low compression set and improved dimensional stability. Extruded products typically have smooth glossy surfaces, flexibility, and resilience not characteristic of clays and talcs.

Rubber Processing Recommendations

For powder product forms, it is recommended that the silica be added as early as possible in the mixing schedule ideally with the polymer addition and before the process oil. This allows time for silica incorporation into the polymer.

For high powder loading split additions are recommended, first addition with the polymer/s, and the second with the process oil.

Split oil additions are recommended to keep viscosity high. Viscosity aids in silica dispersion.

Note: Silica incorporation time and degree of dispersion in rubber will vary based on internal mixer type and rotor design.

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80 S. Seiberling Street • Akron, Ohio 44305

Silene® 732D

Packaging

Silene® 732D is packaged in 44 pound multi-wall kraft paper bags. The bags are palletized and stretch wrapped in clear plastic film. Shipments can be made in truckloads or railcars. Bulk shipments are also available in flexible intermediate bulk containers (FIBC).

Storage

To ensure product integrity PPG recommends that our silica products be stored under dry, clean conditions and protected against exposure to other substances. Since silica may pick up moisture we also recommend that products that are stored more than one year, from date of manufacture, be re-tested for moisture content. There is no shelf life limit when stretch-wrapped palletized units or bags are kept under the above stated conditions.

Safety and Health Effects

PPG Industries Inc. is committed to safe handling of chemicals at every step of the process, from manufacturing and distribution through education of the end user. Our participation in the American Chemistry Council's *Responsible Care*® Program is evidence of our commitment to the health, safety and welfare of our employees and the industry. PPG Industries Inc. recommends thoroughly reading and understanding the product labels, Material Safety Data Sheets, and other safety information about the product prior to use or handling. Product health and safety information should be made available to your employees and customers.

Samples and Service

PPG's Technical Service Specialists are available for consulting on the use, handling and storage of Silene® 732D.

Gallon containers and bag-size samples are available upon request from Technical Service.



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Technical Service: 1-800-764-7369



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