

CAB-O-SPERSE® PG 022

CAB-O-SPERSE® PG 022 is an aqueous dispersion of Cabot's fumed silica which has been surface-treated with an organic treating agent which reverses the charge on the particles from negative to positive.

CAB-O-SPERSE aqueous dispersion are characterized by:

- Low viscosity
- High solids loading
- Median particle diameter less than 0.2 microns

Application Information:

Inkjet Media

CAB-O-SPERSE aqueous dispersions of SpectraI™ fumed alumina and CAB-O-SIL® fumed silica are used in microporous coatings for inkjet printing. Microporous coatings enable instant dry printing, a significant improvement over slow drying polymer swellable coatings. The high adsorptive capacity of fumed silicas provide fast adsorption of inks and rapid drying speed. Unlike untreated fumed silicas which have a negative surface charge, the silica particles in PG 022 have a positive surface charge which results in good ink adhesion. Microporous coatings formulated with PG 022 have good gloss and optical properties.

Performance Comparison in Microporous Coatings:

Particles	<u>Alumina</u> SpectraI 51 and 81	<u>Cationic Silica</u>	<u>Silica</u> CAB-O-SIL M-5, MS-55 and HS-5
Dispersions	CAB-O-SPERSE PG 003 and PG 008	CAB-O-SPERSE PG 022	CAB-O-SPERSE PG 001 and PG 002
Gloss	Excellent	Very Good	Good
Drying Speed & Ink Absorption	Excellent	Excellent	Excellent
Humidity Fastness (Ink Adhesion)	Excellent	Excellent	Good
Dark Fastness (Ozone Fading)	Poor	Poor	Poor
Optical Properties	Good	Very Good	Good
Coatability	Excellent	Good	Good





Packaging, Storage and Handling: Product Sales Specifications:

CAB-O-SPERSE PG 022 is available in 5 gallon pails, 55 gallon plastic drums and 1000 liter returnable bulk containers (totes). CAB-O-SPERSE dispersions must be protected from freezing during shipping and storage. Freezing can cause irreversible coagulation of particles leading to deterioration in performance. This dispersion is colloidally stable for a period of one year. A small amount of sedimentation is normal and dispersions do not need to be shaken or stirred prior to use. Evaporation should be prevented by keeping containers closed when not in use.

Sales specifications for this product may be obtained by contacting a sales or technical service manager at the Cabot Corporation office in your region.

Material Safety Data Sheet:

A Material Safety Data Sheet for this product may be obtained by contacting the Cabot Corporation office in your region or can be downloaded from our website:

www.cabot-corp.com

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