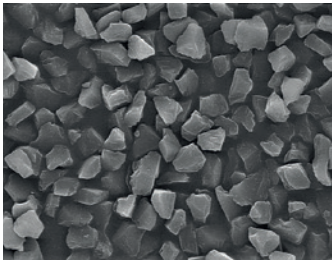




Lapping and polishing slurries

Colloidal silica slurry

ULTRA-SOL® STD0.5µ20MCH



ULTRA-SOL® diamond colloidal blends are excellent intermediate polishes on hard substrates such as SiC.



Pureon ready-to-use slurries are available in customer-tailored formulations in a wide range of viscosities.

ULTRA-SOL® monocrystalline diamond colloidal blends for polishing hard substrates

ULTRA-SOL® diamond slurries are unique, neutral pH, water-based suspensions of premium diamond particles. They offer the tightest control of overall particle size distribution, with tight control of large particles. The slurries use Pureon' proprietary suspension chemistry, creating an agglomerate free, homogenous suspension regardless of particle size. They also feature a viscosity that is capable of being pumped or sprayed, and the slurries may also be used in applications where a fine surface quality is desired in a final polish application.

ULTRA-SOL® diamond suspensions have been successfully used to obtain superior finishes in a wide variety of applications including: crystals and substrates such as sapphire, silicon carbide, boron carbide, tool and mold polishing, metallographic specimen preparation, ceramics and composites polishing, magnetic head assembly fabrication, lapping of overcoat alumina.

Product specifications

Base materialDiamond
 Shelf life.....12 months
 ApplicationsCeramic, sapphire, silicon carbide

Order code	Base material	Particle size [µm]	pH	Concentration [cts/gal]	Specific gravity
ULTRA-SOL® STD0.1µ50M	Diamond	0.1	8.5	50	1.03
ULTRA-SOL® STD0.5µ20MC	Diamond	0.5	8.5	20	1.03
ULTRA-SOL® STD0.5µ20MCH	Diamond	0.5	8.5	20	1.03
ULTRA-SOL® STD0.5µ50M	Diamond	0.5	8.5	50	1.03
ULTRA-SOL® STD1µ55P	Diamond	1.0	8.5	55	1.03
ULTRA-SOL® STD3µ100M	Diamond	3.0	8.5	100	1.14
ULTRA-SOL® STD6µ115P	Diamond	6.0	8.5	115	1.03
ULTRA-SOL® STD9µ50MC	Diamond	9.0	8.5	50	1.03
ULTRA-SOL® STD9µ130M	Diamond	9.0	8.5	130	1.03

Contact

sales@pureon.com

www.pureon.com/sales-contacts

Order information**Packing**

1 gal jugs, 5 gal pail, and 55 gal drums. Other sizes available upon request.

Unit of measure

Gallon [gal]

Highlights

- Tightly distributed and controlled diamond abrasives
- Industry-leading suspension chemistry will remain stable for six months with no agitation
- Addition of semiconductor grade colloidal silica facilitates wafer cleaning, improves surface quality, and reduces scratches
- Dilutable to tune process to desired friction level and removal rate controlled diamond abrasives



Pureon offers a wide range of customized solutions. More information can be found on www.pureon.com/products/overview

Instructions**Safety**

To avoid skin or eye irritation, use appropriate personal protective equipment according to MSDS. Follow all MSDS, Safety datasheet, label precautions and industrial safety and hygiene practices when handling or using this product.

Homogenization

For consistent performance, ensure that the suspension is completely homogenized prior to use. Suspensions can separate if stored over extended periods of time and if exposed to variable temperatures.

Dilution

This slurry is designed as a ready-to-use product directly from the container. If the slurry is to be used in a diluted form, use only high-quality deionized water (> 18 M ohm) for the dilution. The product should be mixed periodically (10 to 20 minutes per day) by recirculation or mechanical stirring to ensure that the particles are uniformly suspended. To avoid possible scratching issues, storage and re-use of on-site diluted slurry is not recommended without proper mixing and filtration.

Due to the unique formulation of this slurry, pH adjustment is not recommended. For a different pH, please contact your Pureon representative.

Storage

Recommended 8 °C – 33 °C / 46 °F and 90 °F

Products should be allowed to return to room temperature prior to use. Storage outside the recommended conditions may result in irreversible product damage.

Disposal

Dispose of in accordance with all applicable local regulations.