

AEROSIL® R 202 and AEROSIL® R 208

in Marine & Protective Coating Formulations



AEROSIL® R 202 and AEROSIL® R 208 are silicone oil treated hydrophobic fumed silica well established for industrial use in many different application areas within the coatings industry.

Silicone oil treated products are widely used in marine and protective coatings, such as epoxy based systems. Customers need to be aware of certain amounts of free silicone oil, which can be an issue in coating applications sensitive to silicone oil, e.g. recoatability.

Recommended grades: AEROSIL® R 202 and AEROSIL® R 208

with especially high performance in e.g.:

- 2 C-Epoxy
- 2 C-High solid silicone-epoxy
- Epoxy ester (zinc dust paint)
- 2 C-PUR (clear coat)



2 C-Epoxy

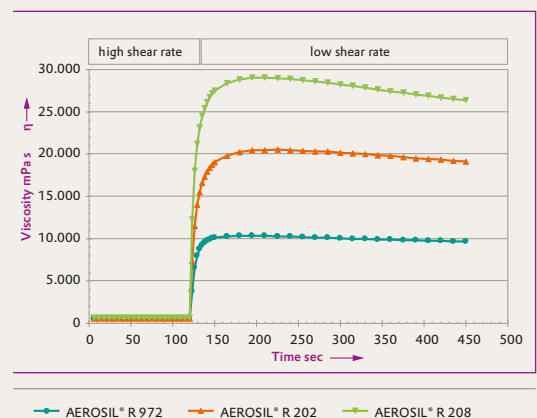
- Improvement of the anti-settling behavior of the pigments
- Improvement of the anti-sagging

Millbase	Parts by weight
Epoxy resin	28.0
Methylethylketone	6.5
Glycol ether	3.0
Xylene	2.9
Dispersing additive	0.5
Defoamer	0.4
AEROSIL®	1.0
Σ	42.4

Dispersion: Scandex 5 min.

Paint	Parts by weight
Millbase	42.4
Iron oxide	23.0
Zinc phosphate	5.0
Talcum	10.0
China Clay	2.0
Barium sulfate	7.0
Σ	89.4
Dispersion: Dissolver 15 min. 4000 rpm	
Hardener	
Amine hardener	10.6
Σ	100.0

Viscosity recovery curves



2 C-PUR (clear coat)

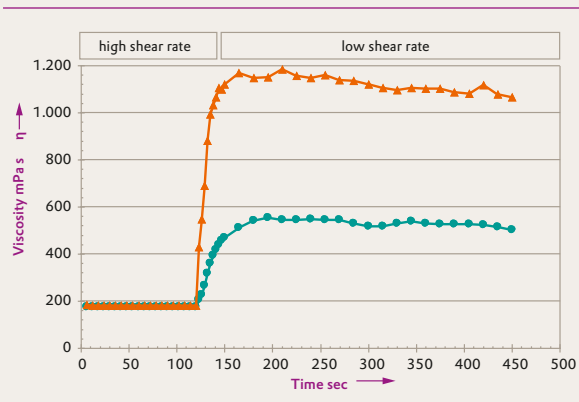
- Improvement of the anti-sagging behavior
- Good optical properties

Millbase	Parts by weight
Acrylic resin	23.3
Butylacetate	8.5
AEROSIL®	1.0

Solid content: 50%
Acrylate-Polyol: Isocyanate = 68: 32

Let Down	Parts by weight
Millbase	32.8
Acrylic resin	33.4
Xylene	3.9
Ethoxypropylacetate	3.5
Butylglycolacetate	1.5
Butylacetate	3.9
Hardener	
Isocyanate hardener	21.3
Σ	100.3

Viscosity recovery curves



— AEROSIL® R 972 — AEROSIL® R 202

Marine & Protective Coating Formulations | AEROSIL® | 04-15

This information and any recommendations, technical or otherwise, are presented in good faith and believed to be correct as of the date prepared. Recipients of this information and recommendations must make their own determination as to its suitability for their purposes. In no event shall Evonik assume liability for damages or losses of any kind or nature that result from the use of or reliance upon this information and recommendations. EVONIK EXPRESSLY DISCLAIMS ANY REPRESENTATIONS AND WARRANTIES OF ANY KIND, WHETHER EXPRESS OR IMPLIED, AS TO THE ACCURACY, COMPLETENESS, NON-INFRINGEMENT, MERCHANTABILITY AND/OR FITNESS FOR A PARTICULAR PURPOSE (EVEN IF EVONIK IS AWARE OF SUCH PURPOSE) WITH RESPECT TO ANY INFORMATION AND RECOMMENDATIONS PROVIDED. Reference to any trade names used by other companies is neither a recommendation nor an endorsement of the corresponding product, and does not imply that similar products could not be used. Evonik reserves the right to make any changes to the information and/or recommendations at any time, without prior or subsequent notice.

AEROSIL® is a registered trademark of Evonik Industries or its subsidiaries.

Evonik supports you in selecting the best suited AEROSIL® product and optimizing current formulations through our Application Technology Group.

Evonik Resource Efficiency GmbH

Business Line Silica
Rodenbacher Chaussee 4
63457 Hanau
Germany

PHONE +49 6181 59-12532

FAX +49 6181 59-712532

ask-si@evonik.com

www.aerosil.com