



Metallic silver color



Waterbased
formulation

6-15 µm

Low thickness

FUNCTIONALITIES

Corrosion protection

GEOMET® 500 alone or in combination with our range of topcoats passes the most severe corrosion cyclic tests. It protects parts from rust even after mechanical damages, such as stone chipping, thanks to its self-healing property. It also ensures bimetallic compatibility with aluminum alloys. Its nominal thickness can be adjusted (from 6 to 15 µm and from 1 to 3 layers depending the type of application process) to meet the expected performance.

720-2000 h

[ISO 9227/ASTM B117]

Lubrication

GEOMET® 500 is a self-lubricated basecoat, which allows to obtain a stable and controlled friction coefficient in the range of 0.12-0.18. This is a simplified solution compared to using a "base coat + top coat" system.

0.12-0.18

[ISO 16047]

* Results depend on substrate, geometry of parts and type of application processes.

Temperature resistance

Performances maintained up to 300°C.

Electrical properties

Conductive and offers perfect galvanic properties to avoid bi-metallic corrosion in most of industrial assemblies (cast iron, carbon steel and aluminum alloys).

Paintability

Good surface conditions for paints or additional coatings.

No hydrogen embrittlement

Implemented via non-electrolytic application processes. This avoids the hydrogen embrittlement phenomenon that causes cracking of metals.

APPLICATION

Processes

GEOMET® 500 is applied via bulk dip/spin, rack dip/spin, spray or electrostatic spray. This variety of processes allows to coat all types of parts, even those requiring partial coating, or with recessed and hollow surfaces.

Moreover, they are non-electrolytic and thus avoid the phenomenon of hydrogen embrittlement which causes cracking of metals.



BULK
DIP/SPIN



ELECTROSTATIC
SPRAY



RACK
DIP/SPIN



SPRAY

TECHNOLOGY

Waterborne zinc flake

GEOMET® 500 is a patented technology composed of zinc and aluminum flakes passivated in a binder in which a lubricant has been integrated. It has been developed to comply with the highest industrial requirements and regulations regarding environment, health and safety. It is water-based, chrome-free and nonylphenol-free.

Compliant with

REACH - Registration, Evaluation, Authorization and restriction of Chemicals

2011/65/EU and (EU) 2015/863 - Directive of the European Parliament on the restriction of the use of certain hazardous substances in electrical and electronic equipment

ASTM F1136 / F1136 M - Zinc/Aluminum Corrosion Protective Coatings for Fasteners

EN 13858 - Corrosion protection of metals - Non-electrolytically applied zinc flake coatings on iron or steel components

EN ISO 10683 - Fasteners - Non-electrolytically applied zinc flake coating systems

PDS/GEOMET-500/EN/2026-09-22/