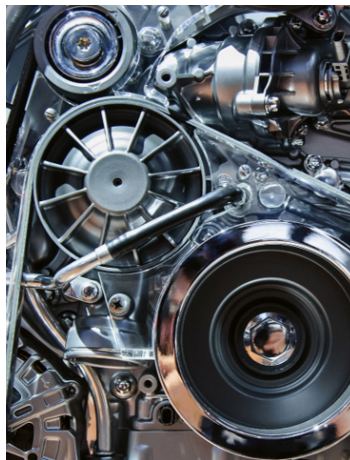


SILOXANE-BASED HARDENER

TEGO® Cure 100

New siloxane-based hardener for ambient temperature curing coatings



Achieving the next level of durability without reformulation

TEGO® Cure 100: New siloxane-based hardener for ambient temperature curing coatings.

It is free of organo-tin compounds and heavy metals and enables formulations of sustainable coatings with a low VOC content.

In combination with silicone resins, e.g. SILIKOPHEN® AC 900 for DTM coatings, it offers excellent corrosion protection for heavy duty applications, combined with outstanding heat resistance up to 650 °C, and excellent weathering stability.

TEGO® Cure 100 – At a Glance



Ready for the Future

- Ambient temperature curing
- High solid, > 99% active matter
- Non-isocyanate curing systems



Easy to use

- One hardener for all silicone binder systems
- Easy and robust handling
- High storage stability



Performance

- Excellent corrosion protection with DTM
- Excellent heat stability
- Improved gloss and flow properties



[Click here for more information!](#)




Fulfilling Global Regulations

- Energy savings are requested to avoid global warming
- Ambient temperature curing is the answer
- Low VOC requested to fulfill legislations
- > 99% active matter
- NISO (non isocyanate) curing often requested because of better product labelling
- Interpenetrated network by hydrolyze reaction

Guiding Formulation and Test Results

Guiding formulation with TEGO® Cure 100

GUIDING FORMULATION	Amount by weight
SILIKOPHEN® AC 900 (Methyl-/Phenyl silicone resin)	31.5
BENTONE SD® 1	1.0
MICA TM	17.0
HEUCOPHOS® ZPO	10.0
HEUCODUR® Black 9-100	12.0
AEROSIL® R 972	1.2
Plastorit® Super	9.0
Butyl glycol acetate	2.3
Xylene	16.0
Total	100.0
Hardener	
TEGO® Cure 100 	10.0

Test Results and Coating Properties

BASED ON METHYL-/PHENYL SILICONE RESIN

Hardener amount (related to formulation)	10.0%
Dry film thickness [µm]	> 75
Pot life* (closed container)	> 8 hours
Drying recorder "dust dry" at RT**	~ 0.5 h
Drying recorder "dry to touch" at RT**	1.0 - 1.5 h
Fully cured	24 h
Pendulum hardness Koenig [s] (24 h at RT**)	~ 80
Xylene resistance (double rubs) (24 h at RT**)	> 100

* Pot life: The time in which the original viscosity is doubled
 ** RT = room temperature (23 °C, approx. 50% rel. humidity)
 Temperature stress was tested 16 h at 200 °C/280 °C.
 Salt spray test acc. to DIN EN ISO 12944-5 Att. 1: 1 440 h.

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