Silox®850

Solvent free epoxy casting resin coating

Pigmented, self-levelling coating (cast resin coating). Silox®850 is made of solvent-free, mineral-filled epoxy resin, with excellent flow. Silox®850is used to produce seamless and jointless floor coverings by casting. They are characterised by excellent performance, long durability and visually appealing effects.

Typical applications for coverings made of Silox®850 are floor surfaces in industry, consumer markets, technical function rooms, laboratories, warehouses and wherever beautiful, clean, dust-free floor surfaces that are also mechanically resistant and robust are required.

Application

Silox®850 is specially developed for coating concrete surfaces or cement screeds and is not suitable for bituminous substrates, mastic asphalt or similar substrates.

The basic rules for coatings and coverings made of liquid plastics:

Clean substrate, free of slurry, dust and other separating substances, adhesive tensile strength at least 1.5 kN/mm2 , also apply to Silox®EPW 858.

Coatings made of Silox®850 are are diffusion-tight. They may therefore only be laid where the penetration of moisture from the rear of the interface with the substrate is either excluded or compensated for.
The adhesion of Silox®850 on clean concrete is excellent and better than the intrinsic strength of the concrete. Nevertheless, we recommend always priming with an unfilled epoxy resin binder as primer (bonding agent). Unfilled resins wet the concrete surface better, fine dust in the pores is bound and the coating is thus optimally anchored to the substrate.

Primer as bonding agent Silox®802

Special Primers for Epoxy Coatings are the ARCAN products Silox®802 and Silox®EPW 856.

Silox®802 is a low viscosity liquid resin and is characterised by excellent wetting and outstanding adhesion even on difficult substrates. Surfaces primed with Silox®802 must be recoated with the subsequent coating after 24 hours or scattered with quartz sand to ensure a secure bond to the subsequent coating.

Silox®EPW 856 Perfect on challenging undergrounds

Silox®EPW 856 is a water-emulsified EP system. It is particularly thin-bodied and easy to process and penetrates easily and deeply into the capillary structure of screed mortar and concrete.
The special advantage of Silox®EPW 856, however, is the excellent adhesion of this resin even on difficult substrates - e.g. even on old coatings! Under normal conditions, primers made of Silox®EPW 856 can also be recoated after 24 hours. It is not necessary to sprinkle with quartz sand if this subsequent coating is applied within 72 hours (48 hours at temperatures above 25° C).

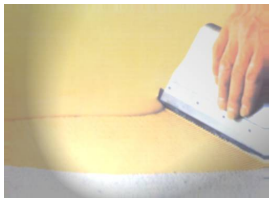
Scratch spatel:

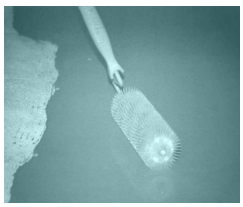
Made of Silox®850 + quartz sand, sharply scraped off with a spatula or trowel !

Smooth and visually appealing surfaces require appropriate pretreatment of the substrate. It is therefore advisable to level the surfaces with a scratch or blowhole filler before the actual coating. For this purpose, Silox® 850 is mixed with approx. 20 - 30 % dried quartz sand (grain size e.g. 0.1 - 0.4 mm) and this compound is then applied sharply over the substrate with a steeply guided surface spatula or steel trowel. Make sure that no filling burrs remain! This levelling filler should also be reworked or gritted with sand within 24 hours. Outstanding surfaces are achieved when the sanded primer or the levelling layers are smoothed with a grinding machine.

The top coat - the actual coating - is applied with notched trowels. The toothing is selected so that the intended layer thickness is achieved in one operation. For thicker layers [≥ 2 mm], 20 - 30 % dry quartz sand [0.1 - 0.4 mm] can be added to the TopCoat / installation can be carried out by applying with large-surface squeegees.

Application with tooth trowel: defined thickness choosen by the size of the tooth trowel





The fresh coating is rolled off and levelled with PE spiked rollers. This after-treatment reliably removes the air incorporated during mixing of the components, a pore-free, even surface is created.

Silox®850 hardens tack-free at room and substrate temperatures of 15 - 20° C within approx. 12 hours. Coated areas are walkable after 24 hours at 20°C and can be mechanically stressed after 36 - 48 hours and chemically stressed after 5 - 7 days.

Properties

Components	: 2
Material	:Filled epoxy liquid resin and modified polyamide as hardener
Odour	: weak, typical
Density	: 1,5 gr/ml
Shelf life	: Minimum 12 months

Application data

Surface	: shining
Processing temperature	: Not under +8°C
Processing time ("Potlife")	: 30-40 minutes at 20°C
Hardening time	: Stick free after 12-15 hours at 20°C
Consumption	: 1,50 kg/m^2 per mm layer
Mixing time A + B	: 2 minutes (by machine

Safety Storage Disposal

It is important to keep the usual hygienic rules for the use of Epoxy resins. Keep the material away from children and unauthorised people.

Machines and tools will be cleaned with water and dish washing agent. It is practicable to use hot water or HydroSolv®520 a special security solvent.

Stains of hardened material are difficult to remove, we recommend the protection of neighbouring concrete parts with covering or to clean immediately.

Empty cans with liquid rests are special waste and requires a disposal after local regulations. The hardened product is harmless and could be disposed as building rubble.

For all products are SDS available. They contain all relevant information for safe handling, storage, transport, disposal etc..

Recommended Accessories

HydroSolv®520

A highly efficient cleaning material for PUR and Epoxy machines. HydroSolv®520 is environmental neutral in combination with a high flash point. The material is non toxic, harmless and has no transport restrictions or necessity to label it as dangerous good.

ARCAN Waterproof
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