

MASTERTOP®

1230 PLUS

Self smoothing solvent free, epoxy overlay system for concrete floors

Description

MASTERTOP 1230 PLUS is a single-coloured, self smoothing, solvent free, epoxy overlay system designed to provide continuous protection for concrete floors at thicknesses of between 2.0-4.0mm. For greater thicknesses contact Degussa Technical department. The cured material produces a dense, colourful, glossy surface.

The product has also been successfully applied to glazed and terrazzo tiles, steel and timber. For applications other than to concrete, please contact your Degussa representative.

Primary uses

MASTERTOP 1230 PLUS has excellent wear and abrasion resistance to floors subjected to high volume traffic.

The smooth, ultra-dense and high gloss finish is ideal for situations requiring a hygienic, easily cleaned surface.

The product offers good general resistance to a broad spectrum of chemical corrosives, but as in all cases of chemical exposure a full analysis of operating conditions is required, followed by reference to chemical resistance data, to ensure product suitability.

MASTERTOP 1230 PLUS may be applied in the following industries

NB This gives examples only and does not constitute a full and comprehensive list. For further information on application possibilities contact Degussa .

- Food production and processing
- Beverage production - including soft drink manufacturing.
- Pharmaceutical areas, laboratories, clean rooms
- Engineering workshops and assembly lines
- Showrooms, demonstration areas.
- Industrial and commercial cold kitchens.
- Retail
- Schools, hospitals and hotels

Advantages

- Excellent wear and abrasion resistance
- Easily applied
- Smooth high gloss finish for hygienic applications
- Easily cleaned
- Good general chemical resistance
- Colourful - improves the working environment

Packaging

- MASTERTOP 1230 PLUS is supplied as a 38kg multi component pack (including colour pack).

Hygiene

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- Taint tests carried out on MASTERTOP 1230 PLUS at the Leatherhead Food Research Association under artificially severe conditions showed that the risks of tainting foodstuffs are minimal during and after complete cure.
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Typical data of hardened material*

- Properties listed are only for guidance and are not a
- guarantee of performance.
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	25°C	40°C
Pot Life	35 mins	20 mins
Cure Time	15 hours	10 hours
Compressive strength (ASTM C579-93) 1 day	35 N/mm ²	80 N/mm ²
3 days	60 N/mm ²	81 N/mm ²
14 days	75 N/mm ²	83 N/mm ²
Density of mixed material	1.79kg/m ³	
Flexural strength (BS 6319 Part 3)	30 N/mm ²	
Tensile strength (BS 6319 Part 7)	17 N/mm ²	
Slip resistance (TRRL rubber)	99	

Guide to application

Surface preparation:

The preferred method for surface preparation of concrete is captive blasting, which gives a well prepared laitance free, vacuum cleaned surface.

Prior to application MASTERTOP 1230 PLUS should be stored under cover in an air-conditioned environment and protected from extremes of temperature which may cause inconsistent workability, finish and cure times for the mixed material.

Sealing:

Damaged or deeply pitted areas can be repaired and levelled using MASTERTOP 1230 PLUS filled out, if required, with additional aggregate.

It is essential to seal the concrete surface prior to the application of MASTERTOP 1230 PLUS, to prevent air from the substrate rising through the MASTERTOP 1230 PLUS while it sets.

Seal the concrete with MASTERTOP 1200 Resin diluted with 0.5 litres MASTERTOP SOLVENT No. 2 (if required or permissible).

Pour the base and reactor components into a suitable mixing vessel, and add the SOLVENT No. 2. Using a slow speed drill and paddle, mix the components for a minimum of 1 minute, or until all striations have disappeared.

Apply the mixed sealer to the prepared dust free surface with a medium pile roller, at the rate of 5-8m² per litre depending on the surface profile of the concrete.

If the concrete is very absorbent, a single application may not be sufficient and a second

coat may be required to ensure the surface is completely sealed.

Allow the sealer to become tack free before applying the MASTERTOP 1230 PLUS.

Mixing:

Pour the reactor into the base, add the colour pack and, using a suitable drill and paddle, mix the components together until a uniform colour is achieved. Mixing should be for a minimum of one minute. Pour the mixed components into a suitable mixing vessel of 30 litre capacity.

With the mixer still running, slowly add the 1230 PLUS aggregate and mix for 2 minutes or until the mixture is smooth and free of lumps.

Always keep the mixing time the same for all batches, to ensure a uniform colour when the product is applied.

Laying:

Pour the mixed material onto the primed and sealed surface, and spread to the required thickness using a pin screed, notched trowel or steel float. As soon as the material has been spread to the required level, the applied material should be rolled with a spiked roller to release entrapped air and remove trowel marks.

Rolling should be continued until all air is released and a uniform colour is obtained.

The operator should always wear spiked shoes when using the spiked roller so that he can walk in the wet material.

Rolling should cease before the MASTERTOP 1230 PLUS begins to gel.

Vacuum recovery shot blasting machine
Scarifier (Errut / Von Arx)

Masking tape / polythene sheets
Grinder
Heaters for cold weather work
Overalls

Trowels
Lighting

Slow speed drill with suitable paddle
Spiked roller

Brushes or short nap hair rollers
Spiked shoes
Industrial vacuum
Pin screed

Equipment care

Remove MASTERTOP 1230 PLUS from tools and equipment whilst still wet using Degussa SOLVENT No. 2. Cured resin will require mechanical removal.

Yield

A 38kg unit of MASTERTOP 1230 PLUS will yield 21.19 litres of mixed material.

MASTERTOP 1230 PLUS systems are supplied in preweighed packs which should not be split or divided. It is important to use complete packs.

Storage

Shelf life is up to one year when stored under cover, out of direct sunlight and protected from extremes of temperature.

Quality

All products produced by Degussa certified manufacturing facilities, are produced to conform to systems designed to meet internationally recognised quality standards.

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