

FLOORING



Vetotop EC698

High-build epoxy flooring system (Solvent-free and high performance)

Uses

- Used to coat the floors of various industrial applications such as production assembly areas, workshops, dairies, bottling plants, breweries, pharma plants, kitchens, showrooms, etc.
- Used to create anti-slip floors, ramps and high traffic areas.
- Suitable for wet working areas.
- Used to coat the floors of car parking lots.

Product Description

Vetotop EC698 is a two-component, high-performance, solvent-free, epoxy coating system designed to protect concrete floors. Once cured, the product has excellent abrasion and good chemical resistance. Vetotop EC698 provides an attractive, hard-wearing, and easily cleanable floor finish.

Advantages

- High abrasion and impact resistance.
- Easy to apply.
- High chemical resistance.
- Low maintenance costs.
- Hygienic, impervious, and easily cleanable.
- It provides a slip-resistant finish.
- Available in 8 standard colors with the possibility of custom RAL colors.
- High bonding properties (stronger than concrete cohesive strength).
- Economic installation.

Standards Compliance

- ASTM C722
- EN 13501-1

Technical Data

Vetotop EC698	Typical Values
Solid Content (By Volume %)	100
Recommended DFT / coat / micron	150-200
Pot Life @ 12°C/54°F (Minutes)	50
Pot Life @ 40°C/104°F (Minutes)	15
Thin Film Dry Time (Hours)	
@ 15°C	12
@ 40°C	3
Mixed Density @ 20°C (kg/liter)	1.6
Max Recoat/Topcoat Time (Hours)	
@ 15°C	48
@ 40°C	24
Application Maximum Relative Humidity (%)	75
Compressive Strength - ASTM C579 (N/mm ²)	≥ 45
Tensile Strength - ASTM D638 (N/mm ²)	36
Bond Strength to Concrete - ASTM D4541 (N/mm ²)	> 2
Taber Abrasion - ASTM D4060 CS17 Wheels (mg loss/1000 cycles)	≤ 85
Water Absorption - ASTM C413 (maximum)	0.004
Porosity with No Sealer NACE Sand (TM-01-74)	0
Hardness Shore D - ASTM D2240	≥ 65
Impact Resistance - ASTM D2794 (Joules)	≥ 8.5

Design Criteria

Vetotop EC698 is designed to be a hard-wearing, two-coat application on cementitious substrates. The applied product will be resistant to water as well as a wide range of chemicals.

Chemical Resistance

Chemical	Concentration	Resistance
Lactic Acid	10%	Excellent
Citric Acid	10%	Excellent
Hydrochloric Acid	30%	Excellent
Sodium Hydroxide	50%	Excellent
Acetic Acid	10%	Excellent
Nitric Acid	25%	Slight Discoloration
Sulphuric Acid	50%	Excellent
Phosphoric Acid	50%	Excellent
Mineral Oil	10%	Excellent
Ammonia	10%	Excellent
Sea Water	-	Excellent

Note: The above data is for a 7-day cured product at 25°C. Vetotop EC698 is resistant to acids and alkali of medium concentrations, mineral oil products, and solvents.

Usage Instructions

Surface Preparation

The surface should be sound, clean, free from loose material, grease, laitance, dirt-curing compounds, etc.

Remove laitance and weak surface layers using mechanical methods such as grinding or blasting to provide a sound, well-profiled surface. Fix all necessary repairs before the application begins by using an epoxy mortar from the Vetorep ER range.

New concrete floors should be at least 28 days old with a moisture content of less than 5% (for earlier application, test the substrate moisture condition).

Priming

Priming is not required when the product is applied to good quality & non-porous concrete. If the concrete surface is porous or if there is a doubt of the concrete surface quality, it is recommended to use Vetoprime EP491 as a film forming agent or Vetoprime EP490 as a penetrating primer. Vetoprime EP691 should be mixed in the proportions recommended by Saveto.

Add the entire contents of the hardener container to the base container. When thoroughly mixed -preferably using a slow speed mixer- apply the primer in a thin, continuous film using rollers or a stiff brush. Work the primer well into the concrete's surface. Avoid ponding or over application. Leave the primer to achieve a tack-free condition before applying the topcoat.

Mixing

In a separate mixing container, use a slow speed mixer to mix the base and the hardener for 3 minutes. Mix these components in the quantities recommended by Saveto

Make sure to scrape all the materials on all the sides of the container. You can dilute up to 8% using Vetonit Solvent XX300 to aid the application process.

Application

The application and curing temperature must be above 15°C. Lay the first coat of Vetotop EC698 using a short-haired lambswool roller or a gauged squeegee to achieve continuous coating. Remove loose hairs on the roller before use.

Apply a film that is 150 microns thick per coat for the flooring system (this can be increased where specifications demand). Apply the topcoat in the same way within 8 to 24 hours.

Anti Slip Aggregates

If you choose to use Vetograin anti slip aggregates, you'll need to dress the base coat with the anti slip aggregates as soon as possible after laying it. The recommended procedure is to blind the base coat completely, i.e., apply excess dressing aggregate to obliterate the base coating.

Alternatively, the anti slip silica particles can be broadcast in a light random dressing to provide a less dense finish.

You can also use this product to obtain a smooth finish by omitting the anti slip aggregates. When the base coat reaches its initial curing (after 12 hours at 20°C or 5 hours at 35°C), vacuum the excess aggregate to clean the surface. Apply the topcoat with a short-haired roller or an airless spray.

Ensure applying a continuous film and seal on rough surfaces (if the damage is completely caused by the aggregate).

A resin-base coat must be applied before the top coat (Which should be done within 36 hours at 20°C and within 15 at 35°C).

Expansion Joints

Expansion joints in the existing substrate must be retained and continued through the Vetotop EC698 topping. Saveto has a range of joint sealants specifically designed for flooring (see the product technical datasheets of Vetoflex PS781, Vetoflex PS782, and Vetoflex PS786).

Cleaning

Clean tools and equipment with Vetonit Solvent XX300 immediately after use.

FLOORING

Packaging & Coverage

Product	Pack Size
Vetotop EC698	4 & 15 Liters Kit
Vetoprime EP691	4 Liters Kit
Vetoprime EP490	4 Liters Kit
Anti Slip Aggregates	25 Liters Kit

Product	Consumption
Vetotop EC698	5 m ² /liter @ 200 micron DFT
Vetoprime EP691	5.5 m ² /liter @ 100 micron DFT 11 m ² /liter @ 50 micron DFT
Vetoprime EP490	5.5 m ² /liter @ 100 micron DFT 11 m ² /liter @ 50 micron DFT

In the case of Anti Slip aggregates' use, the topcoat's consumption values will increase by 15 to 20%. Anti Slip aggregate consumption:

Product	Consumption
Anti Slip Aggregate (Fine)	1.5 - 3.5 m ² / Kg
Anti Slip Aggregate (Medium)	1.2 - 3.0 m ² / Kg
Anti Slip Aggregate (Coarse)	1.0 - 3.0 m ² / Kg

Total system thickness with anti slip aggregate use:

Vetotop EC698 with Anti Slip Aggregates Texture	Thickness
Fine	0.75 - 1.5 mm
Medium	1.5 - 2.0 mm
Coarse	2.0 - 2.5 mm

Stated consumption data are for general guidance. Actual consumption depends on the nature of substrate, method of application, and wastage.

Shelf Life & Storage

The original sealed kit of Vetotop EC698 has a shelf life of 12 months, provided it is stored clear of ground in a dry and shaded place at a temperature below 35°C.

Legal Disclaimer

Saveto endeavors to ensure that any advice, recommendations, information it may give is accurate and correct. It cannot accept any liability either directly or indirectly arising from the use of its products because it has no direct or continuous control over where or how its products are applied, whether or not following any advice, specification, recommendation, or information given by us. Saveto has the right to change any of the technical datasheets specifications upon its discretion without prior notification.

Hard copies of TDSs are printed once or twice a year. Our technical data sheets are continuously updated as per R&D improvements and new 3rd party testing; kindly refer to our website for the latest updated TDSs.

Health & Safety

Vetotop EC698, Vetoprime EP691, Vetoprime EP490, and Vetonit Solvent XX300 should not contact skin and eyes or be swallowed. Ensure adequate ventilation and avoid inhalation of vapors. Some people are sensitive to resins, hardeners, and solvents, so wear suitable protective clothing, gloves, and eye protection. If working in confined areas, use suitable respiratory protective equipment.

Barrier creams provide additional skin protection. In case of skin contact, rinse with plenty of clean water, then cleanse with soap and water. Do not use solvents. In case of contact with eyes, rinse immediately with plenty of clean water and seek medical advice. If swallowed, seek medical attention immediately. Do not induce vomiting.

Vetoprime EP490 and Vetonit Solvent XX300 are both flammable. Keep away from sources of ignition. Do not smoke around them. In the event of a fire, extinguish with CO2 or foam.

Additional Information

Saveto manufactures a wide range of construction chemicals and specialty products for various applications.

For further information on these products and systems kindly check our website or contact your local Saveto representative.