

# Flowshield ESD BVG

A fibre-free antistatic, selfsmoothing epoxy floor coating based on nano technology that complies with a variety of electrical conductivity requirements.

For use in medium to heavy duty traffic areas where conductive ESD standards are required.



#### Antistatic:

Meets ANSI/ESD S2020, ASTM F150 Conductive and IEC 61340-5-1 & IEC 61340-4-5 requirements.

#### Low Odour:

Solvent free and low odour during and after application.



#### High Chemical Resistance:

Protects against a majority of chemicals used in manufacturing processes.

#### Hard-Wearing:

Hard-wearing & abrasion resistant suitable for medium to heavy traffic.



The applied colours may differ from the examples shown. For a full colour chart and samples, contact your local Flowcrete office. The colour chart is an approximate display of RAL colours.



## **Technical Profile\***

FIRE RESISTANCE				
EN 13501-1	B <sub>fl</sub> - s1			
SLIP RESISTANCE**				
Method described in BS 7976-2 (typical values for 4-S rubber slider)	Dry>40, Wet depends on specification (in accordance with HSE and UKSRG guidelines)			
THERMAL RESISTANCE				
Tolerant up to 60°C				
WATER PERMEABILITY				
Nil – Karsten test (impermeable)				
ABRASION RESISTANCE				
Taber Abrader (1 kg load using CS17 wheels)	80 mg loss per 1000 cycles			
COMPRESSIVE STRENGTH				
EN 13892-2	60 N/mm²			
FLEXURAL STRENGTH				
EN 13892-2	40 N/mm <sup>2</sup>			
TENSILE STRENGTH				
BS 6319	25 N/mm <sup>2</sup>			
BOND STRENGTH				
Greater than cohesive strength of 25 N/mm² concrete. >1.5 MPa				
ELECTRICAL RESISTANCE				
IEC 61340-5-1	<10 <sup>9</sup> Ω			
ASTM F150	2.5 x 10 <sup>4</sup> – 1.0 x 10 <sup>6</sup> Ω			
BODY VOLTAGE GENERATION (BVG)				
IEC 61340-4-5	<100V			
ANSI/ESD S2020	<100V			
SPEED OF CURE	10°C	20°C	30°C	
Light Traffic	36 h	30 h	24 h	
Full Traffic	72 h	48 h	36 h	
Full Chemical Cure	12 d	7 d	6 d	
' These figures are typical properties achieved in laboratory tests at 20°C and at 50% Relative Humidity.				

\*\*The slipperiness of flooring materials can change significantly, due to the installation process, after short periods of use, due to inappropriate maintenance, longer-term wear and/or surface contaminants (wet or dry). Textured systems are recommended to meet slip resistance value requirements for wet conditions and/ or surface contaminants (wet or dry) - please contact our Technical Advisors for

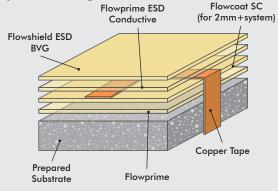


## **Model Specification**

System	Flowshield ESD BVG
Finish	Gloss
Thickness	Dependant on specification
Manufacturer	Tremco CPG Malaysia

Preparatory work and application in accordance with manufacturer's instructions.

## System Design



## Products Included In This System

Primer	Flowprime
Scratch Coat	Flowcoat SC (for 2mm+ system)
Copper Tape	(conductive grid of 10 mm wide
	copper tape)
Antistatic Primer	Flowprime ESD Conductive
Finishing Coat	Flowshield ESD BVG

Detailed application instructions are available upon request.

## Substrate Requirements

Concrete or screed substrate should be a minimum of 25N/mm<sup>2</sup>, free from laitance, dust and other contamination. The substrate should be dry up to 75% RH as per BS8204 and free from rising damp and ground water pressure. Application of a 1mm self-smoothing product also requires a smooth substrate.

#### Installation Service

The installation should be carried out by a licensed contractor with a documented quality assurance scheme. For details of our licensed contractors, contact our customer service team or enquire via our website at www.flowcreteasia.com

## **Environmental Considerations**

The finished system is assessed as non-hazardous to health and the environment. The long service life and seamless surface reduce the need for repairs, maintenance and cleaning. Environmental and health considerations are controlled during manufacture and application of the products by Flowcrete staff and fully trained and experienced contractors.

## **Conductive Tape**

A network of 12 mm wide, self-adhesive, conductive copper tape is always recommended in combination with any Flowcrete antistatic flooring system. The copper tape must be applied directly onto the cured Flowprime, maximum 1 metre in from the perimeter of the application. Further, strips of tape should be applied within this area every 3 metres. Special attention should be paid to tape areas passing over expansion or bay joints to ensure permanent electrical continuity. The applied tape should be secure and fully bonded to a confirmed earth point.

## Aftercare, Cleaning & Maintenance

Clean regularly using a single or double headed rotary scrubber drier in conjunction with a mildly alkaline detergent. Ensure that the floor is not abraded during cleaning and that the cleaning agent does not deposit a layer of wax or residue on the surface as this will impair the antistatic properties of the floor.

#### Important Note

Flowcrete products are guaranteed against defective materials and manufacture and are sold subject to our standard 'Warranty, Terms and Conditions of Sale', copies of which can be obtained on request. Warranty does not cover suitability, fit for purpose or any consequential or related damages.

## **Further Information**

To ensure you are specifying a fit-for-purpose floor, please consult our Technical Advisors or visit our website to register your interest in specifying one of the most durable floors on the market.

1. Light colours may require additional coats to achieve desired results 2. It is recommended that top coat colours are close to base coats colours to achieve desired results 3. This product is not UV stable and may discolour unless otherwise stated 4. System Data Sheet to be read in conjunction with Method Statement and Product data Sheets.

[17/03/22]