

SURFACESHIELD™ HD

Non-Sacrificial Anti-Graffiti Vertical Surface Treatment

PC 952

- FEATURES**
- PROTECTS VERTICAL SURFACES
 - BARRIER AGAINST BOTH WATER BASED AND OILY STAINS AND MOST TYPES OF GRAFFITI
 - ALLOWS FAST AND COST EFFECTIVE REMOVAL OF GRAFFITI
 - VAPOUR PERMEABLE FILM
 - INVISIBLE – DOES NOT CHANGE THE APPEARANCE OF THE ORIGINAL SURFACE

USES Surfaceshield™ HD (Heavy Duty) is a water-based solution for the protection of vertical surfaces from graffiti and pollution ingress. The low VOC formula is suitable for use where low odour and low solvent emissions are desired. Surfaceshield™ HD is a non-sacrificial coating allowing repeated graffiti removal after one application. Surfaceshield™ HD is non film-forming; it penetrates the porous surface providing an invisible hydrophobic and oleophobic layer. Graffiti on surfaces treated with Surfaceshield™ HD can be removed using a combination of graffiti removal agents and hot water pressure. Surfaceshield™ HD can be used to protect a wide variety of porous materials used in construction, infrastructure, retail, municipality, and public spaces.

TYPICAL PROPERTIES AND APPLICATION DATA

CLASSIFICATION	Waterborne co-polymer	APPLICATION CONDITIONS		
FINISH	Invisible		Min	Max
COLOUR	Clear colourless	Air Temp.	5°C	30°C
		Substrate Temp.	5°C	30°C
		Relative Humidity	40%	85%
COMPONENTS	One	FILM THICKNESS (MICRONS)		
VOLUME SOLIDS	Not applicable		Min	Max
VOC LEVEL	<1 g/L	Wet film per coat (µm)	Not applicable. Refer to typical systems guide for spreading rate	
FLASH POINT	Non flammable	Dry film per coat (µm)		
POT LIFE	Not applicable	SUITABLE SUBSTRATES	Concrete, bricks, natural stone and other porous masonry surfaces	
MIXING RATIO V/V THINNER	Single Pack Do not thin	SUITABLE TOPCOATS	Surfaceshield™ S can be used for sacrificial protection.	
PRODUCT CODE	992-H0049 Surfaceshield™ HD	APPLICATION METHODS	Conventional, airless spray or air assisted spray, using low pressure.	

DRYING CHARACTERISTICS

Temperature	Humidity	Full Cure	OVERCOAT	
			Min	Max*
25° C	50%	7 Days	24 Hours	Extended

These figures are a guide only, as ventilation, film thickness, humidity, thinning and other factors will influence the rate of drying.

PROCEDURE

- PREPARATION AND APPLICATION**
1. The surface must be free from contaminants including grease, oil, dirt, bond breakers, previous coatings, sealers, and loosely adhering materials. An industrial detergent and hot water high-pressure cleaning may be required for persistent deposits. Soft and easily damaged substrates, such as limestone and some sandstone, may require specialized preparation prior to treatment with Surfaceshield. Refer to your Dulux Protective Coatings Specifications Consultant for specific advice.
 2. Concrete should be fully cured. Application over strongly alkali surfaces (such as new concrete) will affect the performance of Surfaceshield™ HD.
 3. The surface can be either **dry or damp** before applying Surfaceshield™ HD.
 4. Apply one or two layers of Surfaceshield™ HD to the surface being protected using low pressure spray. The amount of Surfaceshield™ HD required will increase with increasing porosity of the surface being coated. Subsequent layers can be applied when the coating becomes hand dry. Once allowed to fully dry no further material can be added. Refer to the recommended system guide for a rough indication of the spreading rates required for the surface to be protected. Insufficient application of Surfaceshield™ HD will dramatically affect its performance and ability to protect the substrate.
 5. If Surfaceshield™ S is to be applied for further protection, allow the Surfaceshield™ HD to dry for 24 hours prior to the application of the Surfaceshield™ S.
- IMPORTANT NOTE:** This product is to be applied by a specialist applicator suitably trained in the application of Surfaceshield™ HD and the removal of graffiti according to Surfaceshield™ guidelines. The applicator is required to record application works and be able to remove graffiti from affected areas using the correct Surfaceshield procedure. Deviation from this requirement may adversely affect graffiti management.

SPREADING RATE 3 – 5 square metres per litre in 1 – 2 passes

assuming no losses

NOTE: Practical spreading rates will vary depending on such factors as application method, ambient conditions and surface roughness.

SURFACESHIELD™ HD

TYPICAL SYSTEMS

This is a guide only and not to be used as a specification. Your specific project needs must be discussed with a Dulux Protective Coatings Consultant.

SURFACE	ENVIRONMENT	PREPARATION GUIDE	SYSTEM		PASSES REQUIRED	COVERAGE (m ² /L)
SMOOTH (Precast concrete)	Exterior	Clean and degrease surface to remove contaminants, including bond breakers	1 st Coat	Surfaceshield™ HD	1 – 2 passes*	5
POROUS (clay bricks, natural stone, concrete)	Exterior	Clean and degrease surface to remove contaminants	1 st Coat	Surfaceshield™ HD	1 – 2 passes*	4
			1 st Coat	Surfaceshield™ HD	1 – 2 passes*	4
			2 nd Coat	Surfaceshield™ S	1 pass	3 – 4
VERY POROUS (Sandstone)	Exterior	Clean and degrease surface to remove contaminants	1 st Coat	Surfaceshield™ HD	1 – 2 passes*	3 – 4
			2 nd Coat	Surfaceshield™ S	1 pass	2 – 3
			3 rd Coat	Surfaceshield™ S	1 pass	2 – 3

*Multiple passes must be applied wet on wet

SURFACE PREPARATION	Concrete: Concrete must be at least 28 days old before coating. Remove curing compounds, oil, grease and other oily contaminants with Gamlen CA 1 (according to the manufacturer's written instructions and all safety warnings). Remove all laitance and loose material. Fill any large cracks or voids using Luxepoxy® Filler. Any pre-existing coatings or contaminants will reduce the effectiveness of Surfaceshield™ HD.
APPLICATION	Mix thoroughly using a power mixer until the contents are uniform.
BRUSH/ROLLER	Suitable for small areas only. Apply even coats of the material to the prepared surface.
CONVENTIONAL SPRAY	Apply in multiple wet coats overlapping each pass 50%.
AIRLESS SPRAY	Standard airless spray equipment. Tips between 0.17mm and 0.21mm are suggested to avoid excess material being applied. Avoid flooding the surface.
PRECAUTIONS	Surface shield™ HD is an industrial product designed for use by experienced Protective Coating applicators. Where conditions may require variation from the recommendations on this Product Data Sheet contact your nearest Dulux® Consultant for advice prior to painting. Do not apply in conditions outside the parameters stated in this document without the written consent of Dulux® Australia. Do not apply at temperatures below 10°C. Where multiple passes are required the product must be applied wet on wet. Excessively rapid drying can limit product effectiveness. Soft and easily damaged substrates, such as Limestone and some Sandstone, may require specialized preparation prior to treatment with Surfaceshield. Do not apply in conditions outside those recommended on this data sheet. Dulux® cannot guarantee that every type of graffiti can be completely removed. This technology may not be able to protect against graffiti agents which etch, or otherwise damage the substrate. Highest protection is achieved after 7 days of curing. Do not use this product for this application without reference to a Dulux® Protective Coatings project-specific specification.
CLEAN UP	Clean all equipment with warm water and biodegradable waterbased detergent or degreaser after use.
CLEANING AND GRAFFITI REMOVAL	A combination of graffiti removal agents and hot water power washing is the most effective and fastest cleaning method. When power washing, a continuous flow of hot water (>75°C) on board water heater is recommended. Use a minimum 45° angle flat spray tip. Spray power should not exceed 65 bar and a spray distance of 10cm should be maintained. Avoid higher pressure water washing as this causes abrasion and may compromise the protective treatment.
OVERCOATING	The surface must be free of oil, grease and other contaminants. High-pressure water wash at 8.3 to 10.3 MPa (1,200 – 1,500 p.s.i.) to remove loosely adhering chalk and dust. Abrasion may be required depending on surface condition. Thorough abrasion will be required to remove existing Surfaceshield™ HD before reapplication.
SAFETY PRECAUTIONS	Read Data Sheet, SAFETY DATA SHEET and any precautions on container labels. SAFETY DATA SHEET is available from Customer Service (13 23 77) or www.duluxprotectivecoatings.com.au
STORAGE	Store in a well-ventilated area. Keep containers closed at all times.
HANDLING	As with any chemical, ingestion, inhalation and prolonged or repeated skin contact should be avoided by good occupational work practice. Eye protection approved to AS1337 should be worn where there is a risk of splashes entering the eyes. Always wash hands before smoking, eating, drinking or using the toilet.
USING	Use with good ventilation and avoid inhalation of spray mists and fumes. If risk of inhalation of spray mists exists, wear combined organic vapour/particulate respirator. When spraying, users must comply with their respective State Spray Painting regulations.
FLAMMABILITY	This product is non flammable.

COMPANY INFORMATION		PACKAGING, TRANSPORT AND STORAGE	
Dulux Protective Coatings a division of		PACKAGING	Available in 20 litre packs and 1000 litre bulk containers.
DuluxGroup (Australia) Pty Ltd 1956 Dandenong Road, Clayton 3168 A.B.N. 67 000 049 427	DuluxGroup (New Zealand) Pty Ltd 150 Hutt Park Road, Lower Hutt, NZ A.B.N. 55 133 404 118	TRANSPORTATION WEIGHT	1.01 kg/litre
		DANGEROUS GOODS	Non Dangerous Goods

Surfaceshield is a trade mark.

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