

## QUICKFLOOR 500

## VERTICAL

### 1. CHARACTERISTICS

**QuickFloor 500 Vertical** is a high performance, rapid curing coating based on the latest polyaspartic technologies. Based on our standard **QuickFloor 500** formula the Vertical version contains thixotropes to enhance vertical applications for coverings and walls. **QuickFloor 500 Vertical** provides excellent colour and gloss retention and is resistant to most fuels, oils, solvents and cleaners. Applied using a roller, squeegee or notched trowel, airless machine or the VIP LP -2 spray machine application is fast and with a tack free time of 30 – 60 minutes re-use times are incredibly short saving customers valuable production time. **QuickFloor 500 Vertical** can be pigmented or applied as a clear anti-yellowing top coat.

### FEATURES

- ✓ Higher viscosity, anti sag formula for application on vertical substrates
- ✓ Extremely fast cure and re-use times
- ✓ Excellent colour and gloss retention
- ✓ Cures to a very clear finish when not pigmented
- ✓ Excellent abrasion resistance
- ✓ Self priming
- ✓ Excellent adhesion to concrete substrates
- ✓ Excellent chemical resistance
- ✓ Resistant to most chemicals, solvents, acids and caustics
- ✓ Can be used for in-door and out door applications
- ✓ Stable over a wide temperature range
- ✓ Displays good flexibility and impact resistance compared to standard epoxies

### 3. TYPICAL USES

- ✓ In conjunction with VIP's QuickFloor systems where vertical surfaces are present
- ✓ Coving, pillars, steps, etc.
- ✓ Chemical resistant top coating for bunds and storage tanks
- ✓ Tank linings subject to corrosion and chemical attack

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4. PROCESSING PROPERTIES	DATA
Mixing ratio of Comp. A to Comp. B	1 :1 by volume
Material consumption L / m <sup>2</sup>	0.25L @ 250 µm (Will vary based on substrate)
Recommended thickness [µm]	250-500 (per layer)
Numbers of coats	Depends on application requirements.
Pot life at 20°C [min.]	30 – 60
Waiting time between the single layers* [h]	1
Tack free time* [h]	1
Pedestrian traffic after* [h]	Light: 1,5 - 4      Heavy: 5 - 8
Curing* (Normal loading) [h]	16 - 24
Temperature range for application (ambience) [°C]	+5 - +50
Temperature range for application (substrate) [°C]	+5 - +50
Material temperature [°C]	20 ( recommended)
Over coat window (hrs)	8
Maximal relative air humidity for application [%]	98

5. PHYSICAL PROPERTIES	DATA
Chemical Base	- Comp. A: HDI-Prepolymer Comp. B: Mod. Polyaspartics / polyurea
VOC-content [%]	DIN EN ISO 11890-1 / ASTM D-1259      15
Solids content [%]	DIN EN 827 / ASTM D-2697      85
Colour	- Clear.
Viscosity [mPa*s] @ 25°C	DIN EN ISO 2884-2 / ASTM D-4878      Comp. A: 50 - 100      Comp.B: 1200 – 1800      Mix: approx. 250
Density [g/cm <sup>3</sup> ] @ 20°C	DIN EN ISO 2811-1 / ASTM D-1217      Comp. A: 1.18 – 1,22      Comp. B: 1.07 – 1.11      Mix: 1.15
Density [g/cm <sup>3</sup> ]	EN ISO 1183 / ASTM D-792      1.23 ± 0.02
Tensile strength [MPa]	ISO 37-2005 / ASTM D-638      ≥ 13
Elongation at tear [%]	ISO 37-2005 / ASTM D-638      ≥ 87
Hardness [Shore D]	ISO 868-2003 / ASTM D-2240      After 3 sec.: 60 ± 5 After 15 sec.: 19

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5. PHYSICAL PROPERTIES	DATA	
Rebound resilience [%]	ISO 4662 / ASTM	≥ 5
Tear growth resistance[N/mm]	ISO 34-1 method A	≥ 8
Taber Abrasion [mg]	ASTM D-4060	< 30 ( Wheel CS17 / 1.000g / 1000 cycles)
Colour fastness T= 100°C 60 W/m <sup>2</sup> 15000 kJ/m <sup>2</sup>	DIN EN ISO 105-B06	After approx. 70 hours: ΔE*= 2,44 No chalking, no discolouration, no cracking and no blistering.
Colour fastness 8h QUV/60°C + 4h condensation/50°C UV-lamp: type A (340nm)	ASTM G154a / ISO 4892	After approx. 500 hours: No chalking, no discolouration, no cracking and no blistering.
Pull off strength [N/mm <sup>2</sup> ]	DIN EN ISO 4624 / ASTM D-4541	Concrete: ≥ 1,5
Liquid Impingement Erosion Test conditions: Water jet 135m/s	ASTM G-73-10	Wear resistant up to 240 min. against liquid impingement erosion
Max. Process temp. [°C]	ISO 11346 / ASTM D-2485	Wet: 60      Dry: -20° - +120      Peak temperature dry: 140
Storage conditions [°C]	DIN EN 12701 / ASTM	10 – 30 (in closed original drums, stored at dry and well ventilated place; beware of freezing)
Shelf life	-	Approximately 12 months in unopened containers.

\*) All measurements at 23°C @ 50%rF. Deviations at different ambient conditions have to be taken into account.

**6. APPLICATION ADVICE**

Thoroughly power stir both A and B components separately.

If the application requires the **QuickFloor 500 Vertical** to be pigmented add 10% by volume of the required pigment into the B-side component and power stir thoroughly before combining the A and B components. Only after both components have been thoroughly power stirred should they be combined and power stirred again.

The mixing ratio of comp A to comp B is 1:1 by volume. To ensure full physical characteristics are achieved within the finished coating use graduated beakers / containers to ensure accurate 1:1 by volume mixing of component A and component B.

**QuickFloor 500 Vertical** can be applied by roller onto vertical surfaces. **QuickFloor 500 Vertical** should not be applied in coats greater than 250 microns in thickness.

When applying two or more coats allow each coat to dry completely before applying subsequent coats. If recoat window is exceeded, sand slightly to produce a profile, wipe with acetone and then apply the next coat.

Use a 8 - 13 mm Nap Mohair roller when rolling **QuickFloor 500 Vertical**.

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**7. ADDITIONAL NOTES:**

In the event QuickFloor 500V is to be pigmented in a very light colour be aware that additional coats may be necessary to achieve the required hiding power. When using very light colours like white the pigment loading can be increased from 10% by volume of the B-side to 15% by volume of the B-side component.

Take note that the tack free and curing times of QuickFloor 500V are influenced by the environmental conditions at the time of application. Heat and humidity will accelerate the reactivity and curing of the QuickFloor 500V. In hot and humid environments only mix small amounts of product at a time to enable application full application of mixed product.

In cold environments the tack free and cure times can be extended considerably especially in environments less than 10C.

**8. FORM OF DELIVERY**

**Please see our price list for respective packaging units.**

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