remmers

Surface protection and waterproofing systems

Planning aids and system solutions for multi-storey and underground car parks

Surface protection systems for walls and floors

For centuries, preventing moisture from entering a building material has been an established way of protecting buildings. In his ‘Architectura Libri Decem’, Roman architect Vitruvius described the use of natural oils to make mortar water-repellent and thus more durable.

Nowadays, this function is fulfilled by modern protective substances that use high-grade active ingredients and binders to ensure effectiveness and durability. Coatings and impregnations act as a protective layer with various functions. As well as preventing harmful substances such as salt and CO_2 from penetrating into the concrete, thereby regulating the moisture balance and increasing the electrical resistance, they can also be used to improve the physical resistance of the surface. With the tested surface protection systems OS 1 – OS 14, it is also possible to achieve rigid or flexible crack bridging. What’s more, these systems open up a wide array of design possibilities.

Durable walls

High performance in a bare or coloured finish

REMMERS OS 1 (OS A)

Hydrophobic treatment

Deep hydrophobic treatment of concrete and reinforced concrete in bridge and road construction and civil engineering.

Structure	Product/Details		Application rate
1 Hydrophobic treatment	Funcosil IC	p. 78	min. 0.2 l/m² per coat (2 coats)

Application

- Water-repellent moisture protection for concrete and reinforced concrete elements
- Procedures 1.1, 2.1, 8.1

Property profile

- Classification/basic testing*: OS 1/OS A
- Highly water repellent
- Improves resistance to freeze/thaw stresses
- High penetration depth: Class II: > 10 mm
- Solvent-free
- Creamy consistency

Test certificates

- Certificate of conformity (KIWA/QDB)
- Declaration of performance
- Application directions
- TNO report

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.

REMMERS OS 2 (OS B)

Coating

Coating for facades and concrete surfaces without foot or wheel traffic (no scratch/levelling coat).

Application

- Coloured surface protection
- Facades
- Wall/support h > 0.5 m
- Ceiling/joist
- Procedures 1.3, 2.2, 2.3, 7.7, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 2
- Reduces water absorption and the ingress of substances that attack concrete and steel, w < 0.1 kg/(m²h$^{0.5}$)
- Regulates the moisture level
- Improves the freeze-thaw resistance
- Increases electrical resistance
- Reduces carbon dioxide diffusion sd_{CO2} > 50 m
- Water vapour diffusible, class: I, sd < 5 m
- Extremely colour-stable and weather resistant

Test certificates

- Certificate of conformity (KIWA/QDB)
- Declaration of performance
- Application directions
- Bodycote reaction to fire B s1 d0

Structure	Product/Details		Application rate
1 Impregnation	Primer Hydro HF	p. 79	min. 0.16 l/m²
2 Coating (pigmented)	Color PA	p. 82	min. 0.26 l/m² per coat (2 coats) (for roughness depths up to 0.2 mm)

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.

REMMERS OS 4 (OS C)

Coating

Coating for surfaces without foot or wheel traffic with scratch/levelling coat

Application

- Facades
- Wall/support h > 0.5 m
- Ceiling/joist
- Procedures 1.3, 2.2, 2.3, 6.1, 7.7, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 4/OS C
- Reduces water absorption and the ingress of substances that attack concrete and steel, w < 0.1 kg/(m²h$^{0.5}$)
- Reduces carbon dioxide diffusion sd_{CO2} > 50 m
- Water vapour diffusible, class: I; sd < 5 m
- Improves the freeze-thaw resistance
- Excellent adhesion even on old coatings without after-treatment (Color PA Fill)

Test certificates

- Certificate of conformity (KIWA/QDB)
- Declaration of performance
- Application directions
- Bodycote reaction to fire B s1 d0

Synthetic resin filled system

Structure	Product/Details		Application rate
1 Scratch coat	Color PA Fill	p. 80	approx. 0.4 kg/m² per coat (2 coats)
2 Coating (pigmented)	Color PA	p. 82	min. 0.26 kg/m² per coat (2 coats) (for roughness depths up to 0.2 mm)

Mineral filled system

Structure	Product/Details		Application rate
1 Scratch coat	Betofix Fill	p. 81	~ 1.75 kg/m²/mm layer thickness
2 Coating (pigmented)	Color PA	p. 82	min. 0.26 kg/m² per coat (2 coats) (for roughness depths up to 0.2 mm)

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.

REMMERS OS 5a (OS DII)

Coating with low crack-bridging ability

Coating with low crack-bridging ability for surfaces without foot or wheel traffic (with levelling layer).

Application

- Facades
- Wall/support h > 0.5 m
- Procedures 1.3, 2.2, 2.3, 6.1, 7.7, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 5a/OS DII
- Crack-bridging, B2 (-20°C)
- Reduces water absorption and the ingress of substances that attack concrete and steel, w < 0.1 kg/(m²h$^{0.5}$)
- Reduces carbon dioxide diffusion sd_{CO2} > 50 m
- Limited water vapour diffusibility, class: I; sd < 5 m
- Improves the freeze-thaw resistance
- UV-crosslinking (Color Flex)

Test certificates

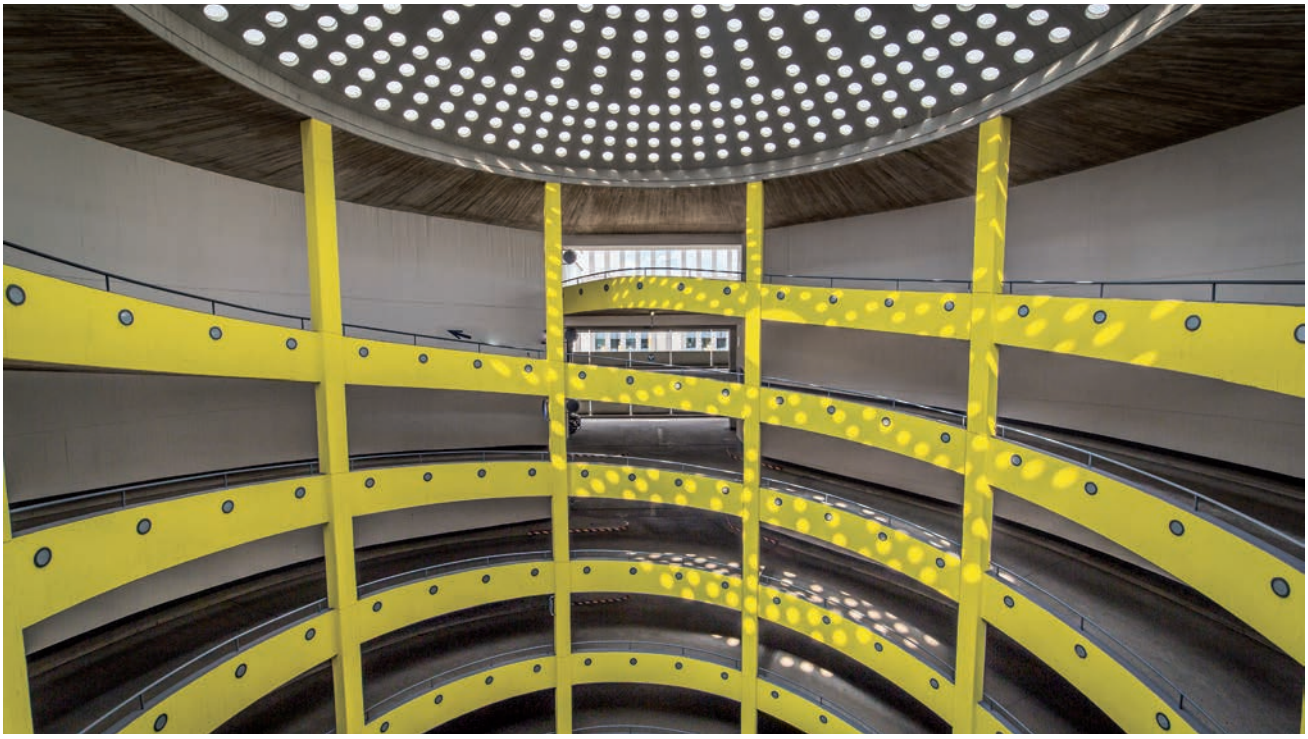
- Certificate of conformity (KIWA/QDB)
- Declaration of performance
- Application directions
- Bodycote reaction to fire B s1 d0

Synthetic resin filled system

Structure	Product/Details		Application rate
1 Scratch coat	Color PA Fill	p. 80	min. 0.70 kg/m² per coat (2 coats)
2 Coating (pigmented)	Color Flex	p. 84	min. 0.34 kg/m² per coat (3 coats)

Mineral filled system

Structure	Product/Details		Application rate
1 Scratch coat	Betofix Fill	p. 81	min. 3.55 kg/m²
2 Coating (pigmented)	Color Flex	p. 84	min. 0.34 kg/m² per coat (3 coats)



* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.

REMMERS OS 5b (OS DI)

Coating with low crack-bridging ability

Coating with low crack-bridging ability for surfaces without foot or wheel traffic (with scratch coat).

Application

- Facades
- Plinths up to 0.5 m
- Wall/support h >0.5 m
- Procedures 1.3, 2.2, 2.3, 7.7, 8.2, 8.3

Property profile

- Classification/basic testing *: OS 5b/OS DI
- Crack-bridging, B2 (-20°C)
- Crack-bridging up to 3.3 mm
- Reduces water absorption and the ingress of substances that attack concrete and steel, w < 0.1 kg/($m^2h^{0.5}$)
- Reduces carbon dioxide diffusion sd_{CO2} > 50 m
- Limited water vapour diffusibility, class: I; sd < 5 m
- Improves the freeze-thaw resistance
- Can be painted in colour

Test certificates

- Certificate of conformity (KIWA/QDB)
- Declaration of performance
- Application directions
- Fire behaviour B-s1, d0 according to DIN EN 13501-1
- Surface protection system (OS 5b / OS D I)
- AbP as mineral sealing slurry according to DIN 18533
- AbP as waterproofing of construction joints (PG-FBB)
- PZ over 3.3 mm crack bridging according to DIN EN 14891

Structure	Product/Details		Application rate
1 Scratch coat	Betofix OS 5b+	p. 83	depending on substrate
2 Coating	Betofix OS 5b+	p. 83	approx. 1.7 kg/m²/mm
3 Coating	Betofix OS 5b+	p. 83	approx. 1.7kg/m²/mm
4 Colouring (optional)	Color PA	p. 82	approx. 0.2 l/m² per coat

Intelligent flooring

A wealth of benefits and design possibilities

REMMERS DECK OS 8 (CLASSIC)

Rigid coating

Rigid coating for surfaces subjected to wheel loads and heavy mechanical stresses, for increasing the physical and chemical resistance.

Application

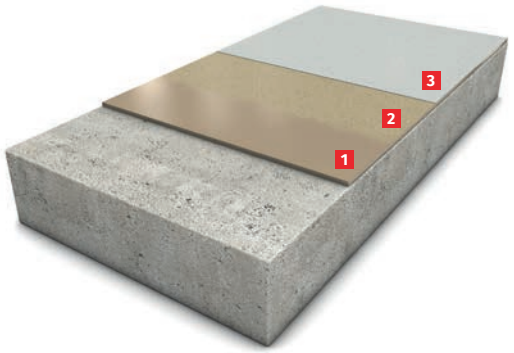
- Underground car park/floor slab
- Intermediate deck
- Ramp/spindle
- Procedures 1.3, 2.2, 2.3, 5.1, 6.1, 7.7, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 8
- Static crack bridging A2 (23°C)
  (special construction deviates from basic test)
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)
- Tested effectiveness against backfacing water

Test certificates

- Declaration of conformity (KIWA)
- Declaration of performance
- Application directions
- Wear test (PAT test VK1)
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)



Structure	Product/Details		Application rate
1 Priming filler (pigmented)	Epoxy Primer PF + Selectmix 01/03 (0.1 – 0.3 mm)	p. 89 p. 114	min. 0.9 kg/m² (plus 50%)
Alternative: Priming filler (transparent)	Epoxy ST 100 + Selectmix 01/03 (0.1 – 0.3 mm)	p. 85 p. 114	0.9 kg/m² (plus 100%)
2 Blinding	Quarz 03/08 DF (0.3 – 0.8 mm) in excess	p. 115	min. 5 – 6 kg/m²
3 Seal coat	Epoxy Color Top	p. 90	min. 0.5 – 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum.
The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 8 WD (LE)

Water vapour diffusible coating

Water vapour diffusible coating for surfaces subjected to heavy mechanical stresses, for increasing the physical and chemical resistance.

Application

- Underground car park/floor slab
- Procedures 1.3, 2.2, 2.3, 5.1, 6.1, 7.7, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 8
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)
- Tested effectiveness against backfacing water
- Water vapour diffusibility class II > 5 m

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)

Structure	Product/Details		Application rate
1 Primer	Epoxy BS 4000	p. 86	min. 0.2 kg/m²
2 Wearing layer	Epoxy BS 4000 + Selectmix 01/03 (0.1 – 0.3 mm) + water	p. 86 p. 114	min. 1.0 kg/m² + 1.0 kg/m² + 0.1 kg/m²
3 Blinding	Quarz 03/08 DF (0.3 – 0.8 mm) in excess	p. 115	min. 5 – 6 kg/m²
4 Seal coat	Epoxy BS 3000 SG or Epoxy BS 3000 M	p. 87 p. 88	min. 0.6 – 0.8 kg/m² (2 coats)

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum.
The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 10 PRO

Coating with high crack-bridging ability

Coating with high crack-bridging ability for surfaces subject to extreme mechanical stress

Application

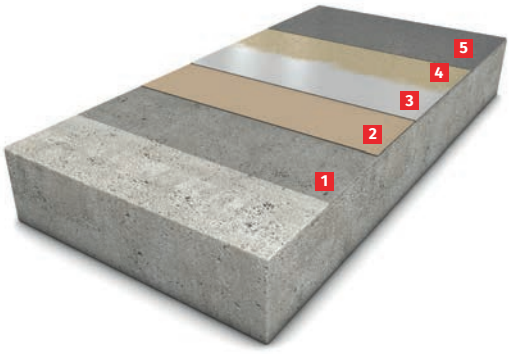
- Ramps and spindles
- Entrances and exits

Property profile

- Classification/basic testing *: OS 10
- Elongation at break > 300 % (sealing layer)
- Shore hardness A > 80 (sealing layer)
- Rapidly loadable
- Crack-bridging capacity IV_{T+V} (-20°C)
- Chemically and mechanically resistant
- Resistant to freeze-thaw cycles
- Liquid-tight
- Slip-resistant (R12 / SRT 60 Skt.)
- Flame retardant
- Early water resistant after 24 hours (12°C / 65 % r.h.)
- Abrasion resistant (BCA AR 0.5)
- Wear-resistant (PAT 15000 cycles)
- UV and weather resistant with PUR sealant

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emission behaviour (VOC/LEED classification)
- General test certificate issued by the building authorities ***



Remmers Deck OS 10 PRO (spray application)

Structure	Product/Details		Application rate
1 Primer	Epoxy Primer OS	p. 89	min. 0.3 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	approx. 0.5 kg/m²
2 Intermediate layer (sprayable)	PUA Hybrid OS pro	p. 92	min. 2.0 – 2.1 kg/m² (2 mm)**
3 Wearing layer	PUR Color VS OS pro	p. 92	min. 0.7 – 1.5 kg/m²
4 Blinding	Quarz 07/12 DF (0.7 – 1.2 mm) in excess	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Top OS or Epoxy Color Top (p. 90) or PUR Color Top OS (p. 91)	p. 91	min. 0.7 kg/m²

Remmers Deck OS 10 PRO (manual application)

Structure	Product/Details		Application rate
1 Primer	Epoxy Primer OS	p. 89	min. 0.3 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	approx. 0.5 kg/m²
2 Intermediate layer (manual)	PUR Color ZS OS pro	p. 93	min. 2.8 – 3.0 kg/m² (2 mm)**
3 Wearing layer	PUR Color VS OS pro	p. 92	min. 0.7 – 1.5 kg/m²
4 Blinding	Quarz 07/12 DF (0.7 – 1.2 mm) in excess	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Top OS or Epoxy Color Top (p. 90) or PUR Color Top OS (p. 91)	p. 91	min. 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
** Extrapolated values
*** AbP Remmers Deck OS 10 EP pro

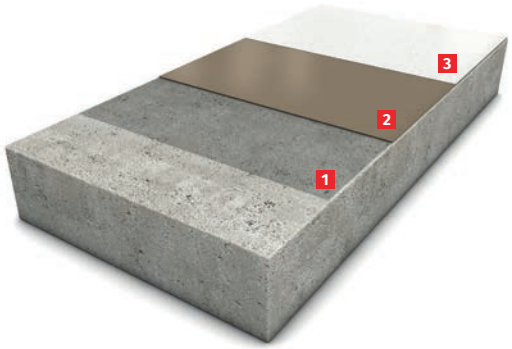
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum. The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 10 PUA PRO

Coating with high crack-bridging ability

Coating as a sealing layer with high crack bridging under protective and top layers for walkable and driveable surfaces.

With the new Remmers Deck OS 10 PUA PRO, not only ramps and spindles can be coated safely and durably, floor slabs as well as intermediate and parking decks are no challenge for the system. Thanks to the compact structure with only three layers, the result is, apart from saving up to 90 % of sand during the application process, the installation time is extremely short.



Application

- Ramps and spindles
- Floor slabs, intermediate deck, multi-storey car park
- Procedure 1.3, 2.2, 2.3, 5.1, 6.1, 8.2, 8.3

Property profile

- Classification/basic testing *: OS 10
- Elongation at break > 300 % (sealing layer)
- Shore hardness A > 80 (sealing layer)
- Manual application of all layers
- Crack-bridging capacity IV_{T+V} (-20°C)
- Chemically and mechanically resistant
- Variable surface structure (R10-R11 / SRT 55-57 Skt.)
- Wear-resistant (PAT 15000 cycles)
- UV and weather resistant
- Fast and low temperature curing (can be driven on within 48 hours)
- Short installation times
- No scattering (saves 90% of sand)

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emission behaviour (VOC/LEED classification)
- General test certificate issued by the building authorities ***

Structure	Product/Details		Application rate
1 Primer	Epoxy Primer OS	p. 89	min. 0.3 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 116	approx. 0.5 kg/m²
2 Intermediate coat (manual)	PUR Color ZS pro	p. 93	min. 2.8 – 3.0 kg/m² (2 mm)**
2 Intermediate coat (sprayable)	PUA Hybrid OS pro	p. 92	min. 2.8 – 3.0 kg/m² (2 mm)**
3 Wearing layer	PUR Color WL OS pro	p. 93	min. 2.0 – 2.5 kg/m²

Surface roughness allowance 0.3-0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
** Extrapolated values
*** Consumption PB 2.0 kg/m², slip resistance approx. R11; Consumption ABP 2.5 kg/m², slip resistance approx. R10

While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum. The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 10 M (EP/PUR)

Coating with crack-bridging ability (manual application)

Waterproofing layer with high crack-bridging ability under protective and finishing coats for surfaces with foot and wheel traffic.

Application

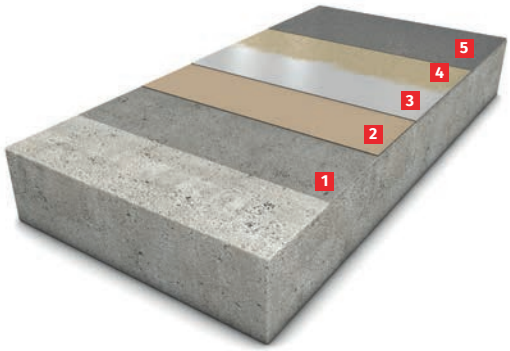
- Underground car park (special constructions)
- Intermediate deck
- Open-air deck
- Procedures 1.3, 2.2, 2.3, 5.1, 6.1, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 10
- Dynamic crack-bridging ability B4.2 (-20 °C)
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)
- UV and weather resistant

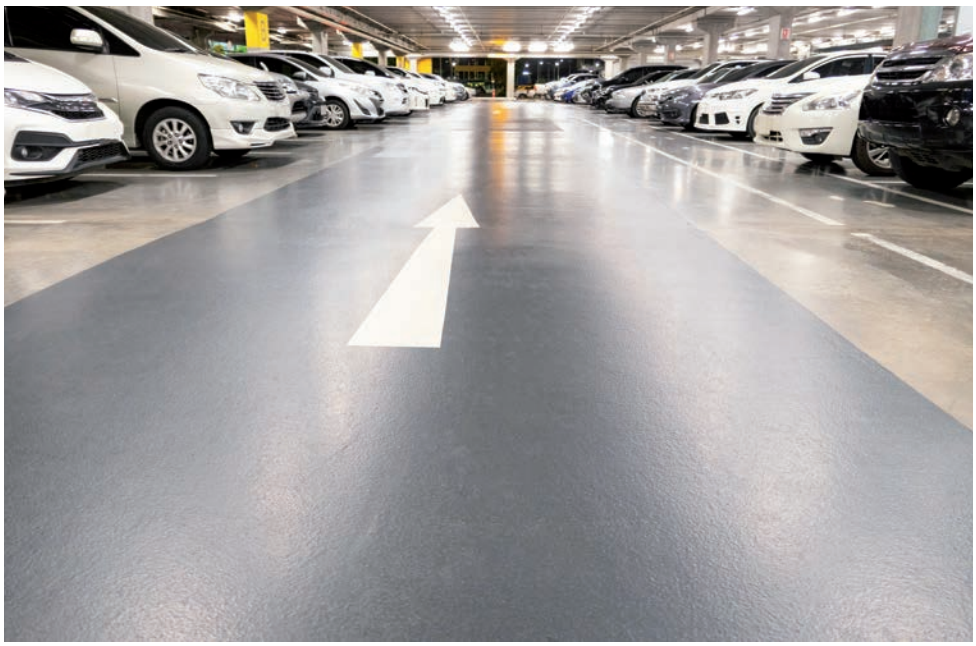
Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)
- National Test Certificate



Structure	Product/Details		Application rate
1 Primer	Epoxy Primer PF + Quarz 03/08 DF (0.3 – 0.8 mm)	p. 89 p. 115	min. 0.4 kg/m² approx. 0.8 kg/m²
2 Intermediate coat	PUR Color ZS	p. 95	min. 2.3 kg/m²** (2 mm)
3 Wearing layer	PUR Color VS + Quarz 03/08 DF (0.3 – 0.8 mm)	p. 95 p. 115	min. 1.8 kg/m² (plus 20%)
4 Blinding	+ Quarz 03/08 DF (0.3 – 0.8 mm) in excess	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Color Top or PUR Color Top OS	p. 90 p. 91	min. 0.5 – 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder



* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.

** Extrapolated values

While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum. The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 11a – II (EP/PUR)

Crack-bridging coating for exposed outdoor surfaces

Coating with elevated dynamic crack-bridging ability for surfaces with foot and wheel traffic, and surfaces exposed to weathering (two-coat system).

Application

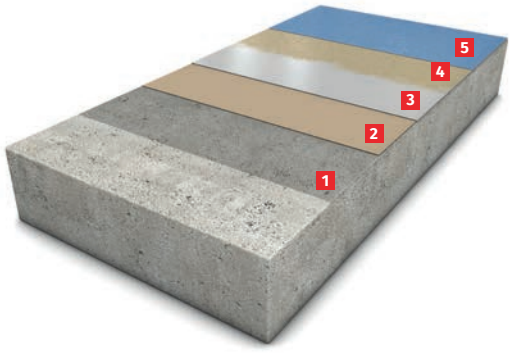
- Underground car park (special constructions)
- Intermediate deck
- Open-air deck
- Procedures 1.3, 1.4, 2.2, 2.3, 6.1, 7.7, 7.8, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 11a
- Dynamic crack-bridging ability B4.2 (-20 °C)
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)
- UV and weather resistant

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)



Structure	Product/Details		Application rate
1 Primer	Epoxy Primer PF	p. 89	min. 0.4 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	approx. 0.8 kg/m²
2 Intermediate coat	PUR Color ZS	p. 95	min. 1.7 kg/m² ** (1.5 mm)
3 Wearing layer	PUR Color VS + Selectmix 01/03 (0.1 – 0.3 mm)	p. 95 p. 114	min. 1.8 – 2.0 kg/m² (plus 20%) (3 mm)
4 Blinding	Quarz 03/08 DF (0.3 – 0.8 mm) in excess	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Color Top or PUR Color Top OS	p. 90 p. 91	min. 0.5 – 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
** Extrapolated values
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum.
The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 11b – II

Crack-bridging coating for covered surfaces

Coating with elevated dynamic crack-bridging ability for covered or non-exposed surfaces with foot and wheel traffic.

Application

- Underground car park (special constructions)
- Intermediate deck
- Procedures 1.3, 1.4, 2.2, 2.3, 6.1, 7.7, 7.8, 8.2, 8.3

Property profile

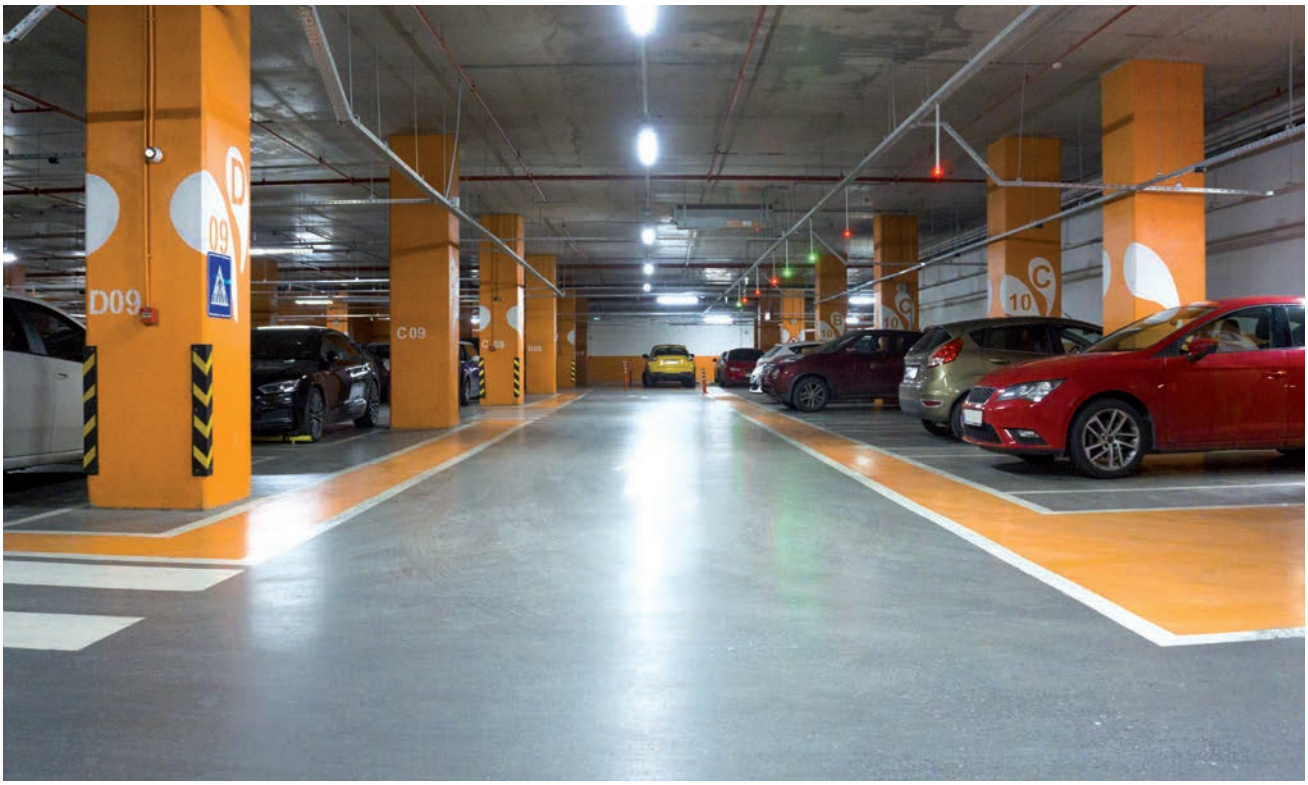
- Classification/basic testing*: OS 11b
- Dynamic crack-bridging ability B3.2 (-20 °C)
- Static crack-bridging class A3 > 0.5 mm (-10 °C)
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)

Structure	Product/Details		Application rate
1 Primer	Epoxy Primer PF	p. 89	min. 0.4 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	approx. 0.8 kg/m²
2 Wearing layer	PUR Color ZS + Selectmix 01/03 (0.1 – 0.3 mm)	p. 95 p. 114	min. 2.1 – 2.2 kg/m² (plus 30%)
3 Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	min. 5 – 6 kg/m²
4 Seal coat	Epoxy Color Top	p. 90	min. 0.5 – 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder



* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum.
The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 14 PRO

Coating with high crack-bridging ability

Coating with high crack-bridging capacity for areas subject to **extreme mechanical stress**

Application

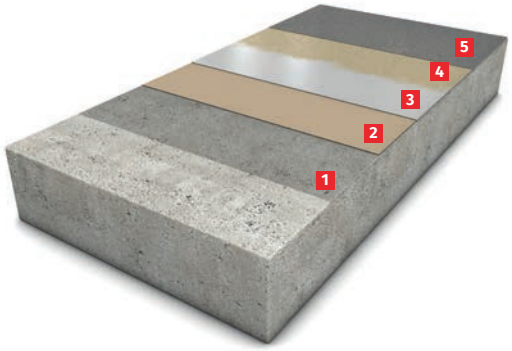
- Ramps and spindles
- Entrances and exits

Property profile

- Classification/basic testing*
- Elongation at break > 300 % (sealing layer)
- Shore hardness A > 80 (sealing layer)
- Quickly loadable
- Crack-bridging capacity IV_{T+V} (-20°C)
- Chemically and mechanically resistant
- Freeze-thaw resistant
- Liquid-tight
- Slip-resistant (R12 / SRT 60 Skt.)
- Flame retardant
- Early water resistant after 24 hrs (12°C / 65 % RH)
- Abrasion resistant (BCA AR 0.5)
- Wear-resistant (PAT 15000 cycles)
- UV and weather resistant with PUR sealant

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emission behaviour (VOC/LEED classification)



Structure	Product/Details		Application rate
1 Primer	Epoxy Primer OS	p. 89	min. 0.3 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 116	approx. 0.5 kg/m²
2 Intermediate coat (sprayable)	PUA Hybrid OS pro	p. 92	min. 2.0 – 2.1 kg/m² (2 mm)**
2 Intermediate coat (manual)	PUR Color ZS OS pro	p. 93	min. 2.8 – 3.0 kg/m² (2 mm)**
3 Wearing layer	PUR Color VS OS pro	p. 92	min. 1.5 kg/m²
4 Blinding	Quarz 07/12 DF (0.7 – 1.2 mm) in excess	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Top OS or Epoxy Color Top (p. 90) or PUR Color Top OS (p. 91)	p. 91	min. 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.

** Extrapolated values

While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum. The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

REMMERS DECK OS 14 (EP/PUR)

Coating with high dynamic crack-bridging ability

Coating with high dynamic crack-bridging ability including wearing layer for surfaces with foot and wheel traffic, and surfaces exposed to weathering (two-coat system).

Application

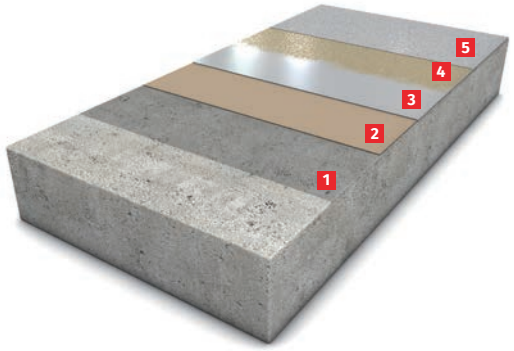
- Underground car park (special constructions)
- Intermediate deck
- Open-air deck
- Procedures 1.3, 2.2, 2.3, 5.1, 6.1, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 14***
- Dynamic crack-bridging ability B4.2 (-20 °C)
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)
- UV and weather resistant

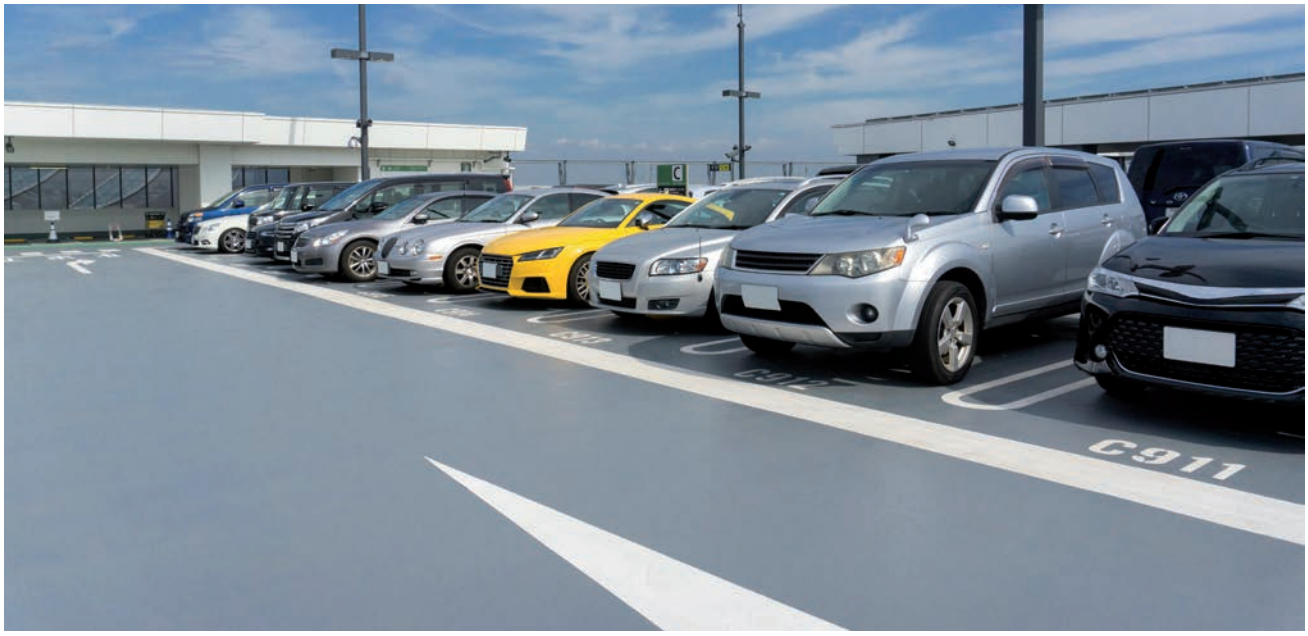
Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)



Structure	Product/Details		Application rate
1 Primer	Epoxy Primer PF	p. 89	min. 0.4 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	approx. 0.8 kg/m²
2 Intermediate coat	PUR Color ZS	p. 95	min. 2.3 – 2.4 kg/m² (2 mm)**
3 Wearing layer	PUR Color VS + Selectmix 01/03 (0.1 – 0.3 mm)	p. 95 p. 114	min. 2.5 – 2.6 kg m² (plus 20%)** (4 mm)
4 Blinding	Quarz 03/08 DF (0.3 – 0.8 mm) in excess	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Color Top or PUR Color Top OS	p. 90 p. 91	min. 0.5 – 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder



* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
** Extrapolated values *** Designations as per preliminary Maintenance Guideline (2018) and Technical Rule for Concrete Repair (2020)
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum.
The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.

One system for virtually limitless applications

The Remmers Deck OS 11a system has been optimised so that the products it uses also meet the elevated requirements concerning crack bridging and wear resistance of the OS10/OS14 product groups at the same application rates.

Advantages:

- Maximum product performance at low application rates
- Maximum flexibility thanks to streamlined selection of versatile system products
- Maximum application flexibility from floor slabs to parking decks
- 3in1 test report: one test report for 3 systems

REMMERS DECK M FLEX (EP/PUR)

Coating with high dynamic crack-bridging ability

Universal coating with high crack-bridging ability for all surfaces with foot and wheel traffic.

Application

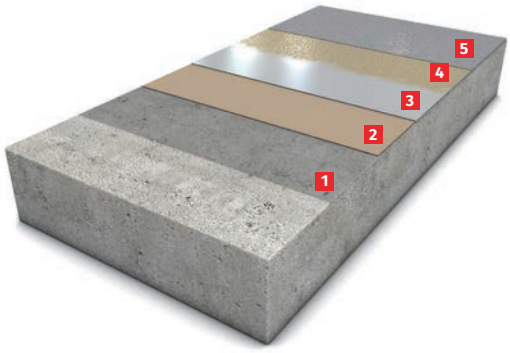
- Underground car park (special constructions)
- Intermediate deck
- Open-air deck
- Parking deck
- Procedures 1.3, 2.2, 2.3, 5.1, 6.1, 8.2, 8.3

Property profile

- Classification/basic testing*: OS 10 / OS 11a / OS 14***
- Dynamic crack-bridging ability B4.2 (-20 °C)
- Resistant to chemical and mechanical stresses
- Resistant to freeze/thaw stresses
- Liquid tight
- Slip resistant
- Fire resistant
- Early water resistance after 24 hrs (12°C / 65% RH)
- UV and weather resistant

Test certificates

- Certificate of conformity
- Declaration of performance
- Application directions
- Sustainability (DGNB product classification)
- Emissions behaviour (VOC/LEED classification)



Structure	Product/Details		Application rate
1 Primer	Epoxy Primer PF	p. 89	min. 0.4 kg/m²
Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	approx. 0.8 kg/m²
2 Intermediate coat	PUR Color ZS	p. 95	min. 1.7 – 1.8 kg/m² (1.5 mm)** min. 2.3 – 2.4 kg/m² (2 mm)**
3 Wearing layer	PUR Color VS + Selectmix 01/03 (0.1 – 0.3 mm)	p. 95 p. 114	min. 1.9 – 2.0 kg/m² min. 2.5 – 2.6 kg/m² (plus 20%)** (3 mm / 4 mm)**
4 Blinding	Quarz 03/08 DF (0.3 – 0.8 mm)	p. 115	min. 5 – 6 kg/m²
5 Seal coat	Epoxy Color Top or PUR Color Top OS	p. 90 p. 91	min. 0.5 – 0.7 kg/m²

Roughness depth surplus approx. 0.3 – 0.5 kg/m² binder

* Classification as per DAfStb guideline 'Protection and maintenance of concrete structures' and the DIBt Technical Rule. Test reports as per DIN EN 1504-2 and DIN V 18026.
** Extrapolated values *** Designations as per preliminary Maintenance Guideline (2018) and Technical Rule for Concrete Repair (2020)
While preparing the substrate, the roughness depth must not be increased more than necessary. However, it must comply with roughness depth class RT0.3 (mean roughness depth 0.3 – 0.5 mm) at a minimum.
The exact application rates must be determined on site. The table value for roughness depth compensation serves merely as a non-binding calculation aid.