

weber.san 163 WTA

Damp-proof basecoat render

Mineral levelling render for uneven walls and salt-storage damp-proof render for masonries with high salt contamination (EN 998-1) and damp masonries

Fields of application

weber.san 163 WTA is a component of the masonry repair system weber.san with damp-proof renders/plasters.

Particularly dedicated for use in case of high salt content and prevents migration of dissolved salts into the post-applied damp-proof render/plaster.

Due to its porous structure it is able to take up damaging salt crystals.

Suitable on the internal side of basement walls below ground level and on the external side of masonries above ground level (splash water areas/facade socket areas), which are damaged by moisture and salt-contaminated.

To be overcoated with a damp-proof render/plaster like weber.san 161 or 162 WTA.

Furthermore for levelling great unevenesses of damp and salt-contaminated masonry walls. For use indoors and outdoors.

Description

weber.san 163 WTA is a factory-mixed and mineral dry mortar according to EN 998-1. It is compliant with the WTA leaflet 2-9-04 (WTA = International Association for Science and Technology of Building Maintenance and Monuments Preservation). With official WTA test certificate (Germany).

Composition

Cement, lightweight aggregates, moisture-regulating additives, additives for better workability and adhesion

Main features

- · purely mineral
- · good stability on walls
- · high yield
- · high salt-storage capacity, thanks to its high air content



- · highly open to water vapour diffusion
- · resistant to frost and weathering
- · low capillary water absorption
- · easy application
- · for mechanical and manual application
- · for use indoors and outdoors

Technical values

Application thickness: 10 - 20 mm

Yield: approx. 900 liters/ton

Solid mortar density: approx. 1.3 kg/dm³

Air void content: approx. 10% by volume

Air void content of fresh mortar: approx. 45% by volume

Air void content of solid mortar: approx. 55% by volume

Flexural strength (7 days): 1 N/mm²

Compressive strength (28 days): 2 N/mm²

(strength class CS II – EN 998-1)

Water vapour diffusion resistance value

(µ) (EN 998-1):

Class of capillary water absorption: W 0

Water absorption (24 hours): ≥ 1.0 kg/m²

Water penetration depth (24 hours): approx. 5 mm

Pull-off strength: ≥ 0.08 N/mm²

^(fracture pattern A, B, C)

Thermal conductivity (EN1745): ≤ 0.39 W/m.K

(tabulated 50%)

≤ 25

Mortar group (DIN 18550) P II

Class of reaction to fire (EN 998-1): A 1 (non-combustible)

Quality control

weber.san 163 WTA is subject to a regular quality control by external monitoring and self-monitoring according to EN 998-1 and the WTA guidelines.



General notes

- Do not add any foreign substances during mixing and application.
- Temperature of air, materials and substrate during application and drying: ≥ +5°C
- Protect the freshly applied render/plaster from rain so as to avoid among others efflorescence and from too quick dehydration, in order to ensure an optimal hardening.
- Comply with the national standards and/or guidelines (for ex. DIN 18550); if not issued and if necessary, request technical advice.
- · Remove cement laitance (hard sinter skin).
- The consumption figures mentioned in this document refer to the minimum layer thickness of the render. Due to specific substrates and application variations the consumption might vary. Exact consumption must be determined on a job site mock-up (trial area).
- Adjacent building parts must be separated from the built-in render system.

Substrate preparation

- Remove old renders/plasters down to the load-bearing substrate.
- Scrape brittle masonry joints to a depth of approx. 2 cm and clean the whole surface by mechanical means. The masonry joint network will be filled with **weber.san 163 WTA**.
- · Replace or supplement damaged masonries.
- Extend the substrate preparation approx. 1 m beyond the limit of moisture damages; for tailing inner walls or vault ceilings prepare the substrate on at least 1 meter, measured from the exterior wall.
- Dispose of refuse old salt-contaminated renders/plasters without delay.
- · Damp masonries must have dried sufficiently.
- The substrate preparation must be adapted to the specific job site conditions.

Working instructions

Mixing

- Mechanical application: the mortar can be applied with all conventional render machines (with additional mixing unit, conveying and spraying equipment). For full information request technical advice.
- Manual application: mix the bag content (30 kg) with approx. 8.5 liters of water until lump-free, using an electric drill and an appropriate stirrer.



Application

- Apply weber.san 163 WTA in a thickness of 10 mm 20 mm, either by using the throw-on technique with a triangular hawk trowel or a flat trowel or by spraying, on the fully hardened bondcoat weber.san 160 WTA.
- In case of strongly absorbent substrates or substrates with different porosity weber.san 163
 WTA is applied "wet-in-wet" in 2 operations; the thickness of the first layer corresponds to 2/3 of the total thickness.
- In case of one-layer application rule level the render flush and perpendicular with a straight edge (for ex. aluminium beam), avoiding honeycombs or gaping holes. Rake horizontally with a tiler trowel (notch 6 8 mm) or the flat trowel **weber.sys Aufstreichkelle**, equipped with the 5-mm triangular notch blade Zahnleiste no. 2. Afterwards apply the damp-proof render/plaster **weber.san 161** or 162 WTA.
- In case of two-layer application (whenever the substrate unevenness requires a thicker leveling) rake the 1st layer horizontally without delay with a tiler trowel (notch 6 8 mm) or the flat trowel weber.sys Aufstreichkelle, equipped with the 5-mm triangular notch blade Zahnleiste no. 2 before applying the 2nd layer. Afterwards apply the damp-proof render/plaster weber.san 161 or 162 WTA.
- Clean mixing equipment and tools with water (fresh product). Hardened material can only be removed mechanically.

Practical information

Grain size:

< 1 mm

Colour:

natural grey

Application thickness:

10 mm - 20 mm

Water demand:

8.5 liters / 30 kg

Tools:

Render machine with additional mixing unit or electric drill + stirrer, triangular hawk trowel, flat trowel, tiler trowel (notch 6 - 8 mm) or flat trowel **weber.sys Aufstreichkelle** + 5-mm triangular notch blade Zahnleiste no. 2, wooden float, sponge float or felt float

Storage

The product can be stored at least 12 months in its original unopened packaging, if kept dry and protected from moisture.



Consumption / yield

at least 20 mm thickness: approx. 22.0 kg/m 2 approx. 1.4 m 2 / 30 kg

Packagings

Туре	Sales unit	Number / euro-pallet
Paper bag	30 kg	42 bags

The information in this technical data sheet is based on our current knowledge and experience at the time of printing. However, they do not guarantee in the legal sense.