

Technical Instruction Sheet

page 1 of 2

Characteristics:

AKEMI Marble Filler 1000 Transparent Waterclear and Marble Filler Transparent L-Special Waterclear are liquid, gel-like 2-component products based on UV-stabilised, unsaturated polyester resins dissolved in styrene. The products are distinguished by the following qualities:

- wide field of application due to different consistencies
- no colour of their own, therefore suited for light, mainly transparent-crystalline natural stones
- due to slow hardening and low tensions bigger defects, corners and edges can be filled
- easily polishable
- very good adhesion on natural stones
- resistant to water, petrol and mineral oils.

Field of Application:

Marble Fillers Waterclear are mainly used in stone processing industry for filling and bonding light or white, transparent-crystalline natural stones s.a. Thassos, Carrara, Onyx, Palisandro, Estremoz or the like. Due to the liquid, colourless-transparent appearance waterclear bonding can be made which maintain the stereoscopic structure of the stone. By adding little quantities of AKEMI Polyester Colouring Pastes to Marble Filler Transparent Waterclear L-Special, corners and edges can be modelled or bigger holes can be filled. Thus an appearance very similar to the stone or bonding joints which are almost invisible can be achieved. When working with crystalline natural stones we recommend to mix some crushed granular material in the filler to imitate the crystal structure of the stone.

Instructions for Use:

1. The surface to be treated must be clean, completely dry and slightly roughened.
2. Colouring is possible by adding AKEMI Polyester Colouring Pastes up to max 5 %. Dilution is possible by adding Dilution S up to 5 %.
3. Add 1 to 2 g of hardener B liquid (35 - 70 drops) to 100 g of filler.
4. Mix both components thoroughly. The mixture can be worked for about 12 to 14 minutes (20°C).
5. After 6 to 8 hours approx. the treated parts can be exposed to strain, after 12 hours approx. they can be further processed.
6. The hardening process is accelerated by heat and delayed by cold.
7. Tools can be cleaned with AKEMI Nitro-Dilution.

Special Hints:

- Use AKEMI Liquid Glove to protect your hands.
- The products only harden with hardener B liquid.
- Hardener portions higher than 2 % cause more or less intensive discolouring.
- Hardener portions less than 1 % and low temperatures (under 5°C) considerably delay hardening.
- Permanent influence of heat (> 50°C) causes discolouring and reduces the bonding properties.
- Limited durability of bondings which are frequently exposed to humidity and frost.
- Moderate adhesion on fresh, alkaline building materials (e.g. concrete, concrete bricks).
- The hardened filler has a slight tendency to yellowing.
- Once hardened, the filler can no longer be removed by solvents. Removal is only possible mechanically or by higher temperatures (> 200°C).
- Being worked properly, the hardened filler is generally recognised as not injurious to health.

Safety Measures:

see EC Safety Data Sheet

Technical Data: Colour: Waterclear: colourless transparent
Waterclear L-Special: colourless milky-turbid
Density: 1.12 - 1.18 g/cm³

Working time / min.:

a) at 20°C

1% of hardener:	20 - 24
1.5% of hardener:	16 - 20
2% of hardener:	12 - 16

b) with 1.5% of hardener

at 10°C:	35 - 40
at 20°C:	16 - 20
at 30°C:	7 - 10

Mechanical properties:

Tensile strength DIN 53455:	50 N/mm ²
Bending strength DIN 53452:	80 N/mm ²
Compressive strength DIN 53454:	1600 N/mm ²
E-module:	3700/Nmm ²

Shelf life: 1 year approx. if stored in cool place free from frost in its tightly closed original container.

Notice:

The above information is based on the latest stage of our development and application technology. Due to a multiplicity of different influencing factors, this information – as well as other oral or written technical advises – must be considered as non-binding hints. The user is obliged in each particular case to conduct performance tests, including but not limited to trials of the product, in an inconspicuous area or fabrication of a sample piece.