

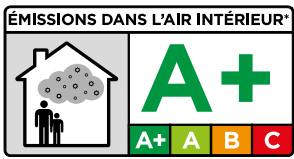


BENFERFLEX N

Flexible adhesive, thixotropic, frost resistant

- Ideal for exterior application
- Ideal for porcelain stoneware
- Ideal for large sizes
- Elevated flexibility
- Can be spread in a layer of up to 15 mm
- Also on heated screeds
- **FLEXIBLE, deformability > 2,2 mm**
- **CE**

This product improvable with CEMLATEX 600



TECHNICAL FEATURES:

White and grey flexible adhesive in powder, thixotropic, formed by cement, aggregates of selected consistency, synthetic resins and special additives. Especially studied to lay quickly and safely all kind of tiles, even with non-absorbent surfaces or subjected to light dimensional variations.

AREAS OF APPLICATION:

Application of gres, single-fired and non-absorbing tiles and natural stones, stable at humidity in:

- Floors and wall tiles, internal and external
- Rooms subjected to heavy loads
- Application of insulation panels made of polystyrene and cork

CONTRACT ITEMS SPECIFICATIONS:

Ceramic floor and wall tiles must be laid with a cementitious, one component adhesive, highly flexible, applicable with trowel in thickness up to 15 mm, conforming to norm EN 12004 class C2TE such as BENFERFLEX N by Benfer Schomburg s.r.l..



TECHNICAL ASSISTANCE



INSURANCE GUARANTEE



TECHNICAL MEETINGS



PROFESSIONAL USE

SUITABLE SUBSTRATES:

- Concrete
- Cement-based screeds, standard or heated with water system or electric resistance
- Cement-based plaster
- Flexible waterproofing membranes made up of cement and polymers (ACQUASHIELD-2KF)
- Cement based blocks

INSIDE ONLY:

- Fluid cement-based screeds (prior application of an appropriate primer if demanded), standard or heated with water system
- Fluid anhydrite-based screeds (prior application of an appropriate primer), standard or heated with water system
- Old ceramic tiles (prior application of an appropriate primer)
- Standard or waterproof plasterboard
- Elastomeric waterproofing membranes (ACQUASHIELD-GEL)
- Wooden boards (prior application of an appropriate primer)

MAXIMUM SIZES:

- Internal floors with maximum length of longest tile side up to 90 cm.
- External floors with maximum length of longest tile side up to 60 cm.
- Internal walls with maximum length of longest tile side up to 90 cm
- External walls with maximum length of longest tile side up to 60 cm.

See the choice table to verify size limits by tile/substrates characteristics.



METHODE OF USE:**SUBSTRATES PREPARATION:**

Foundations must be free from oils, greases or powders. Eventual painted surfaces must be in best condition, washed and degreased; in the contrary case, it is indispensable to eliminate accurately any from the plaster. For laying on old floors of ceramics tiles, gres, marble or similar materials, it is necessary to ensure that these are properly fixed to the foundation, washed and degreased. Do not use on substrates in gypsum anhydrite or on particularly absorbent substrates without first treating them with BENFERPRIM.

MIXTURE PREPARATION:

Mix BENFERFLEX N with 28% of water (pour the powder in the water and not vice versa) until you obtain a homogeneous, bright, plastic adhesive. Leave it rest for 5 minutes, and then re-mix rapidly. The adhesive is now ready for use and it must be used within 2 hours.

TILING:

INTERIOR: Lay the tiles while exerting a good pressure on the tiles surface, so that contact between tile and adhesive will be at least of 80% of their surface for wall coatings and of 95-100% for floor.

EXTERIOR: The contact between tile and adhesive must be 95-100% so to avoid the eventual rain infiltrations that in case of frost could cause the detachment of the tiles.

We suggest to do the same things even inside for:

- Floor tiles largest than 500 cm² with water absorption of the tiles $\geq 0.5\%$ (e.g. porcelain tiles)
- Floor tiles largest than 1100 cm² with all the other types of tiles
- Wall tiles largest than 120 cm² with water absorption of the tiles $\geq 0.5\%$ (e.g. porcelain tiles)
- Wall tiles largest than 500 cm² with all the other types of tiles
- Special applications such as industrial refrigerators, basins, swimming pools, etc.

It is indispensable always to leave a joint of at least 3 mm between tile and tile, and for laying wall tiles it is necessary to respect the expansion joints of the structure, which must be filled up elastically, and the joints between wall and wall and between wall and floor. In any case expansion or perimetric joints must be left every 20 m².

FULL SERVICE:

At 23°C and 50% of relative humidity the open time is of about 30 minutes. Under unfavourable conditions these time intervals reduce notably, therefore it is important to spread the adhesive gradually, using little quantities every time, and to verify often that it hasn't formed a superficial film before tiling. To make better the workability especially during the summer, it is useful to damp the working milieu and to eliminate the eventual currents of air. During the first 48 hours following the tiling the glue cannot stand the frost. The floors tiled with BENFERFLEX N can be opened to foot-traffic cautiously after about 24 hours for grouting (48 hours at <15°C), and they are ready for normal traffic after 7 days.

CLEANING: The cleaning of the coating must be effected by means of a damp cloth or sponge when the adhesive has already started to set and it can be done by using greater quantity of water only after 48 hours from the tiling.

PACKAGING: BENFERFLEX N is available in 25 kg poly-lined bags and 1.125-1.500 kg pallet loads.

STORAGE: In the original unopened packaging in a dry and cool place.

SHELF LIFE: 12 months from the date printed on the packaging.

CONSUMPTION: It depends on the foundation and the type of trowel utilized.

| Support | Tiled surface | Laying System | Trowel type mm. | Consumption kg/m ² |
|-------------|---------------|----------------|-----------------|-------------------------------|
| Int. floor. | S<1100 | simple gluing* | 8/10 | 4/5 |
| | 1100<S<3600 | double gluing | 10/15 | 6/7 |
| Ext. floor. | 400<S<1100 | double gluing | 8/10 | 5 |
| | 1100<S<2500 | double gluing | 10/15 | 6/7 |
| Int. wall | S<400 | simple gluing | 6 | 3,5 |
| | 400<S<2000 | double gluing | 8/10 | 5/6 |
| Ext. wall | S<400 | double gluing | 6 | 4,5 |
| | 400<S<2000 | double gluing | 8/10 | 5/6 |

* In rooms classified as U4 P4S and swimming pools, double coating

PRODUCT TECHNICAL DATA

| | |
|--------------------------------------|--|
| Classification EN 12004: | C2 TE |
| Basis: | Cement, aggregates, additives |
| Colour: | Grey and white |
| Apparent mass volume: | 1,25 kg/dm ³ |
| Maximum grain size: | 0,5 mm |
| Storage and Duration: | 12 months in the original closed package in a cool dry place |
| Danger of toxicity: | No. The product may cause irritation to the eyes and skin due to presence of cement. |
| Inflammable: | No |
| Mixture ratio: | 28 %, 7 lt water/25 kg bag |
| Mixture consistency: | Creamy |
| Density of paste: | 1,65 kg/dm ³ |
| Application temperature: | From + 5°C to + 35°C |
| Pot Life: | About 3 hours |
| Open time: | 30 minutes* |
| Setting time: | About 15 minutes* |
| Vertical sliding to EN 1308: | < 0,5 mm |
| Maximum thickness: | 15 mm |
| Foot traffic after: | 12 hours* |
| Grouting: | 12 hours* |
| Full service: | 7 days* |
| Final hardening: | 28 days* |
| Final performance: | |
| Adhesion at start (after 28 days): | > 1,0 N/mm ² |
| Adhesion after the effect of heat: | > 1,0 N/mm ² |
| Adhesion after immersion into water: | > 1,0 N/mm ² |
| Adhesion after frost-thaw cycles: | > 1,0 N/mm ² |
| Deformability according EN 12004: | 2,2 mm |
| Temperature resistance: | From -30°C to +90°C, * at 23°C and 50% relative humidity |

PLEASE NOTE: The information given in this chart is based on our best experience and indicative only. It must in any event be verified by the end user, who assumes all liabilities deriving from utilization of the product.