



ATLAS INTER adhesive for internal use

- for works in the interiors of a building
- for bathrooms, kitchens and corridors
- enables "from-top-to-bottom" fixing of tiles
- enables surface finishing on mineral substrates
- enables bricklaying with thin joint



**ECONOMICAL
PRICE**

Use

Recommended for fixing ceramic tiles indoors – in bathrooms, kitchens and corridors, etc.
Smooths mineral substrates – can be used for surface finishing on walls and jointless screeds.
Enables bricklaying with thin joint – the adhesive can be used for small bricklaying works during finishing interiors.

Types of substrates – concrete, repair mortars, cement plasters, cement-lime plasters, gypsum plasters, cement and anhydrite screeds, not plastered walls of brick, ceramic porous materials, aerated concrete and silicate elements.

Types of tiles – low and medium size ceramic (glazing tiles, terracotta, mosaic), cement and stoneware tiles.

Properties

Reduced slip enables placing the tiles from top to bottom – optimum selection of consistency and thickness of adhesion layer in accordance with recommendations eliminates slip of the adhesive - it makes possible to start works from the top of the wall and avoid fixing cut tiles on its exposed surface.

Economical composition – optimum selection of components enables reaching low price of the adhesive and the optimum durability of the joint between the tiles and the substrate inside buildings.

Technical data

ATLAS INTER is manufactured as a dry mix of cement binder, aggregates and specially selected modifying agents.

Bulk density (of dry mix)	ca. 1.4 kg/dm ³
Wet density (after mixing)	ca. 1.8 kg/dm ³
Dry density (after setting)	ca. 1.65 kg/dm ³
Mixing proportions (water/dry mix)	0.21 – 0.23 l / 1 kg
	4.2 - 4.6 l / 20 kg
Min./max. bed thickness	2 mm / 5 mm
Adhesive preparation temperature, substrate and ambient temperature during work	from +5°C to +25°C
Maturing time	ca. 5 minutes
Pot life	ca. 3 hours
Open time	min. 20 minutes
Tile adjustment time	10 minutes
Floor access	after ca. 24 hours
Grouting	after ca. 24 hours
Full load	after ca. 3 days

The time shown in the table is recommended for the application at a temperature of about 23 °C and of 55% humidity

Technical requirements

The product conforms to PN-EN 12004+A1:2012 standard for C1T class adhesive. EC Declaration of Performance No. 061/CPR.

CE 2007, 0767	PN-EN 12004 + A1:2012 (EN 12004:2007 + A1:2012)
Cement-based adhesive of normal setting and reduced slip, for indoor use, for walls and floors	C1T type
Reaction to fire - class	A1 WT A1 _{fl} WT
Tensile adhesion strength - initial adhesion	≥ 0.5 N/mm ²
Durability - adhesion after: - thermal ageing - water immersion - freeze-thaw cycles	N/A ≥ 0.5 N/mm ² N/A
Open time - tensile adhesion after time not shorter than 20 minutes	≥ 0.5 N/mm ²
Slip	≤ 0.5 mm
Release - hazardous substances	See: Safety Data Sheet



Application

Substrate preparation

The substrate should be:

- **stable** – sufficiently rigid and sufficiently long stabilized. The stabilizing time is, respectively:
 - for new cement plasters and jointless floors (made from ready-to-use ATLAS mortars), min. 1 week for each 1 cm of thickness,
 - for subfloors ATLAS POSTAR 80, ATLAS SMS 15 and ATLAS SMS PLUS – min. 24 hours,
 - for ATLAS POSTAR 20 subfloor - min. 4-5 days,
 - for self-levelling compounds ATLAS TERPLAN N or ATLAS TERPLAN R - min. 3 days
 - for anhydrite subfloors – at least 2 – 3 weeks, use ATLAS ZW 330 to even the substrate
 - for concrete substrates - at least 28 days,
- **dry or matt-wet**,
- **even** – maximum adhesive thickness is 5 mm,
- **clean** – free from layers that can deteriorate the adhesiveness, especially dust, dirt, lime, oils, greases, wax, residues of oil and emulsion paints; a substrate covered with algae, fungi, etc. must be cleaned with ATLAS MYKOS agent.
- **primed with one of ATLAS primers:**

Cementitious substrates:

- UNI-GRUNT or UNI-GRUNT PLUS – if the substrate is excessively absorptive,
- GRUNTO-PLAST – if the substrate absorptivity is low, or it is covered with layers limiting the strength of adhesion.

Gypsum plasters and anhydrite subfloors strictly require, before tiles fixing, priming with ATLAS UNI-GRUNT emulsion or ATLAS GRUNTO-PLAST compound.

Adhesive preparation

Pour the adhesive from the bag into a container with the suitable amount of water (see Technical Data for proportions) and mix, using a drill with a mixer, until homogenous. The dispersed adhesive should be left to rest for 5 minutes and then remixed. So prepared adhesive should be used up within ca. 3 hours.

Adhesive application

The adhesive should be applied to the surface with a steel trowel or a smooth float and then distributed evenly and shaped (possibly in one direction) using a notched trowel.

Placing the tile

After the application, the adhesive retains its properties for ca. 20 minutes (depending on the parameters of the substrate and the environment). Within this time, the tile must be placed and pressed against it (after pressing the tile, its contact surface with the adhesive should be as large as possible - min. 2/3 of the surface of the tile). For floor tiles, it is recommended that the adhesion surface be complete.

Tile adjustment

The position of a tile can be slightly adjusted for about 10 minutes after it is pressed (at a temperature of about 23 °C and of 55% humidity)

Grouting and using the tiled floor

Grouting can start after the adhesive is set, not earlier than 24 hours after fixing the tiles. The adhesive achieves its functional strength after 3 days.

Consumption

Average consumption: ca. 1.5 kg of dry mix / 1 m² / 1 mm adhesive layer – for complete filling the space under the tile. It depends on the smoothness of the surface and the bottom side of the tile.

Tile size	Trowel notch size [mm]	Thickness of adhesive layer [mm]	2/3 surface contact [kg/m ²]	Full surface contact [kg/m ²]
mosaic up to 2 × 2 cm	4.0	2.0	2.0	3.0
small size up to 10 × 10 cm	4.0 – 6.0	3.0	3.0	4.5
medium size up to 30 × 30 cm	6.0 – 8.0	4.0	4.0	6.0
	6.0 – 8.0	5.0	5.0	7.5



Important additional information

- The tiles must not be soaked before fixing.
- While fixing the tiles on weak substrates whose bearing capacity is difficult to establish (e.g. dusty, difficult to clean), it is recommended to perform an adhesion test by fixing a tile and checking the bond after 48 hours.
- Open time – from the moment of application of the adhesive to the moment of placing the tiles upon it – is limited. In order to check if it is still possible to fix tiles, performing a test is recommended. It consists in pressing your fingers against the adhesive. If the adhesive remains on the fingers, you may fix tiles. If the fingers are clean, the old layer of the adhesive has to be removed and a new one applied.
- The excess of adhesive appearing in the joints on pressing the tiles has to be removed at once.
- The tools must be cleaned with clean water directly after use. Difficult to remove residues of the set adhesive can be removed with the ATLAS SZOP agent.
- Irritant - contains cement. Irritating to respiratory system and skin. Risk of serious damage to eyes. May cause sensitisation by skin contact. Due to its form - powder, the product may cause mechanical irritation of eyes and respiratory system. Keep out of reach of children. Do not breathe dust. In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Wear suitable protective clothing, gloves and eye/face protection. If swallowed, seek medical advice immediately and show the container or label. Follow the instructions in the Material Safety Data Sheet.
- The adhesive must be transported and stored in tightly sealed bags, in dry conditions (most preferably on pallets). Protect against humidity. Shelf life in conditions as specified is 12 months from the production date shown on the packaging. Content of soluble chromium (VI) in ready-to-use mix - ≤ 0.0002%.

Packaging

Paper bags: 20 kg

Pallet: 1080 kg in 20 kg bags

The above information constitutes basic guidelines for the application of the product and does not release the user from the obligation of carrying out works according to engineering principles and OHS regulations.

At the time of publication of this product data sheet all previous ones become void.

Date of update: 2014-04-18

