



DATA SHEET

POLYPROPYLENE ANTI-CRACKING FIBER POLIFIBER T-31 (12MM) CE

POLIFIBER® is a reinforcing fiber, produced with polypropylene multifilament, studied to be added to mortars and concretes in order to reduce the cracking and increase its durability and impact resistance, as well as tensile strength and compression resistance, becoming an effective and inexpensive alternative to the metal mesh and fibers when it comes to control the cracking.

During the setting time increases the internal tension and pressure of the concrete, causing micro-cracks which could turn into bigger ones. The metal mesh and fibers are useful just when this process has already happened and the concrete is cracked, while **POLIFIBER®** prevents its formation when the concrete is in plastic state.

If we compare **POLIFIBER®** 's technical advantages with metal mesh or fibers ones, the most noteworthy are: more durability, its indifference to the rusting/oxidation process, it provides a perfect finishing, it increases abrasion and impact resistance, its stronger impermeability reduce water absorption, better freezing resistance, it reduces concrete disintegration risks, the improvement of its passive resistance to fire decrease the phenomenon known as spalling, it distributes in a uniform and homogeneous way the tensile forces created during the shrinkage process avoiding the formation of micro-cracks which could turn into bigger ones.

Our product is specially indicated to be **added** to:

- Concrete slabs, screeds and floors. • Concrete pavements. • Shotcrete and projected mortar.
- Precast elements. • Cementitious overlays. • Facade grouting. • Mortars in general.

PHYSIO-CHEMICAL PROPERTIES:

- Raw material used: Polypropylene
- Density: 0,91 grams / cm³
- Production process: Extrusion
- Form: white fibers
- Fiber length: 12 mm.
- Fiber class: type Ia
- Equivalent diameter: 31 µm (0,031mm)
- Slenderness (λ): 387,10
- Lineal density (ρ_L): 6,7 dtex
- Distortion temperature: 110°C
- Decomposition temperature: 280°C
- Tenacity (tensile strength): 40 cN/tex

APPLICATION DETAILS:

- Dosage: 600 grams of product each concrete cubic meter.
- Add the fiber directly to the mixer at any time during the mixing or even at the end. Never pour directly in the mixing water before being added to the rest of the concrete components. Once the fiber has been added, prolong the mixing process for at least 5 minutes.
- The product doesn't need any specific caution when handling.
- Permissible variation: According with Rule UNE-EN

PRESENTATION:

- 100 units box (bag 150 grams)
- 30 units box (bag 600 grams.)
- 20 units box (bag 900 grams.)
- Fiber's length from 6 mm. to 60 mm.

