

Title (en)

USE OF GLASS-RESIN COMPOSITE FIBRES FOR REINFORCING CONCRETE

Title (de)

VERWENDUNG VON GLAS-HARZ-VERBUNDFASERN ZUR BETONBEWEHRUNG

Title (fr)

UTILISATION DE FIBRES COMPOSITE VERRE-RESINE POUR LE RENFORCEMENT DU BETON

Publication

EP 4263459 A1 20231025 (FR)

Application

EP 21851664 A 20211210

Priority

- FR 2013359 A 20201216
- FR 2021052277 W 20211210

Abstract (en)

[origin: WO2022129747A1] The invention relates to a glass-resin composite monofilament comprising glass filaments embedded in a cross-linked resin, the monofilament having a length within a range from 5 to 85 mm, a diameter ranging from 0.2 to 1.3 mm, and a breaking stress greater than 1050 MPa, a small box comprising a plurality of said monofilaments, as well as their uses for reinforcing concrete, reducing the weight of concrete, and reducing or preventing the cracking of concrete. The invention also relates to the concrete comprising said monofilaments, and to the method for obtaining said monofilaments.

IPC 8 full level

C03C 25/1025 (2018.01); **B29B 9/14** (2006.01); **B29B 15/12** (2006.01); **B29C 70/00** (2006.01); **B29C 70/16** (2006.01); **B29C 70/52** (2006.01); **C03C 25/28** (2018.01); **C03C 25/323** (2018.01); **C04B 18/02** (2006.01); **C04B 20/00** (2006.01); **C04B 20/10** (2006.01); **C04B 28/02** (2006.01); **C08J 5/24** (2006.01); **C04B 103/00** (2006.01); **C04B 111/34** (2006.01)

CPC (source: EP KR)

B29B 15/122 (2013.01 - EP KR); **B29C 70/521** (2013.01 - EP KR); **C03C 25/1025** (2013.01 - EP); **C03C 25/103** (2013.01 - EP KR); **C03C 25/28** (2013.01 - EP); **C03C 25/323** (2013.01 - EP KR); **C03C 25/36** (2013.01 - KR); **C04B 18/022** (2013.01 - EP KR); **C04B 20/0068** (2013.01 - EP KR); **C04B 28/02** (2013.01 - EP KR); **C04B 2103/0077** (2013.01 - EP KR); **C04B 2111/34** (2013.01 - EP KR)

C-Set (source: EP)

1. **C04B 20/0068 + C04B 14/42 + C04B 26/02**
2. **C04B 20/0068 + C04B 14/42 + C04B 26/14**
3. **C04B 20/0068 + C04B 14/42 + C04B 26/18**
4. **C04B 18/022 + C04B 20/0068**
5. **C04B 18/022 + C04B 14/42**
6. **C04B 28/02 + C04B 18/022**

Citation (search report)

See references of WO 2022129747A1

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

FR 3117482 A1 20220617; CN 116648339 A 20230825; EP 4263459 A1 20231025; KR 20230121604 A 20230818; WO 2022129747 A1 20220623

DOCDB simple family (application)

FR 2013359 A 20201216; CN 202180084543 A 20211210; EP 21851664 A 20211210; FR 2021052277 W 20211210; KR 20237019877 A 20211210