

Title (en)

Metal rope with a core made of fibres of liquid-crystal polymer

Title (de)

Drahtseil mit einem Kern aus Filamenten aus einem Flüssigkeitskristallpolymer

Title (fr)

Câble métallique à âme fibreuse en polymère à cristaux liquides

Publication

EP 2067893 B1 20120711 (EN)

Application

EP 08170693 A 20081204

Priority

IT MI20072281 A 20071205

Abstract (en)

[origin: EP2067893A2] The present invention refers to a metal rope with improved features, in particular having high ultimate tensile strength and a high number of sustainable fatigue cycles. The metal rope (10) according to the present invention consists of a plurality of strands (12) wound around a central core (14) and is characterised in that the central core (14) is made of a fibre spun from a liquid-crystal polymer. Preferably, this fibre spun from a liquid-crystal polymer is Vectran #ç .

IPC 8 full level

D07B 1/06 (2006.01)

CPC (source: EP)

D07B 1/0686 (2013.01); **D07B 1/005** (2013.01); **D07B 7/025** (2013.01); **D07B 2201/102** (2013.01); **D07B 2201/1032** (2013.01); **D07B 2201/1044** (2013.01); **D07B 2201/2011** (2013.01); **D07B 2201/2021** (2013.01); **D07B 2201/2023** (2013.01); **D07B 2201/2024** (2013.01); **D07B 2201/2037** (2013.01); **D07B 2201/204** (2013.01); **D07B 2201/2056** (2013.01); **D07B 2201/2066** (2013.01); **D07B 2201/2068** (2013.01); **D07B 2205/20** (2013.01); **D07B 2205/2042** (2013.01); **D07B 2401/2025** (2013.01); **D07B 2401/2055** (2013.01); **D07B 2401/206** (2013.01)

Cited by

JP2015140243A; US11548763B2; JPWO2022044213A1; WO2022044213A1; US11459209B2

Designated contracting state (EPC)

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

DOCDB simple family (publication)

EP 2067893 A2 20090610; **EP 2067893 A3 20100217**; **EP 2067893 B1 20120711**; ES 2391425 T3 20121126; IT MI20072281 A1 20090606; PT 2067893 E 20121009

DOCDB simple family (application)

EP 08170693 A 20081204; ES 08170693 T 20081204; IT MI20072281 A 20071205; PT 08170693 T 20081204