

Title (en)

LOW DENSITY EPOXY SYNTACTIC STRUCTURAL ADHESIVES FOR AUTOMOTIVE APPLICATIONS

Title (de)

SYNTAKTISCHE EPOXIDSTRUKTURKLEBSTOFFE MIT NIEDRIGER DICHT E FÜR AUTOMOBILANWENDUNGEN

Title (fr)

ADHÉSIFS STRUCTURAUX SYNTACTIQUES ÉPOXY DE FAIBLE DENSITÉ POUR DES APPLICATIONS AUTOMOBILES

Publication

EP 3924413 A1 20211222 (EN)

Application

EP 19909618 A 20190214

Priority

US 2019017938 W 20190214

Abstract (en)

[origin: WO2020167308A1] The present disclosure provides a syntactic structural adhesive comprising an epoxy resin, a low density particulate filler and a hardener that, upon curing, exhibits at least the following well-balanced properties: (i) a density less than 1 g/cm³; (ii) a compression modulus greater than 500 MPa; and (iii) a lap shear strength greater than 750 psi. The syntactic structural adhesive may be used in a variety of applications, such as in automotive applications for bonding and/or sealing metal, plastic and composite parts.

IPC 8 full level

C08K 5/49 (2006.01); **C08G 59/50** (2006.01)

CPC (source: EP KR)

C08G 59/32 (2013.01 - KR); **C08G 59/42** (2013.01 - KR); **C08G 59/50** (2013.01 - EP KR); **C08K 3/02** (2013.01 - KR); **C08K 3/22** (2013.01 - KR); **C08K 3/32** (2013.01 - KR); **C08K 5/521** (2013.01 - KR); **C09J 11/04** (2013.01 - KR); **C09J 163/00** (2013.01 - EP KR); **H01L 33/56** (2013.01 - KR); **C08K 2003/026** (2013.01 - KR); **C09J 2203/354** (2020.08 - KR)

C-Set (source: EP)

C09J 163/00 + **C08K 3/013**

Citation (search report)

See references of WO 2020167308A1

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

DOCDB simple family (publication)

WO 2020167308 A1 20200820; CN 111836851 A 20201027; EP 3924413 A1 20211222; JP 2022522072 A 20220414; KR 20210127599 A 20211022; PH 12020551271 A1 20210705; SG 11202007159Y A 20200929

DOCDB simple family (application)

US 2019017938 W 20190214; CN 201980013052 A 20190214; EP 19909618 A 20190214; JP 2020543558 A 20190214; KR 20207027978 A 20190214; PH 12020551271 A 20200811; SG 11202007159Y A 20190214