

Title (en)

Device for energy absorption and use of the device as a mine protection device or an impact absorber for a motor vehicle

Title (de)

Vorrichtung zur Energieabsorption und Verwendung der Vorrichtung als Minen-Schutzvorrichtung oder Aufpralldämpfer für ein Kraftfahrzeug

Title (fr)

Dispositif d'absorption d'énergie et utilisation du dispositif comme dispositif de protection des mines ou amortisseur de chocs pour un véhicule automobile

Publication

**EP 2264395 A3 20140326 (DE)**

Application

**EP 10005661 A 20100601**

Priority

DE 102009029814 A 20090618

Abstract (en)

[origin: EP2264395A2] The device (1) has receiving units (2, 3) receiving medium and/or filling materials (13) i.e. gel, and regulated through a deformable surface. A surface lies opposite to the deformable surface, and orifice outlets (10, 11) are provided between the surfaces. The deformable surface is pressurized against the surface, so that the filling materials are partially pressurized through the outlets. Energy absorption is enabled by flow resistance of the filling materials in a region of the outlets. The receiving units are formed as plates that are spaced from each other through a spacing part (6). The filling materials are selected from fluid, gel, plastic-or metal foam, or granulate material. The plates and spacing part comprise a light metal such as aluminum alloy.

IPC 8 full level

**F41H 7/04** (2006.01)

CPC (source: EP)

**F41H 5/013** (2013.01); **F41H 7/04** (2013.01); **F41H 7/042** (2013.01)

Citation (search report)

- [XI] WO 2004038320 A1 20040506 - GEKE TECHNOLOGIE GMBH [DE], et al
- [X] DE 19631715 A1 19980212 - BUNDESREP DEUTSCHLAND [DE]
- [A] EP 0897097 A2 19990217 - KELLNER GERD [DE]
- [A] DE 102007024691 A1 20081127 - BUNDESREP DEUTSCHLAND [DE], et al

Cited by

EP2721365A4; US8240239B1; WO2014087275A1; WO2014188159A1; US9909845B2

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 SE SI SK SM TR

Designated extension state (EPC)

BA ME RS

DOCDB simple family (publication)

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DE 102009029814 C5 20170126

DOCDB simple family (application)

**EP 10005661 A 20100601;** DE 102009029814 A 20090618