

Title (en)

MAGNESIUM ALLOY MATERIAL

Title (de)

MAGNESIUMLEGIERUNGSMATERIAL

Title (fr)

MATÉRIAUX EN ALLIAGE DE MAGNÉSIUM

Publication

**EP 2660343 A4 20150408 (EN)**

Application

**EP 11853525 A 20111228**

Priority

- JP 2010292517 A 20101228
- JP 2010292518 A 20101228
- JP 2010292519 A 20101228
- JP 2011080455 W 20111228

Abstract (en)

[origin: EP2660343A1] A magnesium alloy material having high corrosion resistance is provided. The magnesium alloy material contains a magnesium alloy containing 7.3% to 16% by mass Al, wherein a region having an Al content of 0.8x% by mass or more and 1.2x% by mass or less occupies 50% by area or more, a region having an Al content of 1.4x% by mass or more occupies 17.5% by area or less, wherein x% by mass denotes the Al content of the entire magnesium alloy material, and there is substantially no region having an Al content of 4.2% by mass or less. The magnesium alloy material has small variations in Al concentration and includes a few regions having a very low Al content, thereby effectively preventing and retarding local corrosion. Thus, the magnesium alloy material has higher corrosion resistance than die-cast components having the same Al content. The magnesium alloy material may be a sheet, a coiled long sheet, or a formed product.

IPC 8 full level

**C22C 23/02** (2006.01); **C22C 23/00** (2006.01); **C22C 23/04** (2006.01); **C22C 23/06** (2006.01); **C22F 1/00** (2006.01); **C22F 1/06** (2006.01)

CPC (source: EP KR US)

**C22C 23/00** (2013.01 - EP US); **C22C 23/02** (2013.01 - EP KR US); **C22C 23/04** (2013.01 - EP US); **C22C 23/06** (2013.01 - EP US);  
**C22F 1/06** (2013.01 - EP KR US)

Citation (search report)

- [E] EP 2641986 A1 20130925 - SUMITOMO ELECTRIC INDUSTRIES [JP]
- See references of WO 2012091112A1

Cited by

CN103658173A

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

DOCDB simple family (publication)

**EP 2660343 A1 20131106; EP 2660343 A4 20150408; EP 2660343 B1 20191218;** CA 2823292 A1 20120705; CA 2823292 C 20160614;  
CN 103282526 A 20130904; CN 103282526 B 20160601; KR 20130089664 A 20130812; KR 20150125729 A 20151109;  
TW 201241189 A 20121016; TW I515303 B 20160101; US 2014308157 A1 20141016; WO 2012091112 A1 20120705

DOCDB simple family (application)

**EP 11853525 A 20111228;** CA 2823292 A 20111228; CN 201180063110 A 20111228; JP 2011080455 W 20111228;  
KR 20137015544 A 20111228; KR 20157030551 A 20111228; TW 100149431 A 20111228; US 201113977034 A 20111228