

Title (en)
Die cast aluminium alloy

Title (de)
Druckgusslegierung aus Aluminiumlegierung

Title (fr)
Alliage à coulée d'aluminium

Publication
EP 1443122 B1 20090729 (DE)

Application
EP 04405023 A 20040112

Priority
• CH 10572003 A 20030617
• CH 942003 A 20030123

Abstract (en)
[origin: EP1443122A1] Aluminum alloy contains (in wt.%) 8.5-10.5 silicon, 0.3-0.8 manganese, maximum 0.06 magnesium, maximum 0.15 iron, maximum 0.03 copper, maximum 0.10 zinc, maximum 0.15 titanium, 0.05-0.5 molybdenum, 30-300 ppm strontium or 5-30 ppm sodium and/or 1-30 ppm calcium for permanent modification, and optionally 0.05-0.3 zirconium, gallium phosphide and/or indium phosphide in a quantity corresponding to 1-250 ppm phosphorous for particle fineness, titanium and boron added via an aluminum pre-alloy with 1-2 titanium and 1-2 boron for particle fineness, and aluminum and unavoidable impurities.

IPC 8 full level
C22C 21/04 (2006.01); **B22D 17/00** (2006.01); **B22D 21/04** (2006.01); **B60B 3/06** (2006.01); **C22C 21/02** (2006.01)

CPC (source: EP KR US)
C22C 21/02 (2013.01 - KR); **C22C 21/04** (2013.01 - EP US)

Cited by
WO2020207708A1; DE102006039684B4; DE102010055011A1; CN109628802A; AT511397A1; AT511397B1; EP1719820A3;
DE102019205267B3; EP3124632A1; EP4067521A4; DE102021114484A1; WO2016144274A1; EP4339315A1; EP3235916A1;
WO2017182103A1; US11421305B2; DE102013200847A1; DE102021131973A1; WO2023099080A1; DE102021131935A1; WO2023099520A1;
US11781202B1

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IT LI LU MC NL PT RO SE SI SK TR

DOCDB simple family (publication)
EP 1443122 A1 20040804; EP 1443122 B1 20090729; AT E437972 T1 20090815; BR PI0400079 A 20041228; BR PI0400079 B1 20111101;
CA 2455426 A1 20040723; CA 2455426 C 20111213; CN 1320144 C 20070606; CN 1537961 A 20041020; DE 502004009801 D1 20090910;
DK 1443122 T3 20091130; ES 2330332 T3 20091209; JP 2004225160 A 20040812; JP 4970709 B2 20120711; KR 101205169 B1 20121127;
KR 20040068021 A 20040730; NO 20040286 L 20040726; NO 337610 B1 20160509; PT 1443122 E 20091020; SI 1443122 T1 20091231;
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EP 04405023 A 20040112; AT 04405023 T 20040112; BR PI0400079 A 20040121; CA 2455426 A 20040120; CN 200410033014 A 20040121;
DE 502004009801 T 20040112; DK 04405023 T 20040112; ES 04405023 T 20040112; JP 2004016315 A 20040123;
KR 20040004406 A 20040120; NO 20040286 A 20040121; PT 04405023 T 20040112; SI 200431241 T 20040112; US 76151304 A 20040120