

Title (en)

6000 ALUMINUM EXTRUDATE EXCELLING IN PAINT-BAKING HARDENABILITY AND PROCESS FOR PRODUCING THE SAME

Title (de)

6000-ALUMINIUM-EXTRUDAT MIT HERVORRAGENDER LACKEINBRENNHÄRTBARKEIT UND HERSTELLUNGSVERFAHREN DAFÜR

Title (fr)

EXTRUDAT D'ALUMINIUM 6000 EXCELLENT EN TERMES DE TREMPABILITE PAR CUISSON DE PEINTURE ET SON PROCEDE DE PRODUCTION

Publication

EP 2006404 A4 20091216 (EN)

Application

EP 07741160 A 20070330

Priority

- JP 2007057724 W 20070330
- JP 2006095881 A 20060330

Abstract (en)

[origin: EP2006404A1] This invention relates to a 6000-series aluminum extruded material containing magnesium (0.3% to 0.7% by mass), silicon (0.7% to 1.5% by mass), copper (0.35% or less by mass), iron (0.35% or less by mass), titanium (0.005% to 0.1% by mass), manganese (0.05% to 0.30% by mass), chrome (0.10% or less by mass), and zirconium (0.10% or less by mass) (provided that at least one transition element selected from the group consisting of manganese, chromium, and zirconium is contained in a total amount representing 0.05% to 0.40% by mass), with the balance comprising aluminum with inevitable impurities, such aluminium extruded material having a predetermined yield strength of 180 MPa or more with an increase of 60 MPa as a result of a thermal history corresponding to paint baking. Such 6000-series aluminium extruded profile is superior in paint-baking hardenability and thus the yield strength thereof can be secured to a level applicable to structural members of automobiles and the like with the use of a thermal history corresponding to paint baking.

IPC 8 full level

B21C 23/00 (2006.01); **C22C 21/02** (2006.01); **C22C 21/06** (2006.01); **C22F 1/00** (2006.01); **C22F 1/043** (2006.01)

CPC (source: EP US)

B21C 23/002 (2013.01 - EP US); **C22C 21/02** (2013.01 - EP US); **C22C 21/06** (2013.01 - EP US); **C22F 1/00** (2013.01 - EP US); **C22F 1/043** (2013.01 - EP US)

Citation (search report)

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- See references of WO 2007114521A1

Designated contracting state (EPC)

DE FR GB

DOCDB simple family (publication)

EP 2006404 A1 20081224; EP 2006404 A4 20091216; CA 2628229 A1 20071011; CN 101356294 A 20090128; JP 2007270218 A 20071018; JP 5166702 B2 20130321; US 2009047171 A1 20090219; WO 2007114521 A1 20071011

DOCDB simple family (application)

EP 07741160 A 20070330; CA 2628229 A 20070330; CN 200780001400 A 20070330; JP 2006095881 A 20060330; JP 2007057724 W 20070330; US 9300907 A 20070330