

Title (en)

Bake-hardenable aluminium alloy sheets and process for manufacturing same.

Title (de)

Einbrennhärtbare Aluminiumlegierung für Feinbleche und Verfahren zu ihrer Herstellung.

Title (fr)

Feuillards en alliage d'aluminium durcissant lors de la cuisson du vernis et leur procédé de fabrication.

Publication

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Application

EP 83302017 A 19830411

Priority

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Abstract (en)

A bake-hardenable aluminium alloy sheet for can bodies, ends and/or tabs, containing 0.05 to 0.5% of Cu, 0.5 to 2.5% of Mg and 0.5 to 2.0% of Mn and having an average crystal grain width less than 25 microns after cold rolling. There is also disclosed a process for producing such a bake-hardenable aluminium alloy sheet, which comprises: smelting and casting an aluminium alloy containing 0.05 to 0.5% of Cu, 0.5 to 2.5% of Mg and 0.5 to 2% of Mn; hot rolling the resulting ingot after a soaking treatment at a temperature higher than 500 DEG C; heating the hot-rolled alloy or cold rolled alloy after hot rolling to a temperature in the range of 400 to 600 DEG C at a heating speed higher than 100 DEG C/min immediately after the heating or after heat retention for a time period shorter than 10 minutes, cooling the alloy at a cooling speed higher than 100 DEG C/hr while maintaining in solid solution the alloy elements which contribute to the bake-hardening effect; and cold-rolling said alloy at a reduction rate greater than 10%.

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CPC (source: EP)

C22C 21/06 (2013.01)

Citation (search report)

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