

Title (en)

COLD ROLLED STEEL SHEET HAVING SUPERIOR FORMABILITY, PROCESS FOR PRODUCING THE SAME

Title (de)

KALTGEWALZTES STAHLBLECH MIT ÜBERLEGENER FORMBARKEIT UND HERSTELLUNGSVERFAHREN DAFÜR

Title (fr)

FEUILLE D'ACIER LAMINÉE A FROID AYANT UNE FORMABILITÉ SUPÉRIEURE ET SON PROCÉDÉ DE PRODUCTION

Publication

EP 1888799 A1 20080220 (EN)

Application

EP 06732895 A 20060503

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Abstract (en)

[origin: WO2006118423A1] Disclosed herein is a Ti-based IF steel in which fine precipitates, such as CuS precipitates, having a size of 0.2 µm or less are distributed. The distribution of fine precipitates in the Ti-based IF steel enhances the yield strength and lowers the in-plane anisotropy index. The nanometer-sized precipitates allow the formation of minute crystal grains. As a result, dissolved carbon is present in a larger amount in the crystal grain boundaries than within the crystal grains, which is advantageous in terms of room-temperature non-aging properties and bake hardenability.

IPC 8 full level

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CPC (source: EP US)

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C22C 38/004 (2013.01 - EP US); **C22C 38/04** (2013.01 - EP US); **C22C 38/06** (2013.01 - EP US); **C22C 38/14** (2013.01 - EP US);
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