

Title (en)

PLATED STEEL SHEET HAVING EXCELLENT SURFACE QUALITY, STRENGTH AND DUCTILITY

Title (de)

PLATTIERTES STAHLBLECH MIT HERVORRAGENDER OBERFLÄCHENQUALITÄT, FESTIGKEIT UND DUKTILITÄT

Title (fr)

TÔLE D'ACIER PLAQUÉE AYANT UNE EXCELLENTE QUALITÉ DE SURFACE, UNE EXCELLENTE RÉSISTANCE ET UNE EXCELLENTE DUCTILITÉ

Publication

**EP 3666919 A4 20200617 (EN)**

Application

**EP 18845253 A 20180803**

Priority

- KR 20170101268 A 20170809
- KR 2018008848 W 20180803

Abstract (en)

[origin: EP3666919A1] Disclosed are: a plated steel sheet having a plated film on the surface of a hot rolled steel sheet; and a method for manufacturing the same, wherein the hot rolled steel sheet comprises, by wt%, 0.15-0.25% of C, 0.5% or less of Si, 0.5-2.0% of Mn, 0.03% or less of P, 0.015% or less of S, 0.05% or less of Al, 0.01% or less of N, 0.05% or less of Ti (excluding 0%), 0.01% or less of B (excluding 0%) and the balance of Fe and inevitable impurities, satisfies the following relation 1, and comprises, as a microstructure, 10-30 area% of ferrite, 20-40 area% of pearlite and 35-55 area% of bainite. $0.235C+0.0158Mn+0.0625Si+0.0423Mo+0.317Ti+1.36Nb \leq 0.075$ wherein [C], [Mn], [Si], [Mo], [Ti] and [Nb] respectively mean the amounts (wt%) of the corresponding elements included in a steel sheet.

IPC 8 full level

**C22C 38/14** (2006.01); **C21D 8/02** (2006.01); **C21D 9/46** (2006.01); **C22C 38/02** (2006.01); **C22C 38/04** (2006.01); **C22C 38/06** (2006.01);  
**C23C 2/02** (2006.01); **C23C 2/06** (2006.01); **C23C 30/00** (2006.01)

CPC (source: EP KR US)

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**C23C 30/00** (2013.01 - EP); **C21D 2211/002** (2013.01 - EP KR); **C21D 2211/005** (2013.01 - EP KR); **C21D 2211/009** (2013.01 - EP KR)

Citation (search report)

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- [A] JP 2014095146 A 20140522 - JFE STEEL CORP
- [A] US 2015284819 A1 20151008 - TAMAKI AKARI [JP], et al
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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

Designated extension state (EPC)

BA ME

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JP 2020530068 A 20201015; JP 6952869 B2 20211027; KR 101977474 B1 20190510; KR 20190016826 A 20190219; PT 3666919 T 20240208;  
US 2020377963 A1 20201203; WO 2019031773 A1 20190214

DOCDB simple family (application)

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