

Title (en)

VERY HIGH MECHANICAL STRENGTH STEEL AND METHOD FOR MAKING A SHEET THEREOF COATED WITH ZINC OR ZINC ALLOY

Title (de)

ULTRAHOCHFESTER STAHL UND VERFAHREN ZUR HERSTELLUNG EINES MIT ZINK ODER ZINKLEGIERUNG PLATIERTEN STAHLBLECHES

Title (fr)

ACIER A TRES HAUTE RESISTANCE MECANIQUE ET PROCEDE DE FABRICATION D UNE FEUILLE DE CET ACIER REVETUE DE ZINC OU D ALLIAG E DE ZINC

Publication

EP 1534869 B1 20071114 (FR)

Application

EP 03769565 A 20030904

Priority

- FR 0302641 W 20030904
- FR 0211040 A 20020906

Abstract (en)

[origin: US2011223441A1] The invention concerns a very high mechanical strength steel, whereof the chemical composition comprises in wt. %: 0.060%≤C=0.250%; 0.400%≤Mn=0.950%; Si=0.300%; Cr=0.300%; 0.100%≤Mo=0.500%; 0.020%≤Al=0.100%; P=0.100%; B=0.010%; Ti=0.050%, the rest being iron and impurities resulting from preparation. The invention also concerns a method for making a sheet of said steel coated with zinc or zinc alloy.

IPC 8 full level

C21D 8/02 (2006.01); **C23C 2/06** (2006.01); **C21D 8/00** (2006.01); **C21D 9/46** (2006.01); **C21D 9/52** (2006.01); **C22C 38/00** (2006.01); **C22C 38/04** (2006.01); **C22C 38/12** (2006.01); **C22C 38/32** (2006.01); **C23C 2/02** (2006.01); **C23C 2/40** (2006.01)

CPC (source: EP KR US)

C21D 8/02 (2013.01 - KR); **C21D 8/0278** (2013.01 - EP US); **C21D 9/52** (2013.01 - EP US); **C22C 38/04** (2013.01 - EP KR US); **C22C 38/12** (2013.01 - EP KR US); **C23C 2/0224** (2022.08 - EP KR US); **C23C 2/06** (2013.01 - KR); **C21D 8/0226** (2013.01 - EP US); **C21D 8/0273** (2013.01 - EP US); **C21D 2211/005** (2013.01 - EP US); **C21D 2211/008** (2013.01 - EP US); **Y10T 428/12799** (2015.01 - EP US)

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)

WO 2004022793 A2 20040318; WO 2004022793 A3 20040506; AT E378431 T1 20071115; AU 2003278256 A1 20040329; AU 2003278256 A8 20040329; BR 0314470 A 20050726; BR 0314470 B1 20130219; CA 2497870 A1 20040318; CA 2497870 C 20120131; CN 100422352 C 20081001; CN 1688724 A 20051026; DE 60317520 D1 20071227; DE 60317520 T2 20081016; EP 1534869 A2 20050601; EP 1534869 B1 20071114; ES 2294334 T3 20080401; FR 2844281 A1 20040312; FR 2844281 B1 20050429; JP 2005538248 A 20051215; KR 101072961 B1 20111012; KR 20050036990 A 20050420; KR 20110102498 A 20110916; MX PA05002509 A 20050603; RU 2005109922 A 20050910; RU 2321667 C2 20080410; US 2006102256 A1 20060518; US 2011223441 A1 20110915; US 7976647 B2 20110712

DOCDB simple family (application)

FR 0302641 W 20030904; AT 03769565 T 20030904; AU 2003278256 A 20030904; BR 0314470 A 20030904; CA 2497870 A 20030904; CN 03823840 A 20030904; DE 60317520 T 20030904; EP 03769565 A 20030904; ES 03769565 T 20030904; FR 0211040 A 20020906; JP 2004533567 A 20030904; KR 20057003841 A 20030904; KR 20117018107 A 20030904; MX PA05002509 A 20030904; RU 2005109922 A 20030904; US 201113112195 A 20110520; US 52637803 A 20030904