

Title (en)

HOT-ROLLED FLAT STEEL PRODUCT AND METHOD FOR PRODUCING A HOT-ROLLED FLAT STEEL PRODUCT

Title (de)

WARMGEWALZTES STAHLFLACHPRODUKT UND VERFAHREN ZUR HERSTELLUNG EINES WARMGEWALZTEN STAHLFLACHPRODUKTS

Title (fr)

PRODUIT PLAT EN ACIER LAMINÉ À CHAUD ET PROCÉDÉ DE PRODUCTION D'UN PRODUIT PLAT EN ACIER LAMINÉ À CHAUD

Publication

EP 4211279 A1 20230719 (DE)

Application

EP 21772797 A 20210906

Priority

- EP 20194839 A 20200907
- EP 2021074473 W 20210906

Abstract (en)

[origin: WO2022049282A1] The invention relates to a hot-rolled flat steel product, which consists of a steel comprising 0.03-0.65 wt.% carbon, 0.1-2.5 wt.% manganese, optional elements, the rest being iron and unavoidable impurities. The flat steel product has a yield strength of at least 680 MPa. Moreover, the residual compressive stress on at least one surface of the flat steel product is greater than 2/12 of the yield strength. Furthermore, the invention relates to a method for producing such a flat steel product, using a special straightening process.

IPC 8 full level

C21D 8/02 (2006.01); **C21D 9/46** (2006.01); **C22C 38/00** (2006.01); **C22C 38/02** (2006.01); **C22C 38/04** (2006.01); **C22C 38/06** (2006.01); **C22C 38/42** (2006.01); **C22C 38/44** (2006.01); **C22C 38/46** (2006.01); **C22C 38/48** (2006.01); **C22C 38/50** (2006.01); **C22C 38/54** (2006.01); **C22C 38/58** (2006.01)

CPC (source: EP)

C21D 8/0226 (2013.01); **C21D 8/0242** (2013.01); **C21D 8/0263** (2013.01); **C21D 9/46** (2013.01); **C22C 38/001** (2013.01); **C22C 38/02** (2013.01); **C22C 38/04** (2013.01); **C22C 38/06** (2013.01); **C22C 38/42** (2013.01); **C22C 38/44** (2013.01); **C22C 38/46** (2013.01); **C22C 38/48** (2013.01); **C22C 38/50** (2013.01); **C22C 38/54** (2013.01); **C22C 38/58** (2013.01); **C21D 2211/002** (2013.01); **C21D 2211/008** (2013.01)

Citation (search report)

See references of WO 2022049282A1

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

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

EP 3964592 A1 20220309; EP 4211279 A1 20230719; WO 2022049282 A1 20220310

DOCDB simple family (application)

EP 20194839 A 20200907; EP 2021074473 W 20210906; EP 21772797 A 20210906