Title (en)

HIGH STRENGTH STEEL SHEET FOR SOUR-RESISTANT LINE PIPE, METHOD FOR MANUFACTURING SAME, AND HIGH STRENGTH STEEL PIPE USING HIGH STRENGTH STEEL SHEET FOR SOUR-RESISTANT LINE PIPE

Title (de)

HOCHFESTES STAHLBLECH FÜR SAUERGASBESTÄNDIGES LEITUNGSROHR, VERFAHREN ZUR HERSTELLUNG DAVON UND HOCHFESTES STAHLROHR MIT HOCHFESTEM STAHLBLECH FÜR SAUERGASBESTÄNDIGES LEITUNGSROHR

Title (fr)

TÔLE D'ACIER HAUTE RÉSISTANCE POUR TUYAU DE CANALISATION RÉSISTANT À L'ACIDITÉ, SON PROCÉDÉ DE FABRICATION, ET TUYAU EN ACIER HAUTE RÉSISTANCE UTILISANT UNE TÔLE D'ACIER HAUTE RÉSISTANCE POUR TUYAU DE CANALISATION RÉSISTANT À L'ACIDITÉ

Publication

EP 3604592 A1 20200205 (EN)

Application

EP 18774336 A 20180328

Priority

- JP 2017068431 A 20170330
- JP 2018012956 W 20180328

Abstract (en)

Disclosed is a high strength steel plate for a sour-resistant line pipe that is excellent in HIC resistance and SSCC resistance under more severe corrosion environments and that is also excellent in hardness uniformity in the thickness direction. The high strength steel plate for a sour-resistant line pipe has: a predetermined composition; a steel microstructure at 0.5 mm below a surface of the steel plate being a bainite microstructure having a dislocation density of 0.5 × 10¹⁴to 7.0 × 10¹⁴(m⁻²), in which a difference ΔHV between an average value of Vickers hardness at 0.5 mm below the surface of the steel plate and an average value of Vickers hardness at a mid-thickness part of the steel plate is 25 HV or less; and a tensile strength of 520 MPa or more.

IPC 8 full level

C22C 38/00 (2006.01); **C21D 8/02** (2006.01); **C22C 38/06** (2006.01); **C22C 38/58** (2006.01)

CPC (source: EP KR)

C21D 1/02 (2013.01 - EP); **C21D 1/19** (2013.01 - EP); **C21D 6/005** (2013.01 - EP); **C21D 8/02** (2013.01 - EP KR); **C21D 8/0263** (2013.01 - EP); **C21D 9/08** (2013.01 - EP); **C21D 9/085** (2013.01 - EP); **C21D 9/46** (2013.01 - EP); **C22C 38/02** (2013.01 - EP); **C22C 38/04** (2013.01 - EP KR); **C22C 38/06** (2013.01 - EP KR); **C22C 38/58** (2013.01 - KR); C21D 8/0231 (2013.01 - EP); C22C 38/00 (2013.01 - EP); C22C 38/12 (2013.01 - EP); C22C 38/14 (2013.01 - EP); C22C 38/18 (2013.01 - EP); C22C 38/22 (2013.01 - EP); C22C 38/24 (2013.01 - EP); C22C 38/26 (2013.01 - EP); C22C 38/28 (2013.01 - EP); C22C 38/58 (2013.01 - EP)

Cited by

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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

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BA ME

DOCDB simple family (publication)

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DOCDB simple family (application)

EP 18774336 A 20180328; BR 112019020236 A 20180328; CN 201880022412 A 20180328; JP 2018012956 W 20180328; JP 2019510032 A 20180328; KR 20197030351 A 20180328; KR 20217029888 A 20180328