

Title (en)

PRE-RINSE CONTAINING A QUATERNARY AMINE FOR CONDITIONING PRIOR TO A CONVERSION TREATMENT

Title (de)

VORSPÜLE ENTHALTEND EIN QUARTÄRES AMIN ZUR KONDITIONIERUNG VOR EINER KONVERSIONSBEHANDLUNG

Title (fr)

PRÉRINÇAGE CONTENANT UNE AMINE QUATERNAIRE POUR LE CONDITIONNEMENT AVANT UN TRAITEMENT DE CONVERSION

Publication

**EP 3303652 B1 20191120 (DE)**

Application

**EP 16724027 A 20160519**

Priority

- DE 102015209910 A 20150529
- EP 2016061209 W 20160519

Abstract (en)

[origin: WO2016193005A1] The invention relates to a multi-step process for the anti-corrosive pretreatment of components which consist of metallic materials. The components are first subjected to a conditioning wet-chemical treatment with an aqueous composition (A) that contains a salt of a quaternary amine and then to an additional wet-chemical treatment based on water-soluble compounds of the elements Zr, Ti and/or Si, in the course of which treatment a corresponding conversion of the surfaces of the metallic materials takes place, said treatment providing an anti-corrosive primer for additionally applied organic coatings.

IPC 8 full level

**C23C 22/50** (2006.01); **C11D 11/00** (2006.01); **C23C 22/78** (2006.01); **C23F 11/14** (2006.01); **C23F 11/16** (2006.01)

CPC (source: CN EP KR US)

**C23C 22/50** (2013.01 - CN EP KR US); **C23C 22/78** (2013.01 - CN EP KR US); **C23F 11/141** (2013.01 - CN EP US); **C23F 11/143** (2013.01 - CN EP KR US); **C23F 11/149** (2013.01 - CN EP KR US); **C23F 11/163** (2013.01 - CN EP KR US)

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

DOCDB simple family (publication)

**DE 102015209910 A1 20161201**; CN 107683349 A 20180209; CN 107683349 B 20200526; EP 3303652 A1 20180411; EP 3303652 B1 20191120; JP 2018517062 A 20180628; JP 6784703 B2 20201111; KR 20180014018 A 20180207; US 2018066365 A1 20180308; WO 2016193005 A1 20161208

DOCDB simple family (application)

**DE 102015209910 A 20150529**; CN 201680030597 A 20160519; EP 16724027 A 20160519; EP 2016061209 W 20160519; JP 2017561897 A 20160519; KR 20177037295 A 20160519; US 201715800520 A 20171101