

Title (en)

HIGH TEMPERATURE RESISTANT TIAL ALLOY, METHOD FOR PRODUCTION OF A COMPOENT FROM A CORRESPONDING TIAL ALLOY, COMPONENT FROM A CORRESPONDING TIAL ALLOY

Title (de)

HOCHWARMFESTE TIAL-LEGIERUNG, HERSTELLUNGSVERFAHREN EINES BAUTEILS AUS EINER ENTSPRECHENDEN TIAL-LEGIERUNG UND BAUTEIL AUS EINER ENTSPRECHENDEN TIAL-LEGIERUNG

Title (fr)

ALLIAGE TIAL THERMOSTABLE, PROCÉDÉ DE PRODUCTION D'UN COMPOSANT CONSTITUÉ D'UN ALLIAGE TIAL CORRESPONDANT, COMPOSANT CONSTITUÉ D'UN ALLIAGE TIAL CORRESPONDANT

Publication

**EP 3269838 B1 20210901 (DE)**

Application

**EP 16178936 A 20160712**

Priority

EP 16178936 A 20160712

Abstract (en)

[origin: US2018016668A1] Described is  $\alpha$ -TiAl alloy which, besides titanium, comprises 42 to 48 at. % aluminum, 3 to 5 at. % niobium, 0.05 to 1 at. % molybdenum, 0.2 to 2.2 at. % silicon, 0.2 to 0.4 at. % carbon, 0.05 to 0.2 at. % boron, and optionally tungsten, zirconium and hafnium, as well as unavoidable impurities, and at room temperature has a microstructure which comprises globular colonies of lamellae of  $\alpha_2$ -Ti<sub>3</sub>Al and  $\gamma$ -TiAl, as well as silicide precipitates, and essentially no  $\beta$  phase. A method for producing a component made of this alloy is also described.

IPC 8 full level

**C22F 1/18** (2006.01); **C22C 14/00** (2006.01); **C22C 30/00** (2006.01)

CPC (source: EP US)

**C22C 14/00** (2013.01 - EP US); **C22C 30/00** (2013.01 - EP US); **C22F 1/183** (2013.01 - EP US)

Cited by

CN116024457A; EP3974551A4

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)

**EP 3269838 A1 20180117; EP 3269838 B1 20210901**; ES 2891724 T3 20220131; US 10590520 B2 20200317; US 2018016668 A1 20180118

DOCDB simple family (application)

**EP 16178936 A 20160712**; ES 16178936 T 20160712; US 201715644927 A 20170710