

Title (en)

Ni-BASE SINGLE CRYSTAL SUPERALLOY

Title (de)

MONOKRISTALLINE NICKEL-BASIS-SUPERLEGIERUNG

Title (fr)

SUPERALLIAGE A CRISTAL UNIQUE A BASE DE NI

Publication

EP 1568794 B1 20090204 (EN)

Application

EP 03777308 A 20031205

Priority

- JP 0315619 W 20031205
- JP 2002355756 A 20021206

Abstract (en)

[origin: EP1568794A1] The object of the present invention is to provide an Ni-based single crystal super alloy capable of improving strength by preventing precipitation of a TCP phase at high temperatures. This object is achieved by an Ni-based single crystal super alloy having a composition comprising 5.0-7.0 wt% of Al, 4.0-10.0 wt% of Ta, 1.1-4.5 wt% of Mo, 4.0-10.0 wt% of W, 3.1-8.0 wt% of Re, 0-0.50 wt% of Hf, 2.0-5.0 wt% of Cr, 0-9.9 wt% of Co and 4.1-14.0 wt% of Ru in terms of its weight ratio, with the remainder consisting of Ni and unavoidable impurities.

IPC 8 full level

C22C 19/05 (2006.01)

CPC (source: EP US)

C22C 19/057 (2013.01 - EP US)

Cited by

EP1760164A1; EP2006402A4; EP1997923A4; EP1930455A4; EP1498503A4; EP1990434A1; WO2011041183A1; WO2010111200A1; US7704332B2; US8366838B2

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DOCDB simple family (publication)

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