

Title (en)
Method for making wear resistant surface layers on articles of precipitation hardenable metallic material

Title (de)
Verfahren zur Erzeugung verschleissbeständiger Randschichten an Bauteilen aus ausscheidungshärtbaren metallischem Werkstoff

Title (fr)
Procédé pour la production de couches superficielles résistant à l'usure sur des articles de matériaux métalliques durcissables par précipitation

Publication
EP 1213363 B1 20050720 (DE)

Application
EP 00126449 A 20001207

Priority

- EP 00126449 A 20001207
- DE 10030433 A 20000621
- DE 19928773 A 19990623
- US 73644300 A 20001215

Abstract (en)
[origin: EP1213363A1] Production of wear-resistant edge layers on workpieces comprises subjecting a component which has been solution annealed conventionally at a temperature Tcsa1 and heat treated conventionally at a temperature Tcpa1 to renewed short term solution annealing of the edge layer at a temperature of Tsaa Tcsa1 and a holding time of delta tssa 12 seconds; and further heat treating the inside of the component and the edge layer at a temperature of Tspa Tcpa1.

IPC 1-7
C21D 6/02; **C21D 1/78**; **C21D 1/34**; **C21D 1/06**

IPC 8 full level
C21D 1/06 (2006.01); **C21D 1/34** (2006.01); **C21D 1/78** (2006.01); **C21D 6/02** (2006.01); **C21D 8/00** (2006.01); **C21D 7/06** (2006.01)

CPC (source: EP US)
C21D 1/06 (2013.01 - EP US); **C21D 6/02** (2013.01 - EP US); **C21D 8/00** (2013.01 - EP US); **C21D 1/34** (2013.01 - EP US); **C21D 7/06** (2013.01 - EP US); **Y10S 148/902** (2013.01 - EP US)

Cited by
DE102012018551A1

Designated contracting state (EPC)
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE TR

DOCDB simple family (publication)
EP 1213363 A1 20020612; **EP 1213363 B1 20050720**; AT E299954 T1 20050815; DE 10030433 A1 20010503; DE 10030433 C2 20020606; DE 50010769 D1 20050825; ES 2249224 T3 20060401; US 2002074066 A1 20020620; US 6511559 B2 20030128

DOCDB simple family (application)
EP 00126449 A 20001207; AT 00126449 T 20001207; DE 10030433 A 20000621; DE 50010769 T 20001207; ES 00126449 T 20001207; US 73644300 A 20001215