

Title (en)

ARTICLE FOR USE IN HIGH STRESS ENVIRONMENTS HAVING MULTIPLE GRAIN STRUCTURES

Title (de)

GEGENSTAND ZUM GEBRAUCH IN EINER HOCHBEANSPRUCHTEN UMGEBUNG MIT MEHREREN KORNSTRUKTUREN

Title (fr)

ARTICLE DESTINÉ À ÊTRE UTILISÉ DANS DES ENVIRONNEMENTS À FORTE CONTRAINTE ET COMPORTANT DE MULTIPLES STRUCTURES GRAINÉES

Publication

EP 3122495 A2 20170201 (EN)

Application

EP 15717716 A 20150327

Priority

- US 201461971109 P 20140327
- US 201514669008 A 20150326
- US 2015023125 W 20150327

Abstract (en)

[origin: US2015275677A1] A method of forming an article can comprise heating a metal to form a molten metal having a metal temperature; heating a mold to a mold temperature greater than or equal to the metal temperature; introducing the molten metal to the mold; cooling a first portion of the molten metal while maintaining a second portion of the molten metal at the metal temperature, wherein the first portion has a first side and a second side, wherein the second side is opposite the first side and adjacent to the second portion, and wherein the cooling comprises progressively cooling the first portion from the first side to the second side such that a solidification interface progresses from the first side to the second side; and cooling the remainder of the molten metal from multiple directions after the first portion is cooled to less than or equal to a crystallization temperature.

IPC 8 full level

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CPC (source: CN EP US)

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Citation (search report)

See references of WO 2015148994A2

Designated contracting state (EPC)

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BA ME

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