

Title (en)
COMPRESSOR CASING COMPRISING CAVITIES WITH OPTIMISED SETTING

Title (de)
VERDICHTERGEHÄUSE MIT HOHLRÄUMEN MIT OPTIMISierter EINSTELLUNG

Title (fr)
CARTER DE COMPRESSEUR A CAVITÉS AU CALAGE OPTIMISÉ

Publication
EP 2859239 B1 20161116 (FR)

Application
EP 13742668 A 20130415

Priority
• FR 1201159 A 20120419
• FR 2013050828 W 20130415

Abstract (en)
[origin: WO2013156725A2] The invention relates to a compressor for a turbine engine, comprising: a casing, at least one compressor stage formed by an impeller having stationary blades and an impeller having moving blades (1) positioned downstream of the stationary blade impeller, and cavities (5) in the thickness of the casing that are disposed along a circumference of said casing (4) opposite the moving blades (1). The cavities, which are elongate and extend along a main direction of orientation, are closed upstream and downstream by upstream and downstream faces respectively, and an upstream border (7) and a downstream border (6) are formed at the intersections between same and the casing. The cavities are offset in relation to the moving blades (1) such as to overlap the moving blade impeller in the upstream portion, thereby covering the upstream end thereof. The casing is characterised in that the downstream border (6) of the cavities (5) is oriented parallel to the chord at the head of the moving blade (1).

IPC 8 full level
F04D 27/02 (2006.01); **F04D 29/16** (2006.01); **F04D 29/52** (2006.01); **F04D 29/54** (2006.01); **F04D 29/68** (2006.01)

CPC (source: EP RU US)
F04D 19/00 (2013.01 - US); **F04D 27/02** (2013.01 - RU); **F04D 29/164** (2013.01 - EP US); **F04D 29/526** (2013.01 - EP US);
F04D 29/541 (2013.01 - EP US); **F04D 29/542** (2013.01 - US); **F04D 29/685** (2013.01 - EP US); **F05D 2220/3216** (2013.01 - EP 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)
WO 2013156725 A2 20131024; **WO 2013156725 A3 20140109**; BR 112014025631 B1 20210601; CA 2868226 A1 20131024;
CA 2868226 C 20200114; CN 104220759 A 20141217; CN 104220759 B 20160824; EP 2859239 A2 20150415; EP 2859239 B1 20161116;
FR 2989744 A1 20131025; FR 2989744 B1 20140613; JP 2015514906 A 20150521; JP 6618799 B2 20191211; RU 2014141506 A 20160610;
RU 2616695 C2 20170418; US 10024336 B2 20180717; US 2015078890 A1 20150319

DOCDB simple family (application)
FR 2013050828 W 20130415; BR 112014025631 A 20130415; CA 2868226 A 20130415; CN 201380019881 A 20130415;
EP 13742668 A 20130415; FR 1201159 A 20120419; JP 2015506286 A 20130415; RU 2014141506 A 20130415; US 201314390178 A 20130415