

Title (en)

Systems and methods involving variable vanes

Title (de)

Systeme und Verfahren mit variablen Schaufeln

Title (fr)

Systèmes et procédés incorporant des vannes variables

Publication

**EP 2014871 A3 20110831 (EN)**

Application

**EP 08252364 A 20080710**

Priority

US 77552307 A 20070710

Abstract (en)

[origin: EP2014871A2] Systems and methods involving vanes are provided. In this regard, a representative method for modifying the throat area between vanes of a gas turbine engine includes: directing a gas flow path of the gas turbine engine between a first vane (406) and a second vane (412), wherein each of the first vane and the second vane has an outer surface and an interior; and emitting pressurized air from outlet ports (410) communicating between the outer surface and the interior (404) of the first vane, wherein the emitted pressurized air from the first vane modifies a throat area (416) between the first vane (406) and the second vane (412).

IPC 8 full level

**F01D 5/14** (2006.01); **F01D 9/04** (2006.01)

CPC (source: EP US)

**F01D 5/145** (2013.01 - EP US); **F01D 5/146** (2013.01 - EP US); **F01D 5/148** (2013.01 - EP US); **F01D 9/04** (2013.01 - EP US); **F05D 2270/17** (2013.01 - EP US)

Citation (search report)

- [X] EP 0164539 A1 19851218 - KONGSBERG VAPENFAB AS [NO]
- [X] FR 1499216 A 19671027 - SNECMA
- [X] US 2825532 A 19580304 - MARCEL KADOSCH, et al

Cited by

CN109477417A; US9617868B2; US8573946B2; WO2014133612A1; WO2020236329A1

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MT NL NO PL PT RO SE SI SK TR

Designated extension state (EPC)

AL BA MK RS

DOCDB simple family (publication)

**EP 2014871 A2 20090114**; **EP 2014871 A3 20110831**; **EP 2014871 B1 20121114**; US 2009016871 A1 20090115

DOCDB simple family (application)

**EP 08252364 A 20080710**; US 77552307 A 20070710