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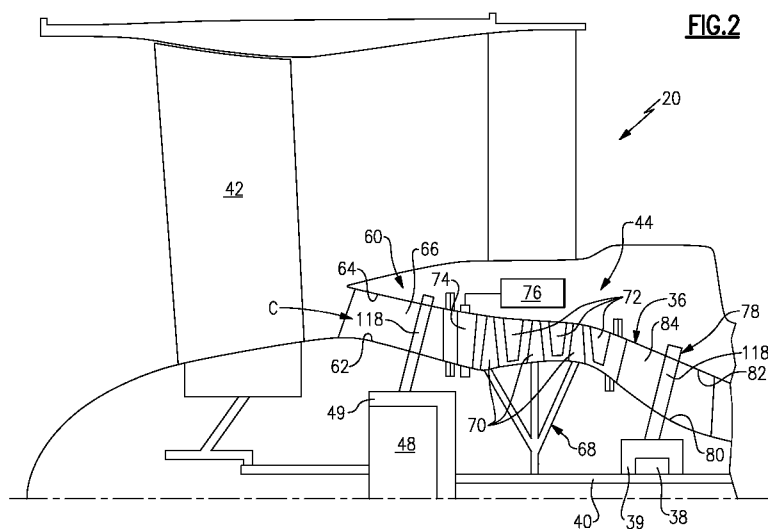
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(54) Title: INTEGRATED INLET VANE AND STRUT



(57) Abstract: A gas turbine engine case structure includes inner and outer annular case portions radially spaced from one another to provide a flow path and circumferentially arranged airfoils extend radially and interconnect the inner and outer annular case portions. The airfoils include multiple vanes and multiple strut-vanes. Each vane has a vane leading edge. Each strut-vane includes a strut-vane leading edge. The vane leading edges and strut-vane leading edges are aligned in a common plane. The vanes include a first axial length and the strut-vanes include a second axial length that is at least double the first axial length.

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US2013/033241

A. CLASSIFICATION OF SUBJECT MATTER

F01D 9/02(2006.01)i, F01D 1/04(2006.01)i

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

F01D 9/02; F01D 25/12; F02C 3/10; F02K 3/04; F01D 9/00; F01D 1/04

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Korean utility models and applications for utility models

Japanese utility models and applications for utility models

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

eKOMPASS(KIPO internal) & Keywords: turbine, engine, vane, blade, airfoil, length, leading edge, and case

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 6082966 A (HALL et al.) 04 July 2000 See abstract; column 2, line 52 - column 3, line 64; claim 1; and figures 1-3.	1-10, 12-15
A		11, 16-21
A	US 2010-0068034 A1 (SCHIAVO et al.) 18 March 2010 See abstract; paragraphs [0016]-[0018]; and figures 1, 2.	1-21
A	US 2006-0288686 A1 (CHERRY et al.) 28 December 2006 See abstract; paragraphs [0021]-[0031]; and figures 1-3.	1-21
A	US 4624104 A (STROEM, SIGMUNN) 25 November 1986 See abstract; column 3, line 30 - column 4, line 53; and figures 1-3.	1-21
A	US 4793770 A (SCHONEWALD et al.) 27 December 1988 See abstract; column 3, lines 28 - column 4, line 14; and figures 2-5.	1-21

☐ Further documents are listed in the continuation of Box C.

☒ See patent family annex.

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"&" document member of the same patent family

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INTERNATIONAL SEARCH REPORT

Information on patent family members

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Patent document cited in search report	Publication date	Patent family member(s)	Publication date
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