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(71) Applicant: **Hitachi Industries Co., Ltd.**
Tokyo (JP)

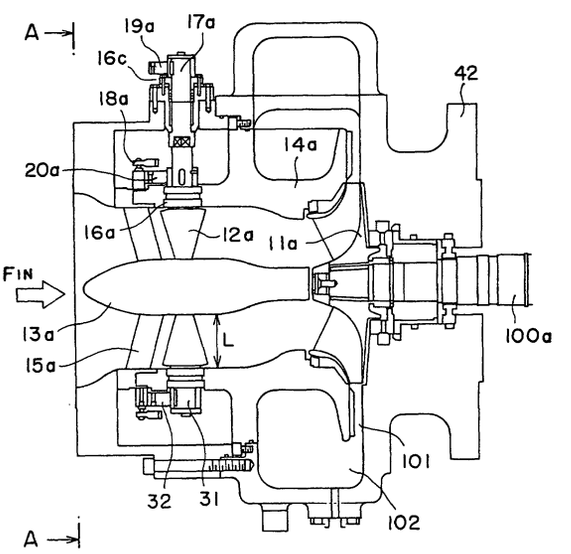
(72) Inventors:
- **Tanaka, Kenji, c/o Hitachi Industries Co., Ltd.**
Tsuchiura-chi, Tokyo (JP)
- **Ito, Toshio, c/o Hitachi Industries Co., Ltd.**
Chiyoda-machi, Tokyo (JP)
- **Konno, Toyoo, c/o Hitachi Industries Co., Ltd.**
Tomobe-machi, Tokyo (JP)
- **Orikasa, Hideaki, c/o Hitachi Industries Co., Ltd.**
Chiyoda-machi, Tokyo (JP)

(74) Representative: **Hano, Christian, Dipl.-Ing. et al**
v. Füner Ebbinghaus Finck Hano
Mariahilfplatz 2 & 3
81541 München (DE)

(54) A centrifugal compressor having inlet guide vanes

(57) A centrifugal compressor has a plurality of inlet guide vanes (12a) arranged in a circumferential direction. An outer cylinder (14a) holding the inlet guide vanes (12a) has a larger inner diameter around the inlet guide vanes (12a) than diameters at other areas thereof. Likewise, an inner cylinder (13a) has a larger outer diameter around the inlet guide vanes (12a) than diameters at other areas thereof. Thereby, the inlet guide vanes (12a) can be improved in reliability even when the centrifugal compressor becomes high in suction pressure.

FIG. 1



EP 1 429 032 A3

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EUROPEAN SEARCH REPORT

Application Number
EP 03 01 1358

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Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.7)
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A	DE 889 091 C (VERSUCHSANSTALT FUER LUFTFAHRT) 7 September 1953 (1953-09-07) * figure 1 *	1	
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The present search report has been drawn up for all claims

Place of search	Date of completion of the search	Examiner
MUNICH	29 April 2004	Fistas, N

CATEGORY OF CITED DOCUMENTS

X : particularly relevant if taken alone
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A : technological background
O : non-written disclosure
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T : theory or principle underlying the invention
E : earlier patent document, but published on, or after the filing date
D : document cited in the application
L : document cited for other reasons

& : member of the same patent family, corresponding document

EPO FORM 1503 03.82 (P04C01)

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Application Number
EP 03 01 1358

CLAIMS INCURRING FEES

The present European patent application comprised at the time of filing more than ten claims.

☐ Only part of the claims have been paid within the prescribed time limit. The present European search report has been drawn up for the first ten claims and for those claims for which claims fees have been paid, namely claim(s):

☐ No claims fees have been paid within the prescribed time limit. The present European search report has been drawn up for the first ten claims.

LACK OF UNITY OF INVENTION

The Search Division considers that the present European patent application does not comply with the requirements of unity of invention and relates to several inventions or groups of inventions, namely:

see sheet B

☒ All further search fees have been paid within the fixed time limit. The present European search report has been drawn up for all claims.

☐ As all searchable claims could be searched without effort justifying an additional fee, the Search Division did not invite payment of any additional fee.

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LACK OF UNITY OF INVENTION
SHEET B

Application Number
EP 03 01 1358

The Search Division considers that the present European patent application does not comply with the requirements of unity of invention and relates to several inventions or groups of inventions, namely:

1. Claims: 1-5

   A centrifugal compressor having an outer cylinder holding the inlet guide vanes and having a larger inner diameter around the inlet guide vanes than diameters at other areas thereof.

2. Claims: 6-9

   A centrifugal compressor having devided guide vanes fitted in the inlet guide vanes.

ANNEX TO THE EUROPEAN SEARCH REPORT ON EUROPEAN PATENT APPLICATION NO. EP 03 01 1358

This annex lists the patent family members relating to the patent documents cited in the above-mentioned European search report. The members are as contained in the European Patent Office EDP file on
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For more details about this annex : see Official Journal of the European Patent Office, No. 12/82