

Title (en)

Method for producing a rotor assembly for a vacuum pump and rotor assembly for a vacuum pump

Title (de)

Verfahren zur Herstellung einer Rotoranordnung für eine Vakuumpumpe und Rotoranordnung für eine Vakuumpumpe

Title (fr)

Procédé de fabrication d'un rotor pour une pompe à vide et rotor pour une pompe à vide

Publication

EP 2896837 A3 20150812 (DE)

Application

EP 14197861 A 20141215

Priority

DE 102014100622 A 20140121

Abstract (en)

[origin: JP2015137648A] PROBLEM TO BE SOLVED: To provide a process for manufacture of a rotor device for a vacuum pump, in particular, a turbo molecular pump that can accommodate for a high pump performance and that can be driven under a high rotational speed and a high torque without any danger.SOLUTION: A problem described above is solved by a process for manufacture of a rotor device for a vacuum pump, in particular a turbo molecular pump including one rotor shaft (10), at least one rotor disk (12) connected to the rotor shaft (10), and at least one reinforcing ring (14) enclosing the rotor disk (12). In this case, the method of this invention includes a pressing contact connection in one cross sectional direction, in particular an extension pressing contact connection or a shrinkage pressing contact connection formed between the reinforcing ring (14) and the rotor disk (12).

IPC 8 full level

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CPC (source: EP)

F04D 19/042 (2013.01); **F04D 29/266** (2013.01); **F04D 29/321** (2013.01); **F04D 29/644** (2013.01)

Citation (search report)

- [XYI] JP 3160039 B2 20010423 & JP H05106588 A 19930427 - NTN TOYO BEARING CO LTD
- [IAY] EP 2597313 A2 20130529 - PFEIFFER VACUUM GMBH [DE]
- [E] WO 2015078648 A1 20150604 - OERLIKON LEYBOLD VACUUM GMBH [DE]
- [YA] JP 2012145043 A 20120802 - SHIMADZU CORP
- [YA] DE 102008056352 A1 20100512 - OERLIKON LEYBOLD VACUUM GMBH [DE]
- [YA] DE 102009035812 A1 20110203 - PFEIFFER VACUUM GMBH [DE]

Cited by

WO2018041605A1

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

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

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DOCDB simple family (application)

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