

Title (en)

Rotor, means and method of making the same by moulding.

Title (de)

Flügelrad, Vorrichtungen und Verfahren zu dessen Herstellung durch Giessen.

Title (fr)

Roue à aubes et outillages et procédés pour les fabriquer par moulage.

Publication

**EP 0060760 A1 19820922 (FR)**

Application

**EP 82400383 A 19820305**

Priority

FR 8105062 A 19810313

Abstract (en)

A pump impeller comprises helico-centrifugal vanes 1, the lower and upper faces 2, 3 of each vane extending respectively over portions of surfaces of revolution with the same axis which is different from the axis of repetition X, X' of the vanes 1. The axis of revolution is at the intersection of a plane parallel to the plane tangent to the vane at a point on the leading edge and a plane perpendicular to this tangent plane. The impeller is made by constructing a vaned pattern, using the pattern to form a sand mould, withdrawing the pattern from the sand by giving the vanes a rotational movement about the axis of the surfaces of revolution and then filling the mould cavities with liquid metal. <IMAGE>

Abstract (fr)

Cette roue comprend six aubes 1 hélico-centrifuges dont l'intrados 2 et l'extrados 3 s'étendent respectivement sur des portions de surfaces de révolution de même axe autre que l'axe X, X' de répétition des aubes 1. L'axe de révolution est à l'intersection d'un plan parallèle au plan tangent à l'aube en un point du bord d'attaque et d'un plan perpendiculaire à ce plan tangent. Application aux pompes.

IPC 1-7

**F04D 29/22; B22C 9/10; B22C 9/22**

IPC 8 full level

**B22C 9/10** (2006.01); **F04D 29/22** (2006.01)

CPC (source: EP)

**B22C 9/10** (2013.01); **F04D 29/2222** (2013.01)

Citation (search report)

- [Y] GB 693686 A 19530708 - POWER JETS RES & DEV LTD
- [Y] FR 2393176 A1 19781229 - ALSTHOM ATLANTIQUE [FR]
- [A] GB 587514 A 19470429 - POWER JETS LTD, et al
- [A] US 3206807 A 19650921 - HOFFMAN ROBERT F, et al
- [A] VDI ZEITSCHRIFT, vol. 119, janvier 1977, DUSSELDORF (DE) H. SIMON: "Entwicklung einer Standard-Laufradreihe mit r{umlich verwundenen, r}ckw{rtsgekr}mmten Schaufeln f}r station{re Radialverdichter" pages 121-127

Cited by

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DOCDB simple family (publication)

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IT 8212448 A0 19820224

DOCDB simple family (application)

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