

Title (en)  
ROTARY COMPRESSOR PROVIDED WITH AT LEAST ONE SIDE CHANNEL

Title (de)  
ROTATIONSVERDICHTER MIT MINDESTENS EINEM SEITENKANAL

Title (fr)  
COMPRESSEUR ROTATIF MUNI D'AU MOINS UN CANAL LATÉRAL

Publication  
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Application  
**EP 13715318 A 20130314**

Priority  
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Abstract (en)  
[origin: WO2013136016A2] The invention relates to a rotary compressor that includes a disc-shaped rotor having a radius R, supporting on the periphery thereof at least one first series of non-planar blades intended for accelerating the fluid to be compressed between an intake and an outlet, a casing defining on the outside at least one generally toroidal channel that is peripheral to the rotor, said at least one channel being coaxial, arranged at the radial end of said rotor and containing said blades, a static and annular core being arranged inside said at least one toroidal channel such as to define a free section A with said casing. According to the invention, the arrangements and respective shapes of the rotor, the at least one peripheral channel and said at least one series of blades are such that the ratio  $A/R^2$  is between 6% and 16%.

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