

Title (en)  
AXIAL FAN

Title (de)  
AXIALVENTILATOR

Title (fr)  
VENTILATEUR AXIAL

Publication  
**EP 2823184 B1 20230510 (DE)**

Application  
**EP 13711568 A 20130306**

Priority  
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Abstract (en)  
[origin: WO2013131641A2] The axial fan has a motor (1), on the rotor side of which an impeller is fixed, wherein fan blades (24) with a front and a rear edge (26, 27) project from the hub of said impeller. The motor (1) is fixed to a housing (3) by means of a suspension (2). The suspension has a bracing part (4 to 8) made of a flat material, said bracing part connecting the motor (1) to the housing (3) and being arranged in an approximately vertical manner in the flow direction of the air. The aim of the invention is to design the axial fan such that the axial fan has a high overall efficiency and only a low flow resistance. This is achieved in that the bracing part (4 to 8) is provided with at least one recess (7) over a part of the length of the bracing part. The flow resistance due to the bracing part is minimized by means of the recess. The recess reduces the weight of the axial fan. The noise emitted by the axial fan is significantly reduced because the size of vortex-related flow separation regions is significantly reduced by means of the recess.

IPC 8 full level  
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• DE 2727119 A1 19771229 - GEN ELECTRIC  
• CA 2078761 A1 19930331  
• CN 201687772 U 20101229 - MIDEA HOLDING CO LTD

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