

BRUSHLESS DC MOTOR AND BLOWER DEVICE

ABSTRACT

The outer-rotor type brushless DC motor has a stator core around which a coil is wound, a shaft fixed to the central position of the stator core, a bearing whose inner ring is fixed to the shaft, and rotor yoke 5 fixed to an outer ring of the bearing. Rotor yoke 5 has a plurality of magnets 6 on its inner-circumference plane that faces the stator core in a circumferential direction. Further, the brushless DC motor has first holding ring 10a having protrusion 14a at an upper section of the shaft in the axial direction and has second holding ring 10b having protrusion 14b at a lower section of the shaft in the axial direction. Protrusion 14a holds an upper end of magnets 6 in the circumference direction, while protrusion 14b holds a lower end of magnets 6 in the circumferential direction.

Fig. 2