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**Yang**

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(54) **WHEEL DRIVEN MECHANISM**  
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See application file for complete search history.

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(57) **ABSTRACT**

This invention relates to a wheel driven mechanism for a vehicle such as a wheelchair, an electrical bicycle, or a motor-cycle, especially to a vehicle which has a wheel driven by power but without using an independent electric motor. The wheel driven mechanism comprises a rotor, a plurality of permanent magnets, a stator, and a plurality of electromagnets. The rotor is divided into a first block and a second block, and the permanent magnets are disposed within the first block to reduce the weight and the cost of the wheel driven mechanism. Furthermore, the user can easily rotate the handwheel mechanism during power off.

**5 Claims, 9 Drawing Sheets**

