



Junk Bots

Junk Bots are easy-to-build robots that you can make using a simple circuit and recyclable materials.

iOi Challenge: Draw, design and invent a Junk Bot that you think would help the world to Save Make Reinvent.



Getting started

YOU WILL NEED:

- DC hobby motor
- AAA battery pack
- 2 AAA batteries
- Pieces of cork
- Blu Tack
- Tape
- Scissors
- Pens
- Pencils
- Junk
- Craft materials
- iOi My Invention Idea Resource

Explore your home for unused objects or rummage in the recycling bin for materials you can reinvent. Then use the iOi My Invention Idea Resource to sketch out an idea or invention to think about how your Junk Bot could help the world to Save Make Reinvent.

For the Junk Bot to move, you will need to complete a circuit which is made out of the hobby motor, the battery pack and the batteries. Connecting these together will allow for electricity to flow around. Make sure there are no gaps and everything is well connected, otherwise the motor will not work!

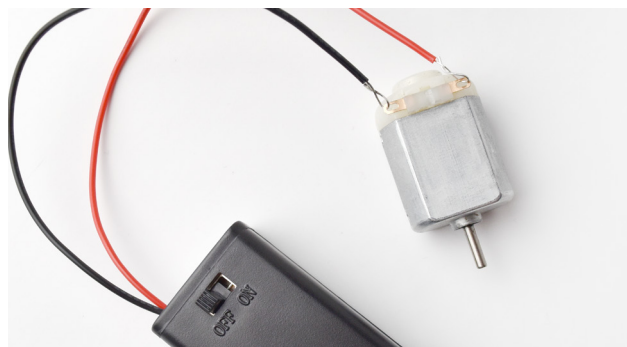




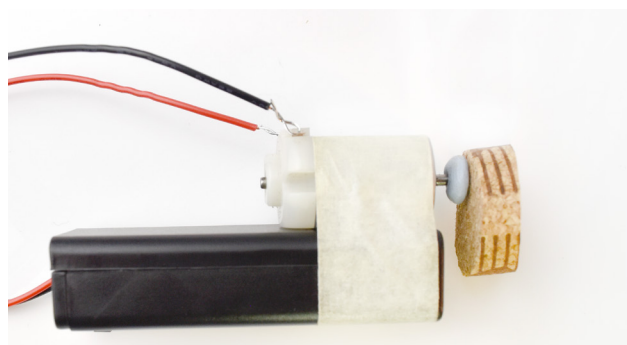
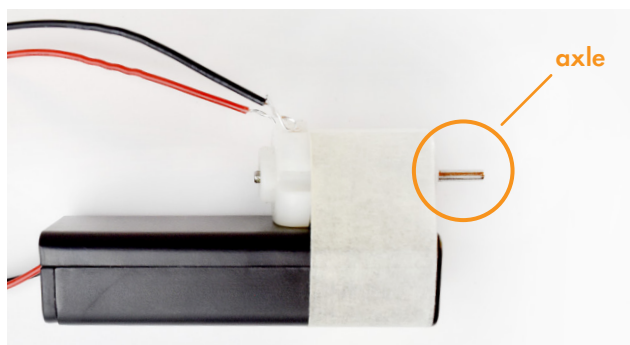
SAVE MAKE REINVENT

1. Grab the battery pack and insert the 2 AAA batteries
2. Connect the wires to the motor. Thread the cables through each loop and twist them

Test your motor. Turn on the switch and see if your motor makes a sound and starts spinning. If not, check your batteries have been inserted correctly and your cable connections



4. Place the motor at the top of the battery pack, right on the edge and secure it in place with tape. Make sure not to cover the axle
5. Push the axle in the cork. Use a bit of Blu Tack to hold it in place. Make sure it's off - centre, not in the middle. This way will ensure your Junk Bot moves around



6. Using your junk build the base of your Junk Bot. Then add the motor and use tape to hold it in place. Make sure the battery pack and the motor are attached securely
7. Decorate and test it! You can always try something different and see what happens. Add more legs, adjust your motor or change your materials



Discover more ideas here

