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Whack-a-Mole Game



GREENRIDGE PRIMARY SCHOOL



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Empathize/
Define

Brainstorm

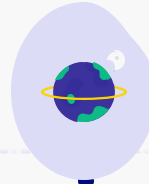
Prototype

Design Thinking for Invention

Design Thinking for Invention

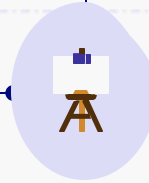
1. Empathize

Develop a deep understanding of the challenge



2. Define

Clearly articulate the problem you want to solve



4. Prototype

Design a prototype for your solution

3. Ideate/Brainstorm

Brainstorm potential solutions
Select and develop your solution





Design Thinking for Invention



See Observe a variety of DIY games. What do you see? What are the components in these games?



Think Why are certain features present? What do they achieve? Who are they designed for?

Wonder How can you improve or change the game?

Discuss Share your observations and insights with the class.





1. Empathize

Discuss and map out what makes a game fun and engaging. Who are the main players of this game?



2. Define

Formulate a problem statement, e.g., "How might we create a DIY Whack-a-Mole game that is both fun and easy to build?"



3. Ideate/Brainstorm

What materials (e.g., rubber, plastic, metal) should we use? How would the internal mechanism work?



4. Prototype

Build and test your DIY Whack-A-Mole Game.



DIY Whack-A-Mole Game

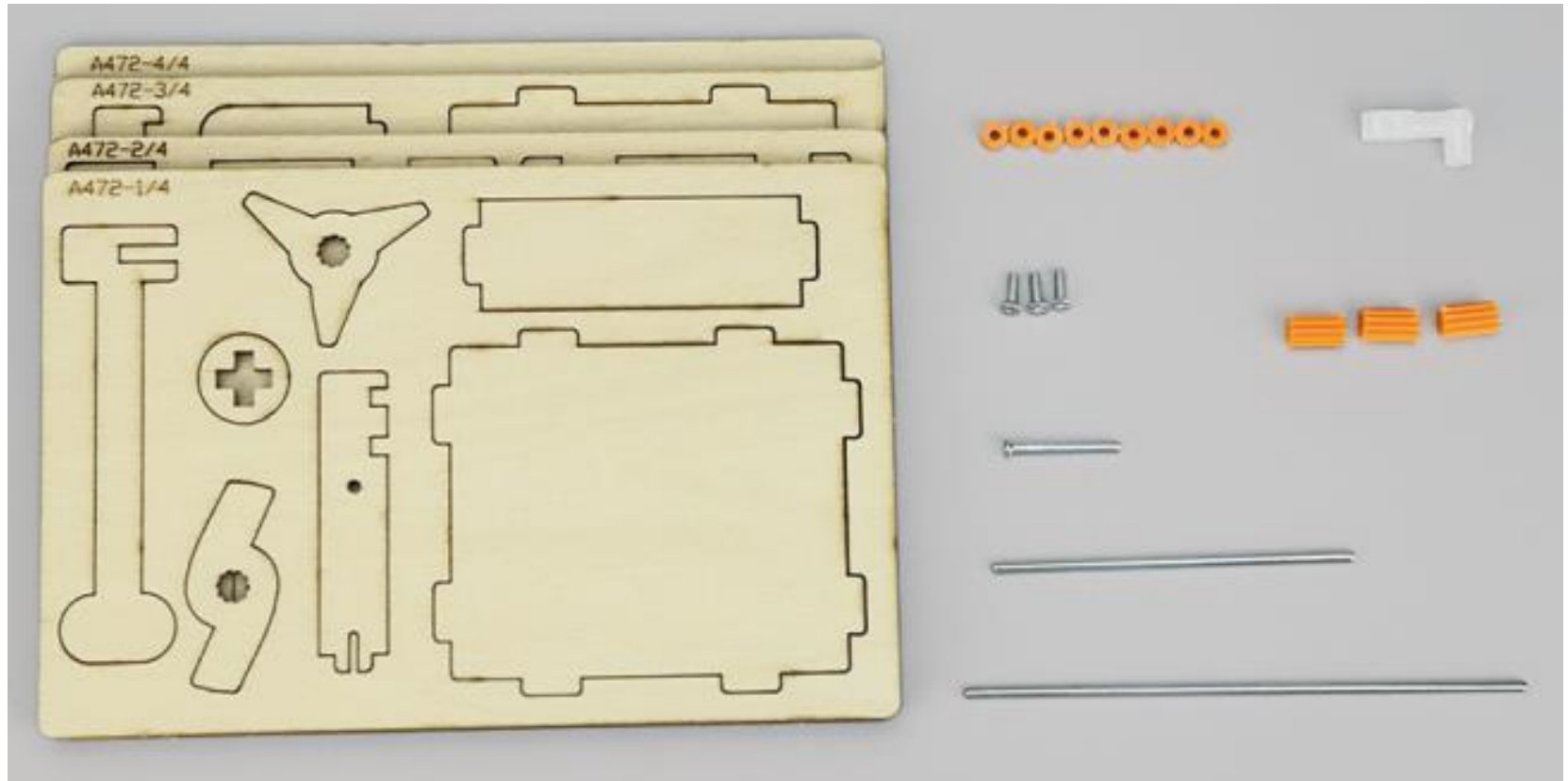


DIY Whack-A-Mole Game



DIY Whack-A-Mole Video

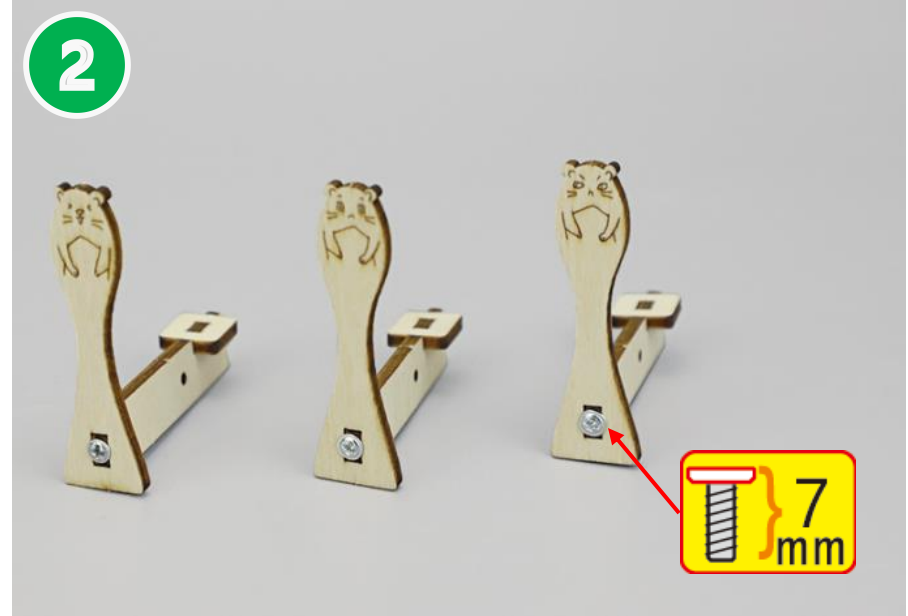
DIY Whack-A-Mole Game – Components



DIY Whack-A-Mole Game – Instructions

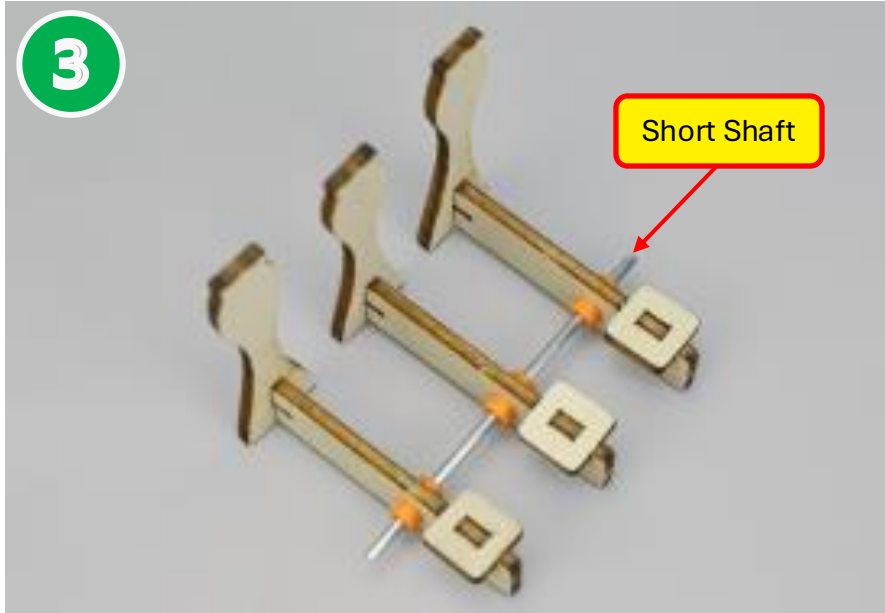


Fit the wooden pieces together as shown above



Lock the wooden pieces in place using the 7mm screws

DIY Whack-A-Mole Game – Instructions

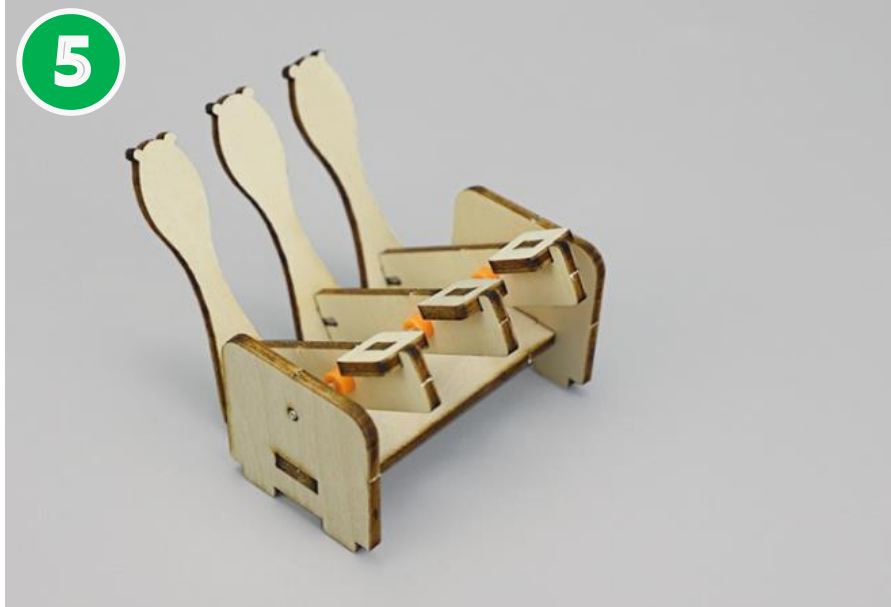


Fit the wooden pieces together using the shaft and the sleeve as shown above

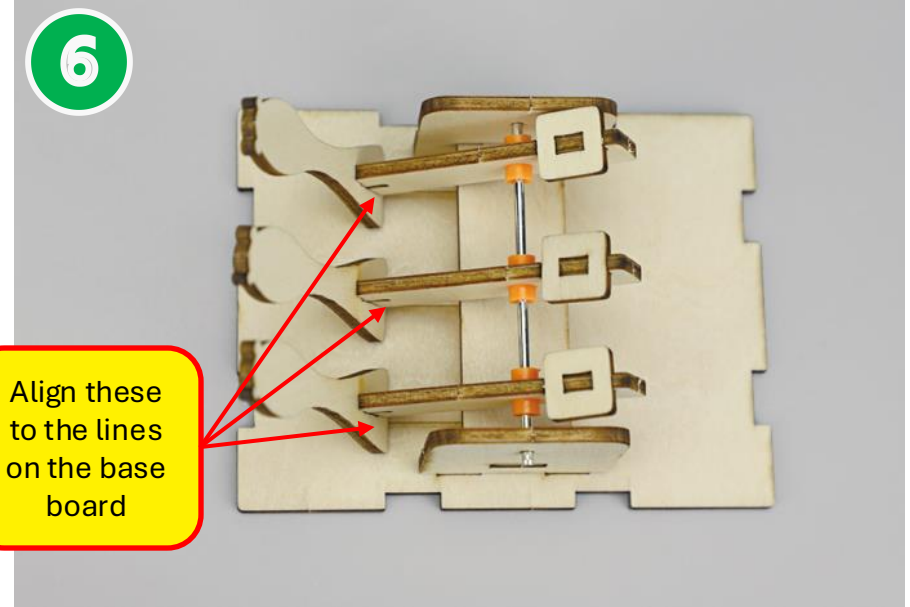


Fit the wooden pieces together as shown above

DIY Whack-A-Mole Game – Instructions



Fit the wooden pieces together as shown above

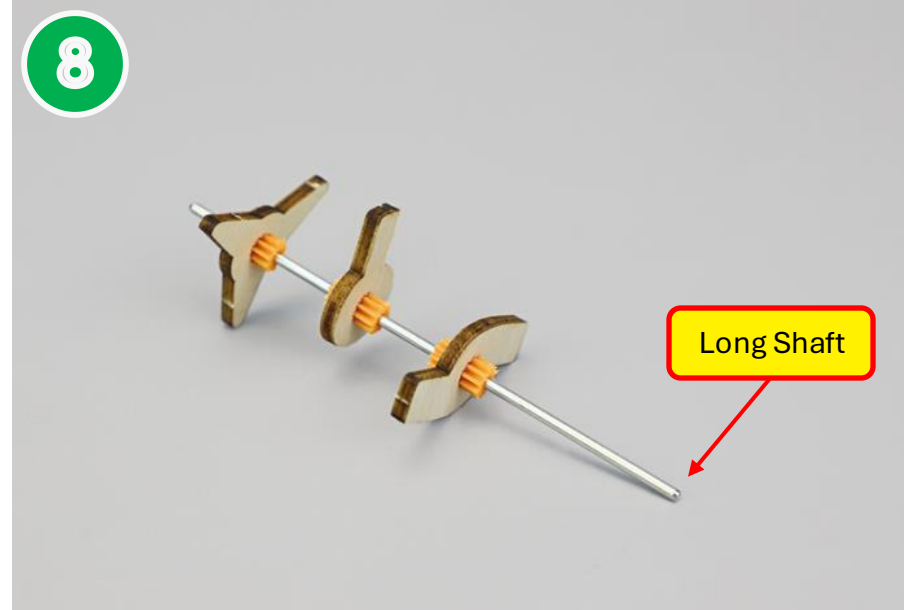


Fit the wooden pieces together as shown above

DIY Whack-A-Mole Game – Instructions

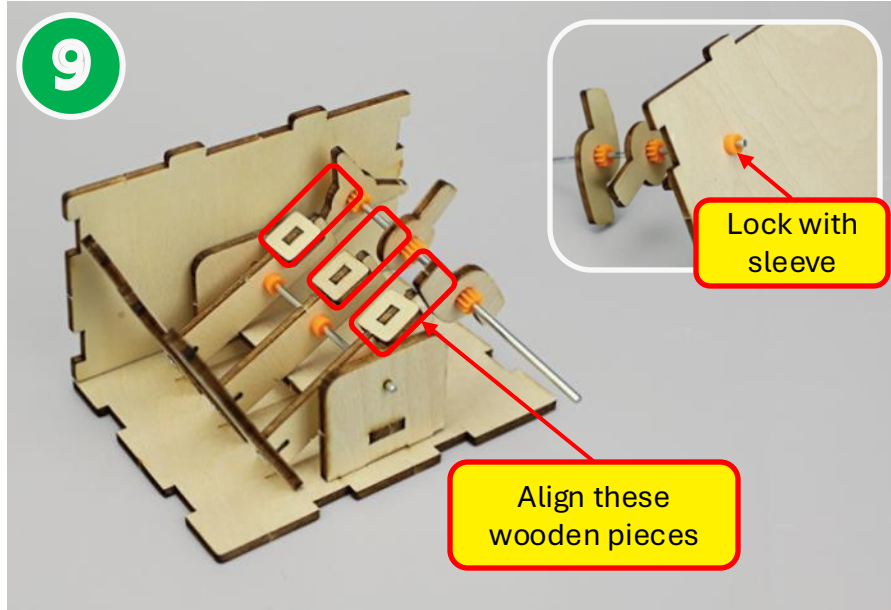


Fit the wooden pieces with the gears as shown above

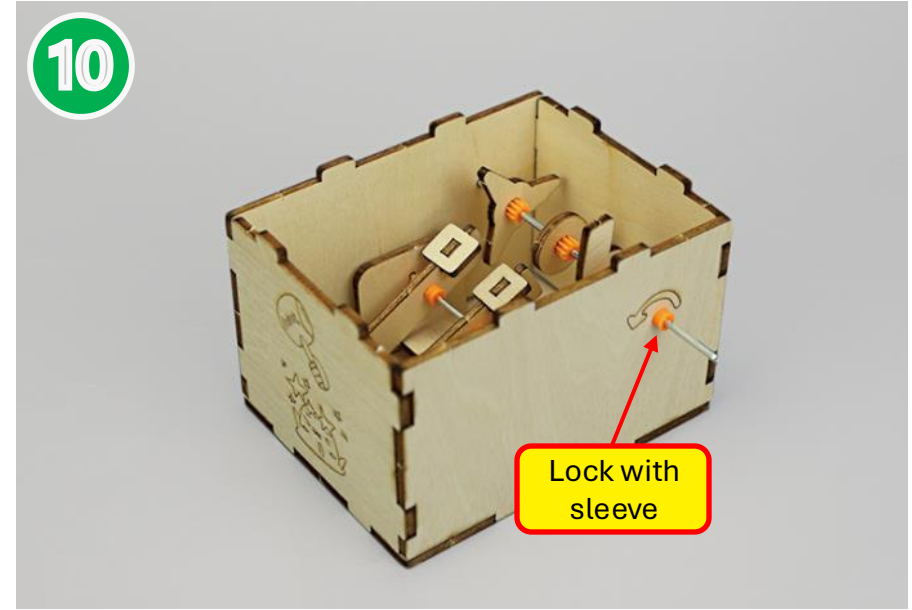


Insert the long shaft into the wooden pieces together as shown above

DIY Whack-A-Mole Game – Instructions

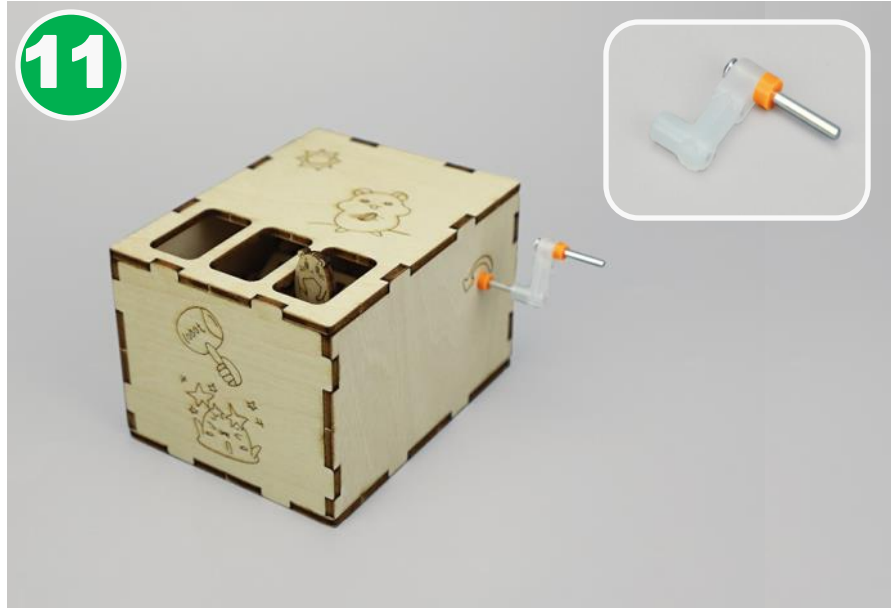


Insert the long shaft through the wooden piece, lock with a sleeve and fit to the base as shown above



Fit the wooden pieces together and lock the shaft with a sleeve as shown above

DIY Whack-A-Mole Game – Instructions

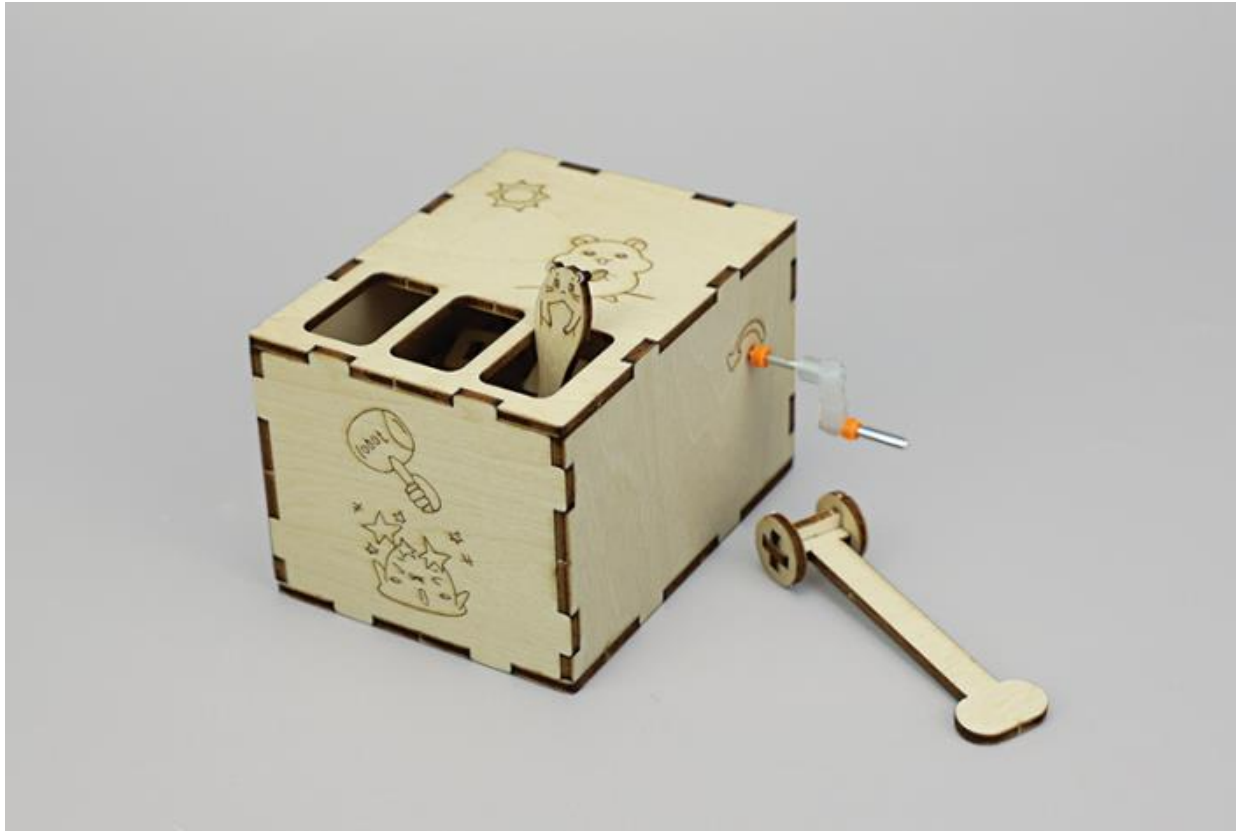


Assemble the handle and insert it into the long shaft as shown above



Fit the wooden pieces together as shown above

DIY Whack-A-Mole Game – Complete





5. Test

Test the DIY Whack-A-Mole game. What works and what doesn't? Is it fun? Is it easy to play? Let your friends try and collect their feedback.



6. Rework

Make the necessary adjustments based on the feedback collected.

Add colours to your DIY Whack-A-Mole game to make it more appealing.

