



Build a Marble Maze



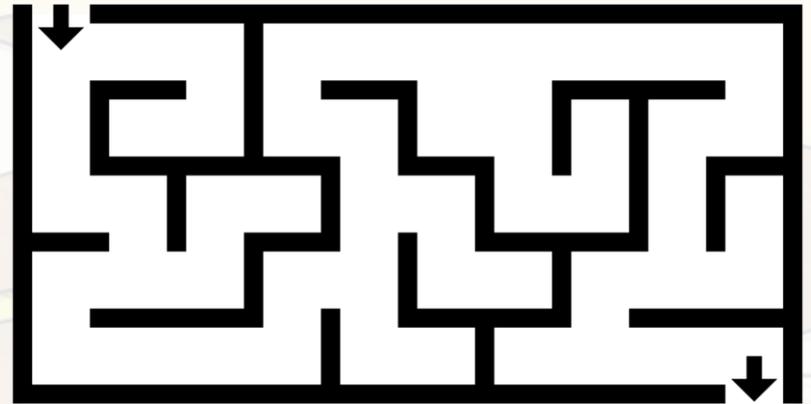
STEPS
Engineers
Week



What is a Marble Maze?

A marble maze is a game where marbles are placed inside a maze and the player has to guide them through the maze, from an entrance point on one side of the maze, to an exit point on the other side of the maze.

To add an extra challenge, you can time how long it takes players to complete the maze.



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Building a Marble Maze

Your task is to design your own marble maze.

-  First, you will need to investigate which materials to use to construct the marble maze.
-  Then, you will need to design and plan the marble maze.

Think about which materials you might use to create your marble maze.



Choosing Materials



Decide which materials would be best for your marble maze.

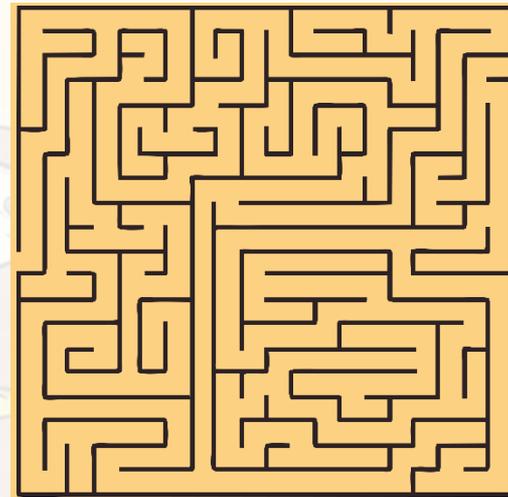


Decide whether the materials below are suitable or unsuitable for your marble maze. Explain your answers (even if you're unsure).

Material	Suitable	Unsuitable	Unsure
cardboard			
paper			
felt			
lolly sticks			
matchsticks			
straws			
string			

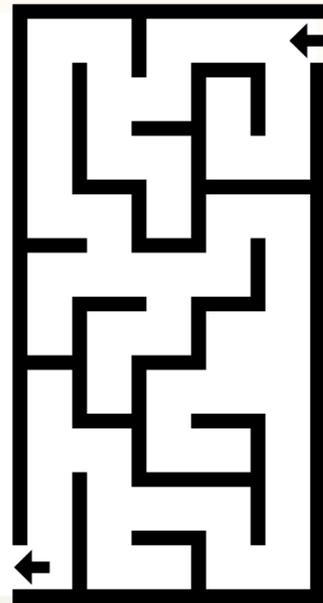
Features of a Marble Maze

-  A Marble Maze will have an entry and an exit point.
-  You will need to create a number of different pathways inside your maze.
-  Your pathways will need to be wide enough to let your marble or ball to pass through.
-  You can add in dead ends to increase difficulty.

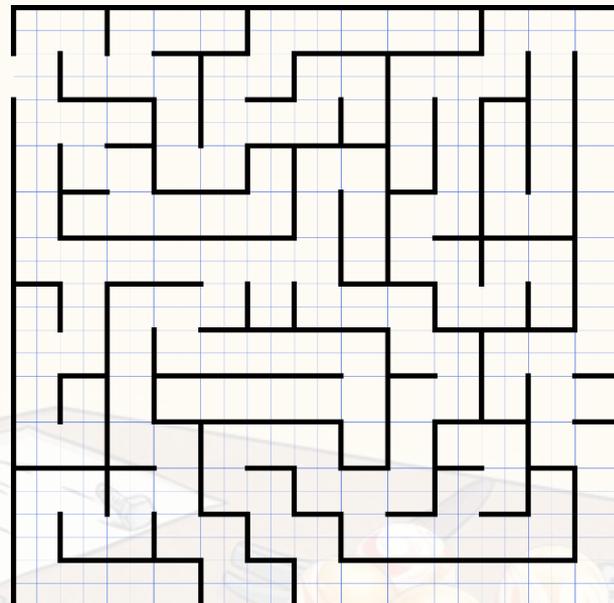


Here's two examples of a maze.

Which do you think is the more difficult maze? Why?



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"Maze Puzzle Vector Clipart" by Steam Coded is licensed under [CC BY 2.0](#)



Marble Maze Design

Now, it's your turn to create and build your own marble maze!

-  First, you will need to draw and label a design of your marble maze.
-  Then, you will choose the materials to use in your maze.

For an extra challenge, why not time how long it takes to complete your maze when you are finished!



Questions

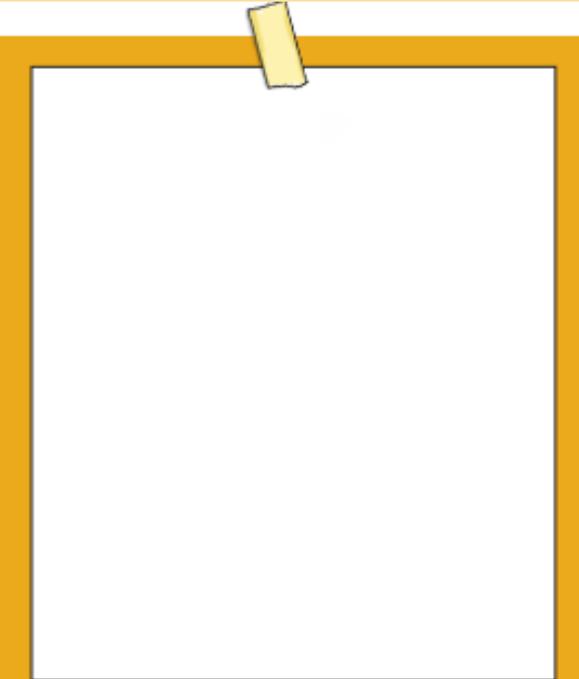
1. What was the biggest challenge you faced when building your marble maze?

2. What was the easiest part of building the marble maze?

3. Did you need to change your design at any stage? Why?

4. Do you think the materials you used for building your maze were good choices? Why or why not?

5. Is there anything that you would do differently if you were building a marble maze again?



Draw and label the design for your marble maze.

