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## NAÏVE STRATEGY

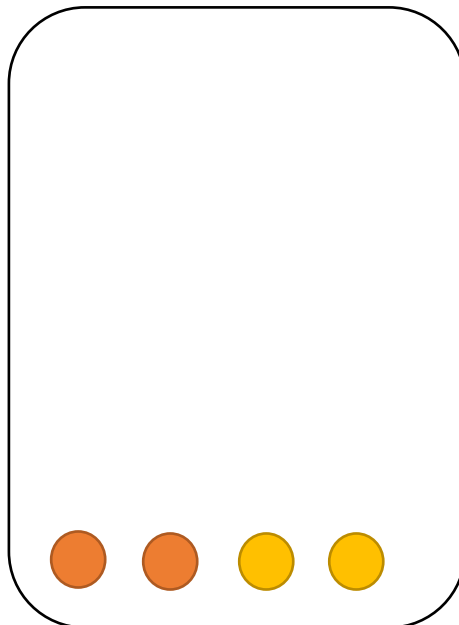
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I had previously thought of using my own strategy however the success rate of guessing in less than ten moves was very low, therefore I had decided to research existing strategies used to increase the overall success rate of winning the game mastermind. I came across a strategy online and had experimented with strategy myself and had a higher success rate. (Please see footer section for reference to this strategy).

Below demonstrates the naïve strategy using diagrams and annotation I had made:

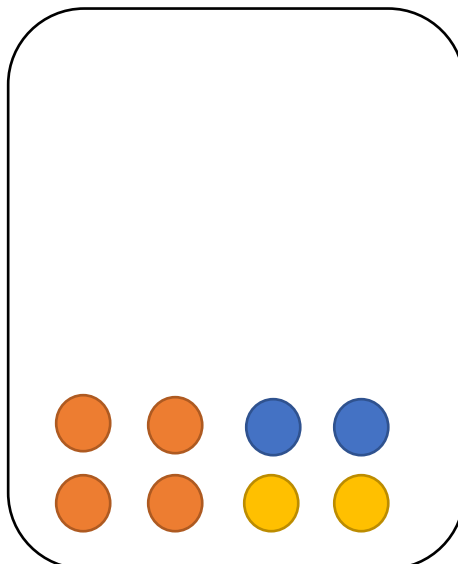
### Steps:

Step 1:



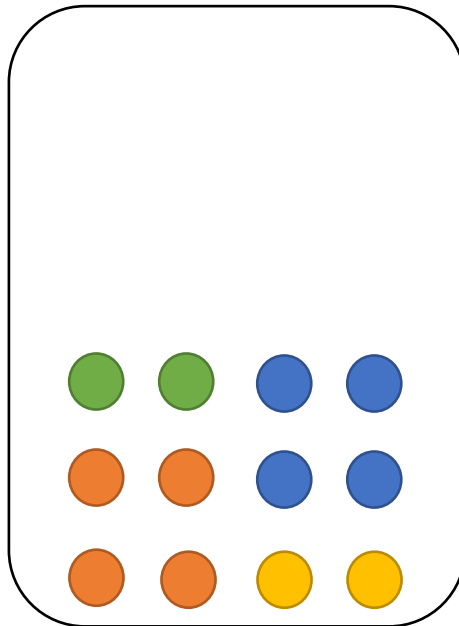
The first step is to choose 2 of each colour (pictured in diagram).

Step 2:



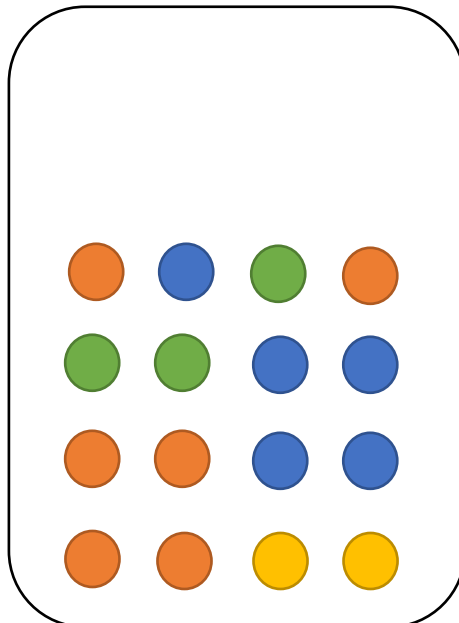
The second step is to keep the two previous on the left-hand side of board and pick to other random on right hand side of board (pictured in diagram).

Step 3:



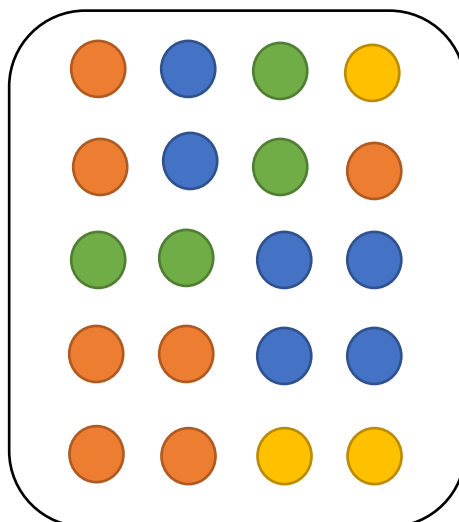
The third step is to keep the two previous on the left-hand side of board and pick two other random on the right hand side of board (pictured in diagram).

Step 3:



The fourth step is to take the first peg on first guess, shift it to first guess on current move. The third previous becomes the current 2<sup>nd</sup> position and the 2<sup>nd</sup> previous becomes the 3<sup>rd</sup> position, finally the 4<sup>th</sup> position is random.

Step 5:



The fifth step is to keep choosing a random colour for the 4<sup>th</sup> position until success.