Probability Problems

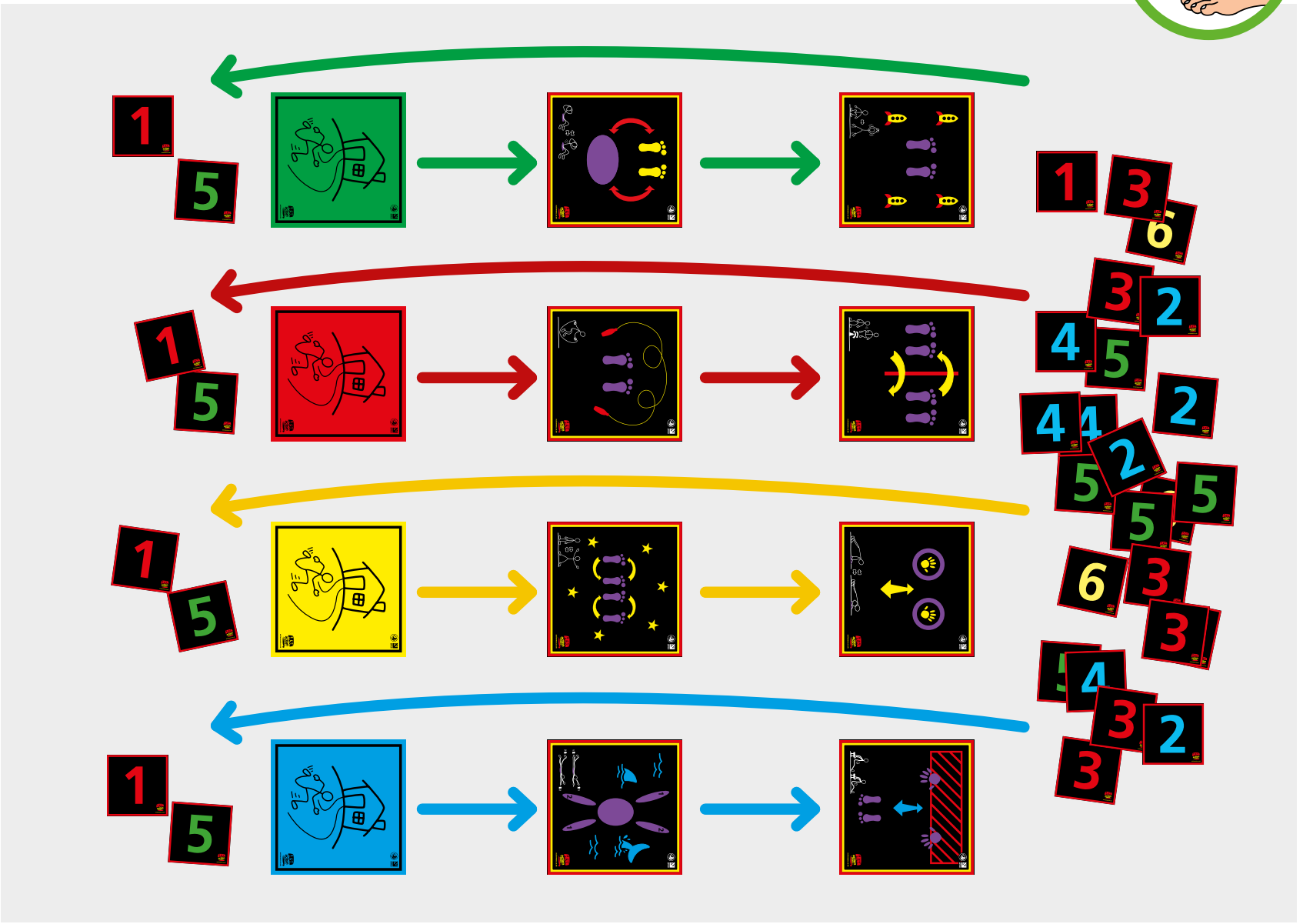
Year
5

Focus
Probability

What's needed
x4 Home Mats

Action Mats required:
As many as needed

Maths mats required:
All mats



Warm Up

What's the probability that

This is a good activity to get students thinking about what probability means. Write the words No Chance, Poor Chance, Even Chance, Good Chance, Certain on pieces of paper and spread them around the outside of the room. The students are to move around the centre of the room until you call out a statement (see below). They will then run to which sign they think best represents the probability of this happening.

Statements

I will go on a boat this year.

I will look at my phone today.

It will rain tomorrow.

I will meet a fairy princess this week.

I will go in a taxi in May. I will eat crisps

Main task

Probability Problems

Place a group of 10 coloured balls or beanbags that the students can all see (there must be at least four different colours).

Have students line up in groups behind their home mat, with the first child on the home mat.

Explain that you are going to take one ball from the pile at random. Ask what is the probability that it is a particular colour (eg, "What is the probability of me choosing a red ball?").

The first student runs through the action mats carrying out 10 actions on each to reach the maths mat. They select the correct digits to represent this probability as either a fraction (lower ability), or a decimal or percentage (higher ability).

This student then returns to his/her group and lays out the probability next to their home mat; they then join the back of their line.

After each question change a ball in the pile (eg remove a red ball and add a yellow) and ask the probability of selecting a different colour (eg, "What is the probability of me now choosing a green ball?").

To make this harder for students to work out the probability as a decimal and percentage, start with a different number of balls in the middle than 10. Starting with a multiple of 10 makes it slightly harder, starting with a number that is not a multiple of 10 or a factor of 10 makes it even more difficult.