

## Chance – Suggestions for teaching

### ENCOURAGING PLAYFULNESS WITH MATHEMATICS

- Provide children with opportunities to develop their understanding of Chance through actively engaging with trials and experiments with dice, spinners etc.
- Encourage children to play games with an element of Chance and consider how this impacts on the games and their outcomes
- Explore a common misconception called The Gamblers Fallacy – a belief that the onset of a particular random event is less likely to happen following an event using dice or coins

### USING COGNITIVELY CHALLENGING TASKS

- Vary the complexity of activities by increasing the amount of trials
- Encourage children to represent outcomes of an event or experiment in a variety of ways e.g. numerically, pictorially with tree diagrams and concretely
- Provide opportunities for children to use systematic approaches to counting a set of outcomes e.g. using tally marks

### FOSTERING PRODUCTIVE DISPOSITION

- Highlight that Chance plays an important part in our everyday lives
- Encourage children to make appropriate decisions based on analysing the likelihood of an outcome
- Be sensitive to challenging any misconceptions or preconceived ideas about Chance such as lucky numbers etc.

### EMPHASISING MATHEMATICAL MODELING

- Provide tasks that encourage children to consider all possibilities of an event rather than the possibility of one particular outcome e.g. find all of the possible combinations of a two scoop ice cream from 4 particular flavours
- Select tasks and activities that relate to the children's life experiences such as ice cream flavour combinations, menu combinations etc.
- Ensure children have opportunities to design their own trials to test the probability of an event e.g. drawing a particular coloured cube from a bag or a coloured sweet from a packet

### PROMOTING MATHS TALK

- Provide opportunities for children to discuss likely outcomes of events based on their own life experiences
- Ensure children have sufficient time to present and justify their ideas about Chance and the likelihood of outcomes
- Encourage the use of Chance related vocabulary across the curriculum e.g. making predictions about outcomes while reading