






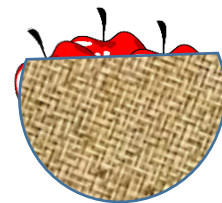
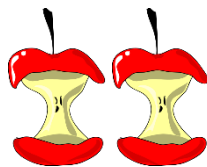



25 ways to keep children thinking mathematically during the holidays:





Number and place value

-  Count items e.g. birds in the sky, shells collected from the beach, people for lunch, steps in a staircase, windows on a house, seats in a bus . . .
-  Count out the cutlery required for each person at dinner
-  Include your child in shopping activities by helping them to:
 - Recognise the coins and notes
 - Count the value of coins and notes
 - Predict whether they have enough money to purchase an item, and whether there will be change
 - Tender the money in payment for an item
-  When your child is sharing e.g. the biscuits, balloons or slices of fruit, ask them to:
 - Predict if there will be enough for everyone to have one, or more than one each
 - Share out the items, allocating the same number to each
 - Determine if there are any left over and what to do with them
-  Use terms like half and quarter correctly, e.g. when cutting apples, oranges, sandwiches, pizza, to indicate pieces of equal size
-  Play games that involve counting, e.g. counting the number of skips, balls in hoops, pins knocked down, or dice games like snakes and ladders that require adding as well as number recognition and counting
-  Make up number stories e.g. “We had five apples in the bowl. I ate one, and you ate one, how many are left?”



-  Read books with number concepts e.g. Pat Hutchins’s *The Doorbell Rang*, Eric Carle’s *Rooster’s off to see the world* or Kim Michelle Toft’s *One Less Fish*

Patterns and algebra

-  Use items to make patterns e.g. sort and create a pattern from shells collected at the beach, building blocks or toy cars
-  Look for patterns in the environment e.g. fences, tiles, walls and window, zebra crossings
-  Decorate cards and drawings with a patterned frame
-  Make gift wrapping paper by decorating with potato prints or stamp patterns



All clipart courtesy of <http://openclipart.org>

Measurement and geometry



Include your child in cooking activities and allow or support them to:

- measure the ingredients
- set the temperature on the oven
- work out the cooking finish time



A child's understanding of volume and capacity can be developed when they:

- pour glasses of water from the jug and discuss terms such as enough, full, empty, half or part full, more, less
- pour from one container into another of a different shape to compare which holds more and which holds less



Scales can be used to compare the mass of different items or quantities e.g. compare an apple and an orange, measure the quantity of butter required for a recipe



Measuring length can be included by:

- measuring and comparing height
- cutting a length of string to tie a package
- measuring who is closest to the *jack* in a backyard game of lawn bowls



Use the calendar to

- learn the names and sequence of days in the week or months in the year
- count the passing days or the number of days until an event



Identify shapes in the home and environment e.g.

- 2D shapes: tiles on floor and walls, shapes of windows, sections of footpath
- 3D shapes: cereal boxes (rectangular prism), balls (sphere), bottles or cans (cylinder), dice (cube)



Play games that involve shapes e.g. jigsaw puzzles, tangrams



Talk about directions e.g. left, right, forwards, backwards and follow directions on a grid



Play games that involve directions and movement in space e.g. battleship, *Hokey Pokey*, *Simon Says*, *Snakes and Ladders*, *Ludo*



Read and discuss books that include measurement concepts e.g. Pamela Allen's *Who Sank the Boat?* (volume); Eric Carle's *The Very Hungry Caterpillar* (days of the week) and *The Bad Tempered Ladybird* (time); Penny Matthews and Andrew McLean's *A Year on our Farm* (months and seasons); and for looking at places on a map Mem Fox's *Sail Away The ballad of Skip and Nell* or Annette Langen & Constanza Droop's *Letters from Felix*

Probability and statistics



When discussing the weather or desired activities include the language of probability e.g. possible, certain, likely, unlikely, impossible



Encourage children to collect data about family or friends by asking *yes/no* questions e.g. do you like swimming, or making a graph of the family's favourite colour or meal.



Play games with spinners and dice and talk about the likelihood of spinning or throwing a particular number



Have fun with maths!