

Positive Eye

Ideas and Suggestions for development of early maths skills

Early Numeracy and Concept Development

Basket of everyday objects

To develop skills:

Counting

Matching and sorting

Categorising

Discriminating

Using different textures, make sounds, play and extend the learning. Rattle the spoon in the cup, fill the cup and the jug with water find out which holds the most, squeeze water from the sponges. Match the socks, categorise the brushes, find all the circular, square shapes, longest, shortest objects.



Understanding the qualities of objects

'Woodeness of the wooden spoon'
Experience and maximise the learning opportunities:
Shortest—longest
Handles of wooden spoon, different top (fork)
Categorise by spoon head
Thinnest—widest
Measure using the spoon as a unit of measurement.



Understanding the qualities of objects

'Whiskness of the Whisk'

Explore the qualities of the different whisks
Whisk bubbles in a bowl
Make cupcakes using whisk
Make a mobile with whisks
Add plastic whisk to the collection
Explore electric hand whisk (not plugged in)
Listen to the sound each whisk makes when it is used.
Find out which is the heaviest—lightest whisk



Concept Hanger (Hanger £4.50 from IKEA)
Hang Bracelets, metal objects, wooden objects,
square/circular/rough/smooth/cold to touch ob-
jects.

Change the objects each week, collect the ob-
jects with the child.

Categorise the objects
Sort by shape, size,
length, texture, height



Concept bags
R for Rolling (Objects that roll)



Rolling pin, pastry cutter, paintbrush, glue, cork, small ball, large ball, lens cleaner,
inner from kitchen roll.

Metalness of Metal

In a metal tin

- Oval metal tin
- Bracelets
- Shirt cufflets
- Clock
- Bolt
- Pastry cutter



Classification/Concept Bags—H For Hair bands

Range of hair bands and hair accessories to classify by shape, texture, decoration.



Classification/Concept bags—silver and shiny bag (two attributes)

Beads, belt with sequins, make up bag, buckle, boxes, bracelet

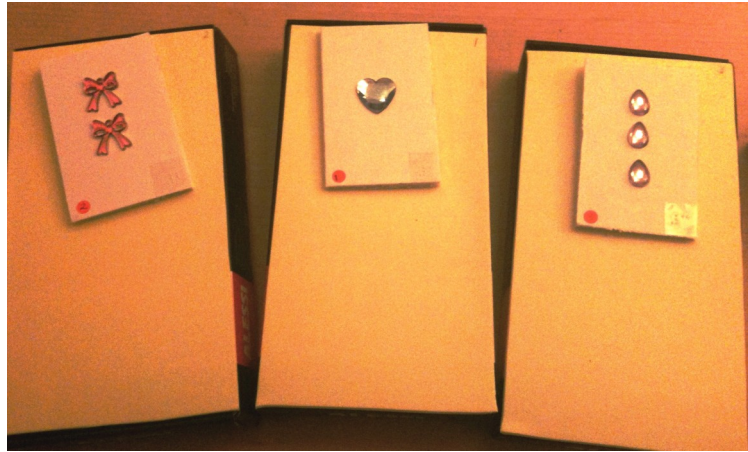


Understanding number as a whole—'numerousness'
The oneness of one, the 'twoness' of two, the 'threeness' of three.

Use the detachable number line to add to the front cover of each box. See page 12.

The box contents can be used to understand the oneness of one, the 'twoness' of two, as well as to understand the 'pencilness' of the pencil, or the woodenness of the wooden spoon.

Pencils, fans, bottles, spoons, toy cars, brushes, any objects from around the house.



Sorting/ Matching

Shells , buttons,
beads etc.



Big and little

Small and large objects
from around the house or
from within the child's daily
environment.



Same and different

Objects which are exactly the same
and objects which are different,
some with more subtle differences,
e.g. Pattern on the bracelets



Positive Eye's Supermarket

Comparison:

Largest—small

Tallest—shortest

Widest—narrowest

Match shapes

Learn about capacity



Shape



Capacity



Match shapes



Ordering by size

Collect a selection of bottles to order by size. Categorise by shape, opening, lid type, material made of.



Sorting by shape Ordering by size

Largest to smallest using pots, jam jar and milk container lids



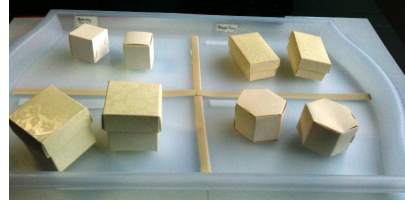
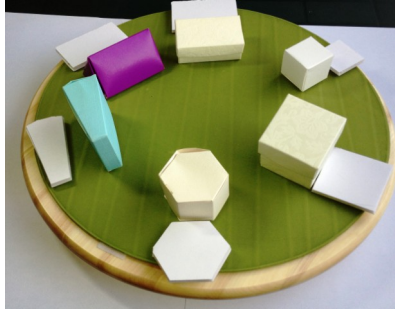
Ordering/Comparing

Tallest to shortest activity
Measure each object and place in order.

Long tray from IKEA used with foam board shaped to tray and added in as an activity base.



Create games and activities to **match 3D shapes to real objects and 2D shapes**



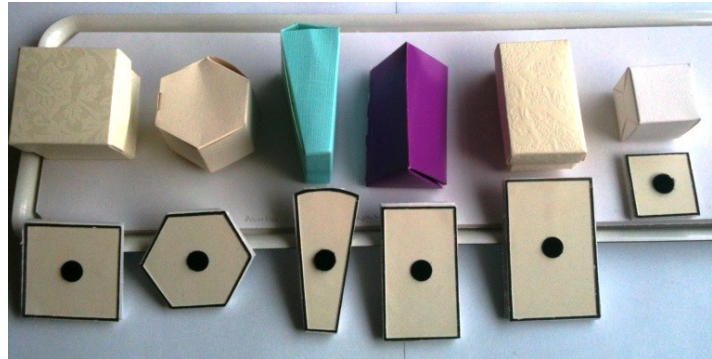
Use Lazy Sue or a large tray divided into four areas.
(include names of shapes, number of sides)



Understanding shape

Matching 3D to 2D shapes

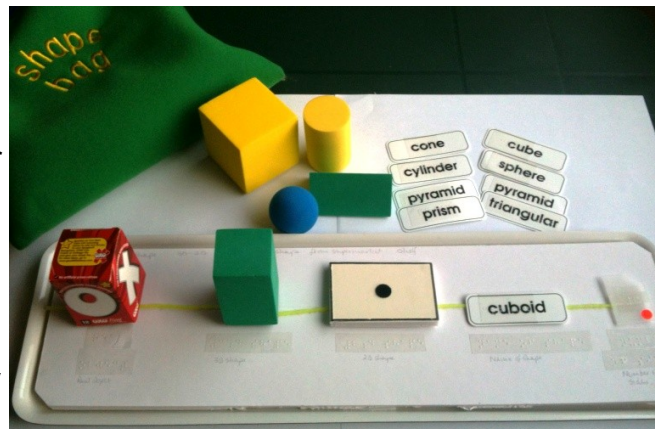
Use wedding favour boxes and 2D shapes cut out in foam board with zychem raised outline stuck over the top of the 2D shape



Matching 3D to 2D shapes and naming the shape.

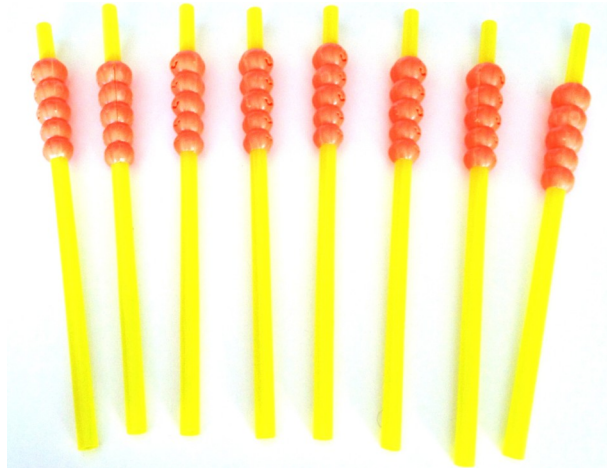
Real object—3D model—2D model of plane—name of shape—number of sides.

Bag of shapes from RNIB
Long tray—IKEA
Foam board cut to size of tray to make interchangeable work activity card.
2D shape cut out in foam board with zychem outline shape stuck on top.



Counting

Many objects can be used to support counting. It is better to use everyday objects, those from the child's daily environment. Here are some thick drinking straws with 5 mini pumpkins on each one, useful for counting, early times table.



Early Number Line

Use same size boxes and add number to each to make a number line, add the appropriate number of objects to each box, encourage child to read the Braille number and count the correct number of objects.

Child to independently find objects for each numbered box. Extend learning and add a different letter to each box—e.g. find 2 objects beginning with the letter b



Early number line

Stacking rings and stacking beakers make good number lines and can also be used for other activities, smallest to largest. Beakers can be turned over and filled with the appropriate number of objects.



Early Number line—Bucket Number Line—add number to each bucket and appropriate number of objects to each. Add letter to each bucket, e.g. To spell the word bucket and add number of objects beginning with each letter.



Number line—counting, adding, subtracting activities

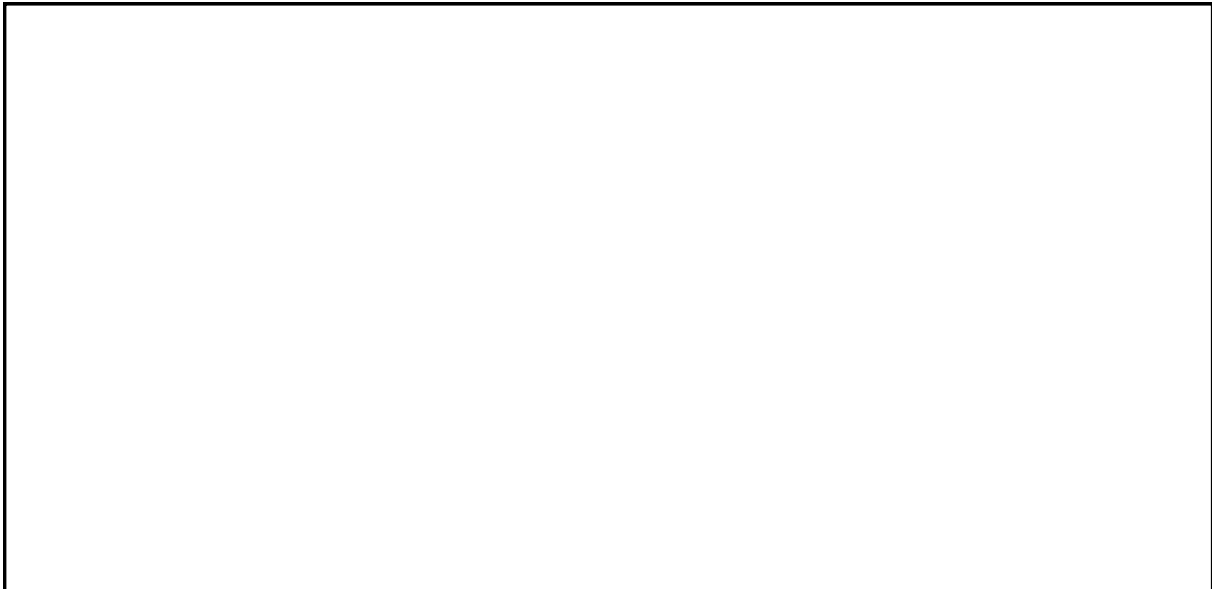
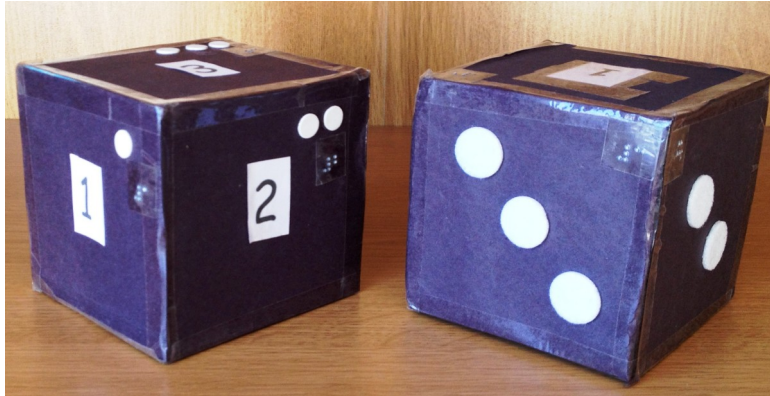
Detachable individual boards stuck on with Velcro, can be used for other counting activities. Use with spinner to play snakes and ladders (up and down the number line)

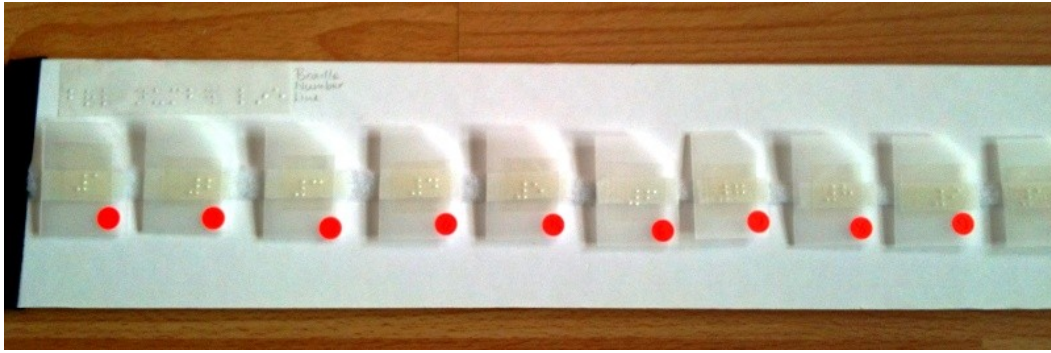


Number line

Counting activity— each number has the name of the word, the number and the counters in a dish.

Make homemade dice
up to 3
Write number in letters
Use discs
Write numbers in large
print or Braille





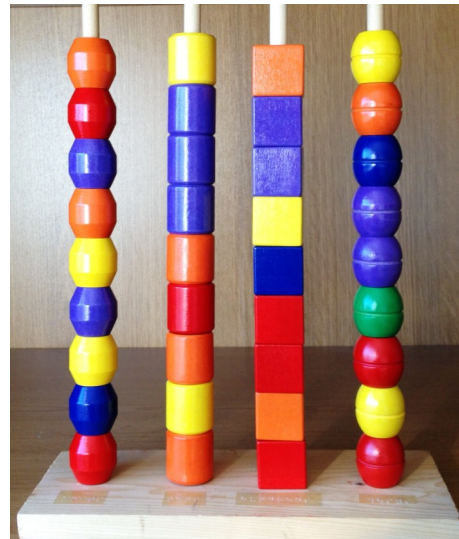
Number line

On laminated cards, with Braille sticky back numbers attached. Cards attached to a line of Velcro on a foam board

Abacus

Four dowelling sticks stuck in a base board, each labelled with units, tens and hundreds

Beads of different shape for each column.



Addition and subtraction activities

Use the spinner/dice to play the game
When it lands on a 6 spin the Lazy Sue.



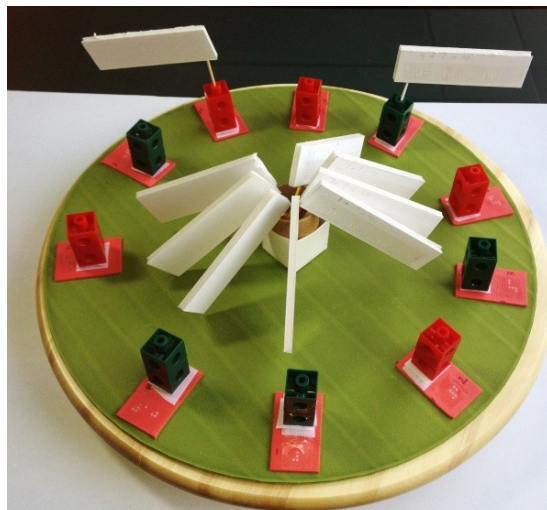
Read the

number from the top of the box that stops in front of you, open the box and take a number out, **add, multiply, subtract or divide the number.** Choose correct answer from number line and place in pot in middle.

Subtraction and addition activity

Spin the spinner to get a 6 then choose a flag from the central pot, read the sum, there is a number missing, place the flag in the correct tower which has the missing number at its base.

Lazy Sue with activity mat added.
Unifix used to make towers
Unifix velcroed to base with number added in sticky back Braille.



Fourness of Four Sharing between four Counting four

Four cups
Four plates
For four people, how many cups, plates?
Take one plate away, how many left?
Take one cup away, how many left?



Sharing:

Dividing and sharing between two.
Using plastic food containers—two compartment salad box



Sharing

Between 2, 3, 4, 5, 6.
Or can be used for matching patterns and shapes activities
Wedding favour boxes added with Velcro to foam board activity base. Shapes added to the top of each box.



Sharing

Between 2, 3, 4, 5, 6.
Use a food tray (mini steak pies) and the discs from the inside of bottle lids, these make good sturdy counters.

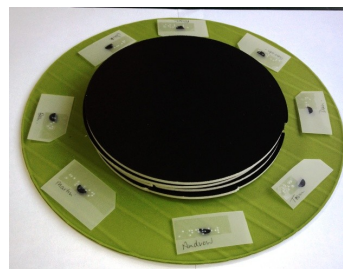


Sharing the cake

Using mouse mats on a 'Lazy Sue' placed on top of each other.

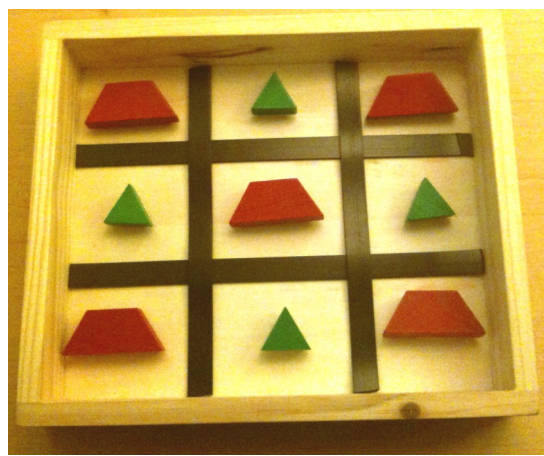
Each divided into 1/8, 1/4 and 1/2 respectively.

Add names of children on laminated tickets and invite them to share the 'cake.'



Making Patterns

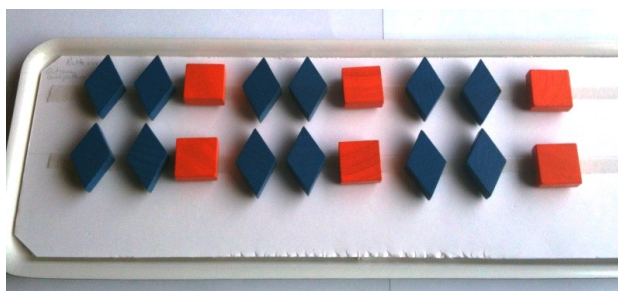
Shapes are attached with Velcro.



Making patterns

Two lines of Velcro to support pattern building. Wooden shapes used

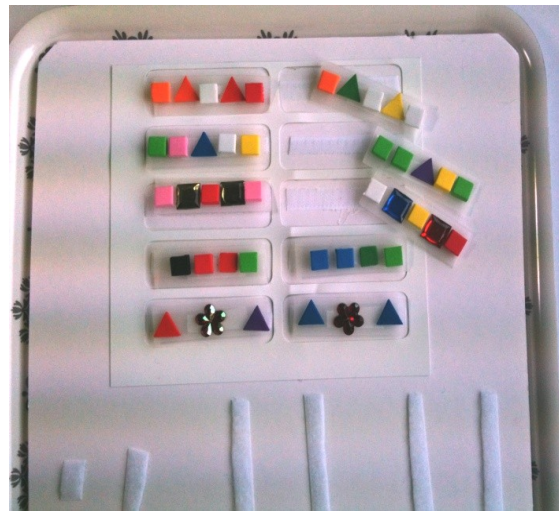
(NB: Would need to have learnt to identify and recognise shapes in the environment initially)



Matching patterns

Matching patterns, subtle patterns made of different textures and also matching lines of patterns (see picture on right)

Make patterns on laminated strips, use small cubes or flat felt shapes (Hobbycraft)



Shopping list

Layout coins required to buy item.
Find out cost of each item. Add items together on shopping list.

Use large piece of foam board, divided into sections

Words for shopping list made on laminated strips with sticky back Braille secured to surface. Make smaller laminated squares with prices of each item.



Homemade dice

Counting up to 3

