



PARENTS' MATHS WORKSHOP RECEPTION



Aims of the Session:

- Share with you some of the things your child will be learning in school
- Improve your confidence in helping your child with maths
- Explore some games and activities you can play with your child at home to help them develop fluency and become more automatic with number facts.



Why engage with your child's learning?

Research evidence suggests that when parents are engaged in their children's learning, outcomes for children can be improved.

Mastering Number Programme...

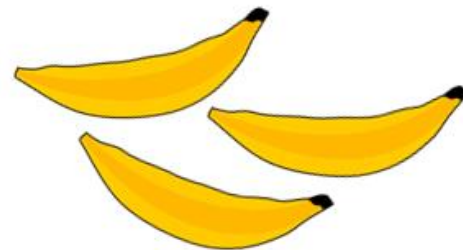
In Reception, Year 1 and Year 2 we follow a mastering number programme.

This will help your child to develop good number sense.

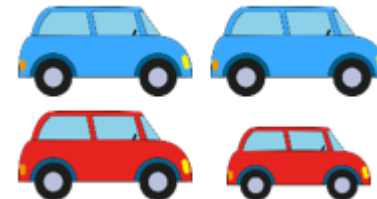
Some of the things they will learn includes:



Counting

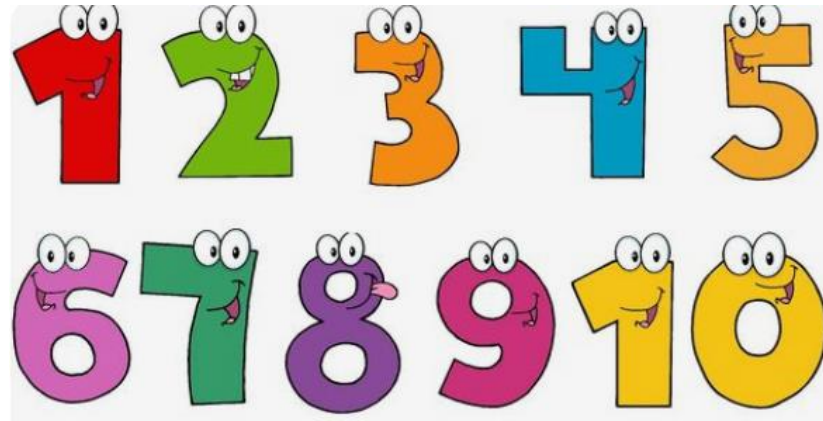


Recognising small numbers of objects and making their own collections



Know different ways to 'make' (compose) a number

Counting



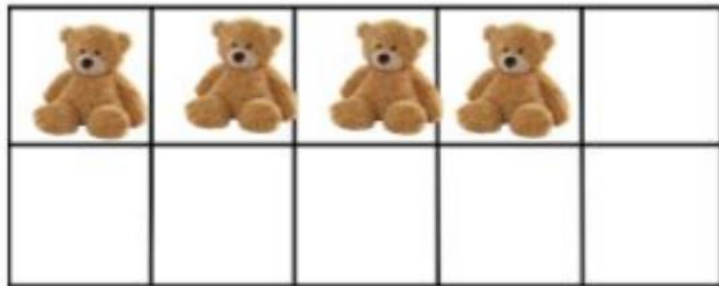
- ▶ We can often want to rush towards symbols in maths and counting is no different.
- ▶ It is important to help the children to develop a firm grasp of counting.

5 counting principles...

1. One-to-One Correspondence Principle.

Understanding that each object being counting must be given one count and only one count.

It is useful in the early stages for children to actually tag or move each item as it is counted.

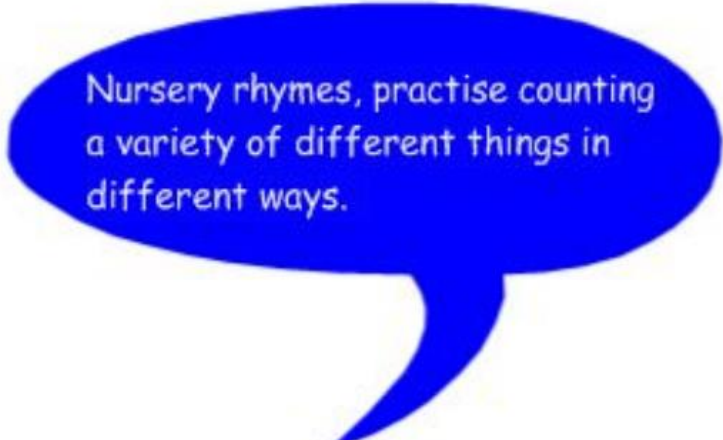


5 counting principles...

2. Stable Order Principle

Understanding that the counting system stays consistent. That it is always 1, 2, 3, 4, 5, 6, 7, etc not 1, 2, 5, 3, 8

Can your child spot mistakes?



Nursery rhymes, practise counting a variety of different things in different ways.

5 counting principles...

3. Cardinality Principle

Understanding that the last count of a group of objects represents how many are in the group.



Keep modelling: There are 1,2,3 marbles in the jar.
There are 3 marbles.

5 counting principles...

4. Abstraction Principle

Understanding that it doesn't matter what you count, how we count stays the same.

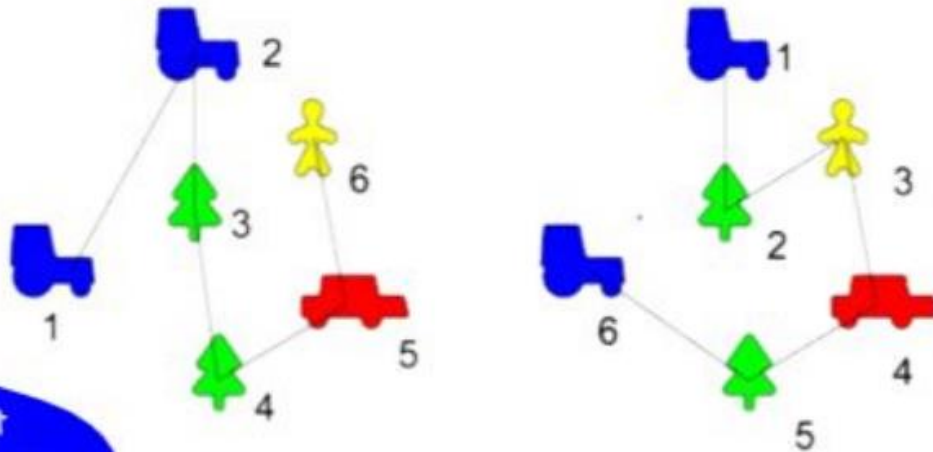
For example, any set of objects can be counted as a set - it doesn't matter about the size or colour or shape.

5 counting principles...

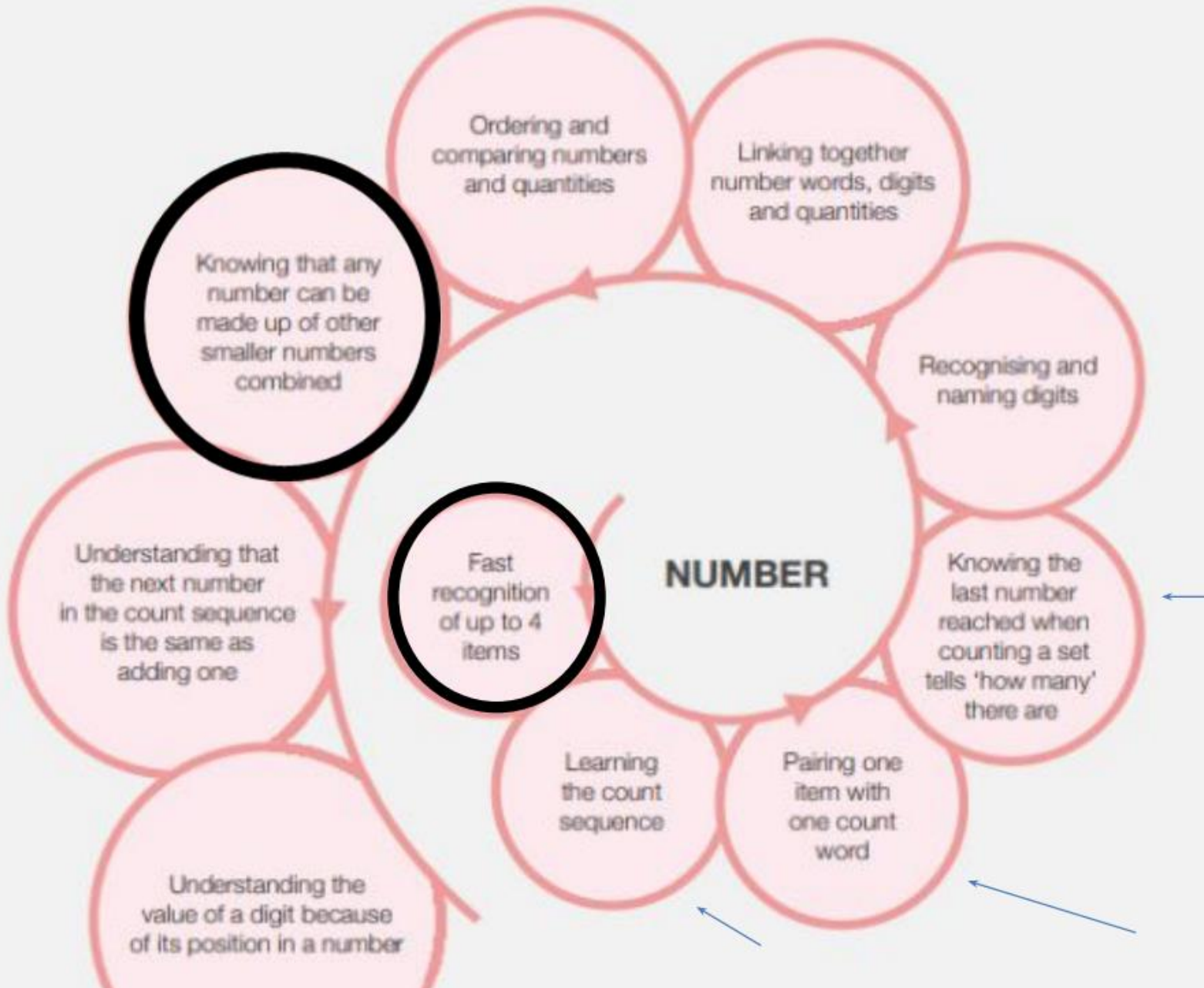
5. Order Irrelevance

Knowing that the order that items are counted is irrelevant as long as every object in the set is given one count and only one count.

(left-to-right,
right-to-left, in a
random fashion)



Re-count real objects that
can be touched starting from
different position.



This diagram explains the development of number.

Subitising

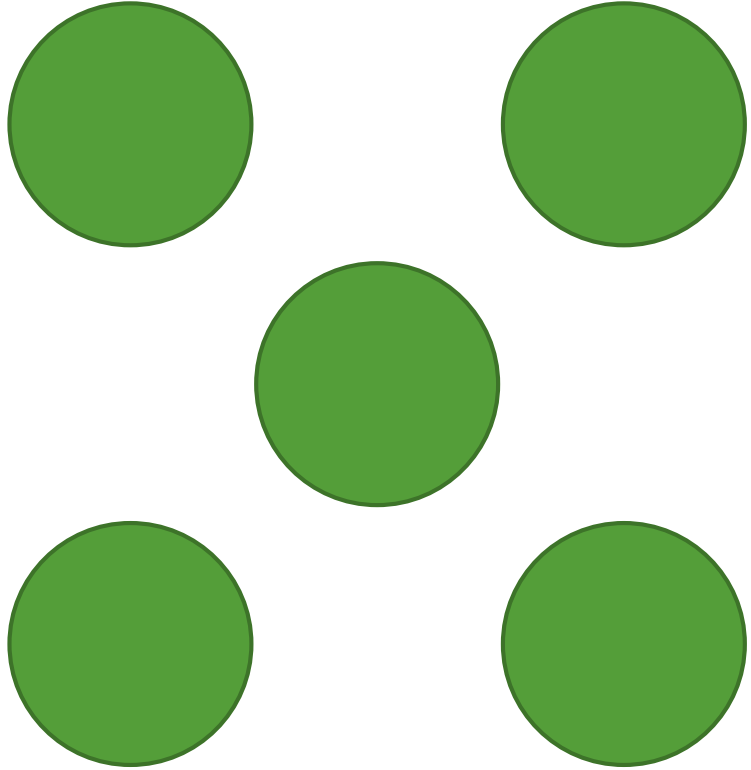
Subitising is the ability to recognise a *small quantity* of objects *without the need to count*.

It helps the children to understand the composition of number.

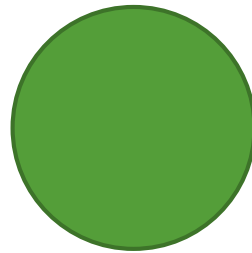
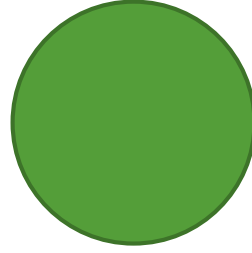
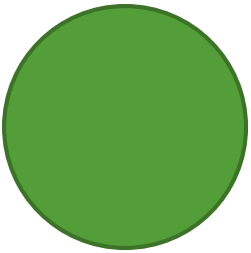
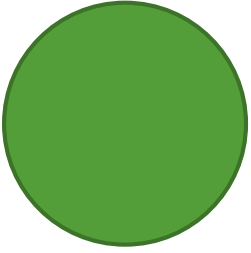
Let's do some maths with the children!



Look out for when you can use your subitising skills! Get those fast eyes ready!



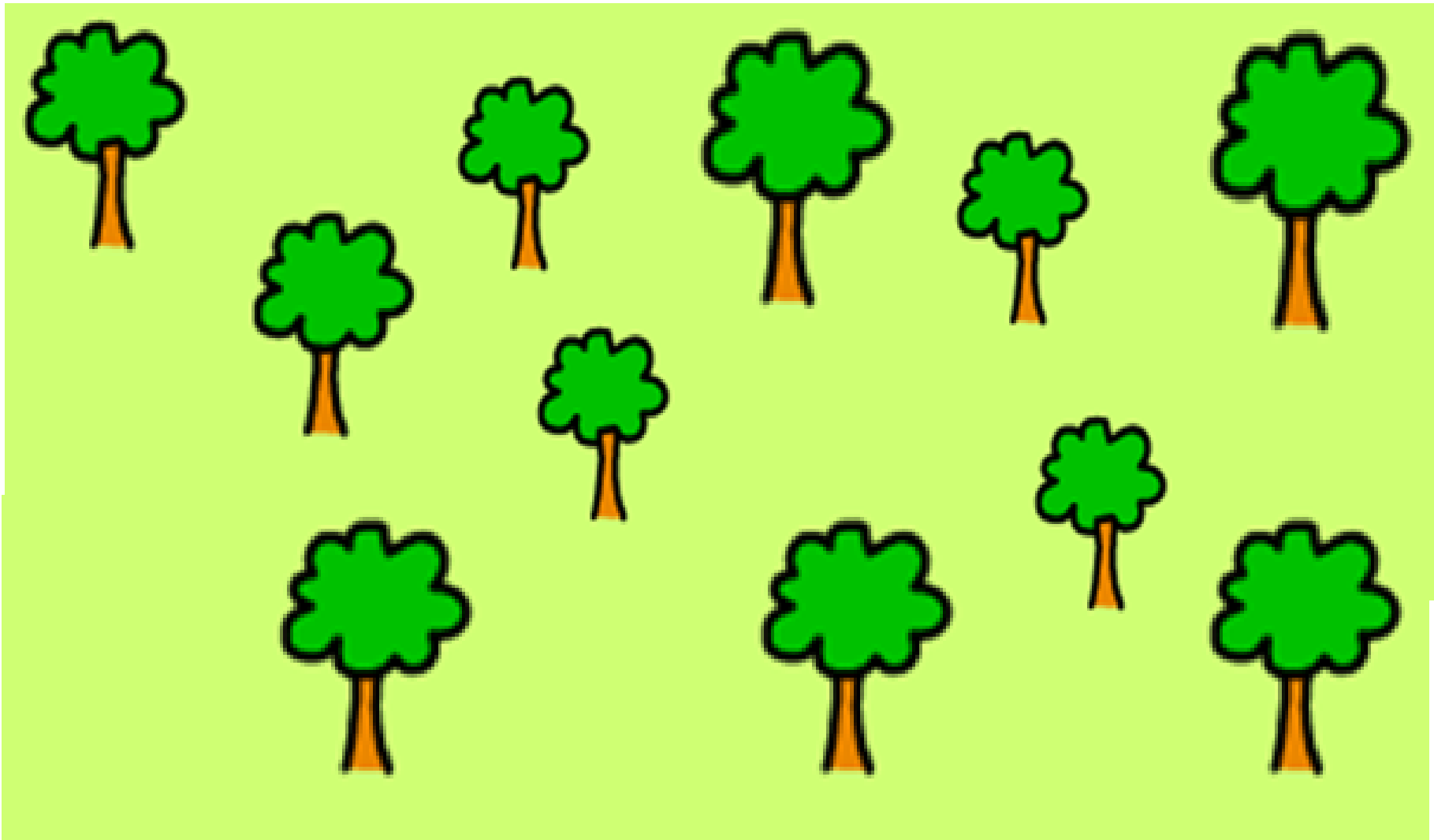


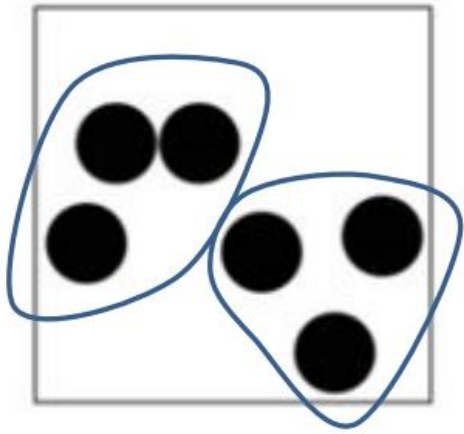


Subitising

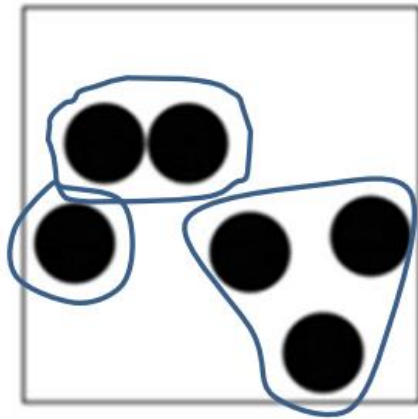
Sometimes when we subitise we can see two groups at once; if we know that 3 can be 'made' of 2 and 1, then we know how many there are altogether without counting.



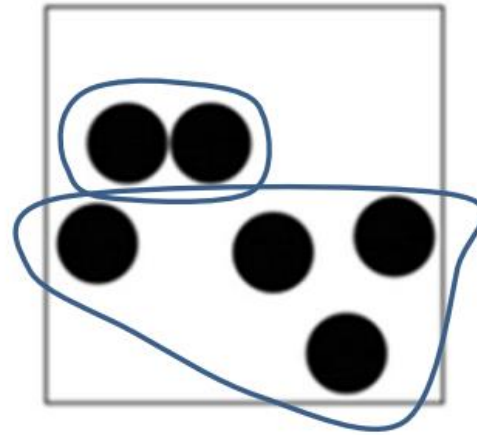




3 and 3



**2 and 1
and 3**



2 and 4

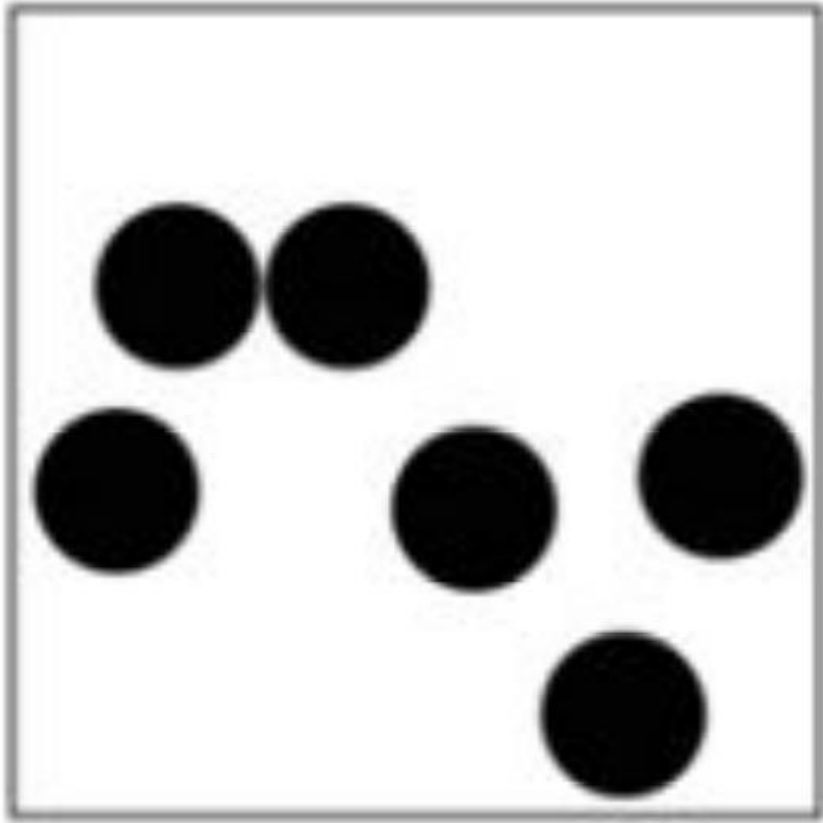
There are more ways to recognise 6. By asking the children to investigate images and talk about what they can see helps children develop their understanding of different numbers.



I know 1 and 3
makes 4.

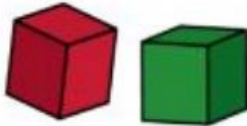
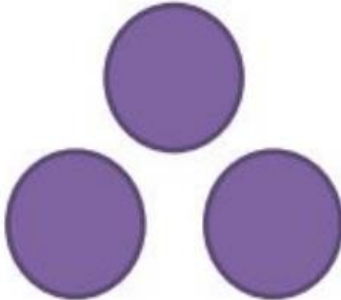
2 more than 4 is 6

How did you see the number?

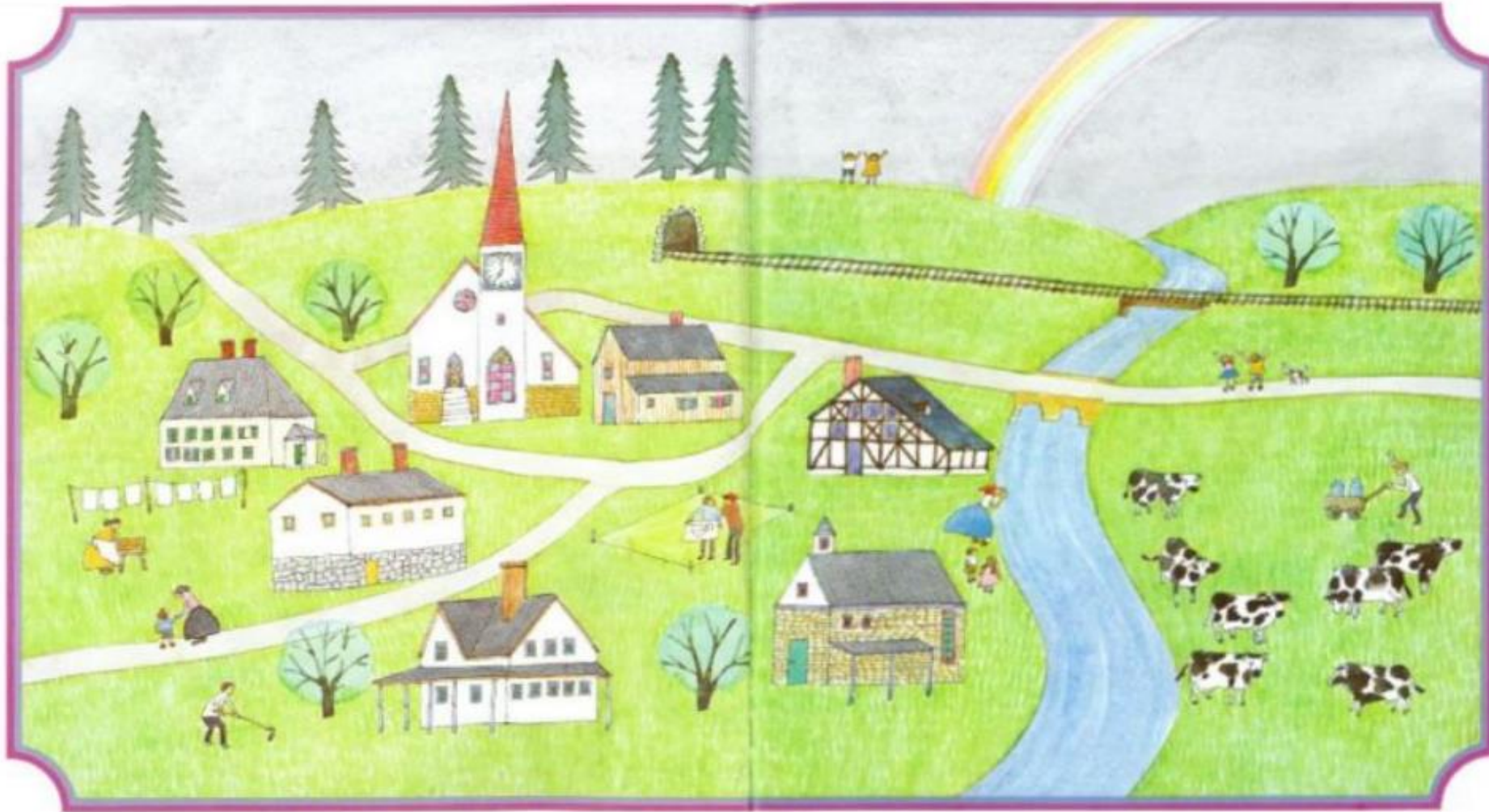


What numbers can you see hidden?

Not just dots



Subitising in the environment



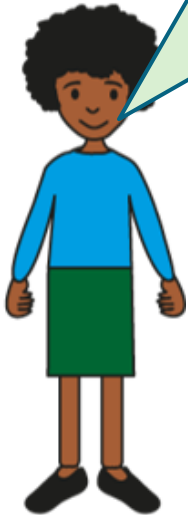
How many times can you see 7 objects?

Subitising

Numbers 1 to 3 Subitising Roll and Cover

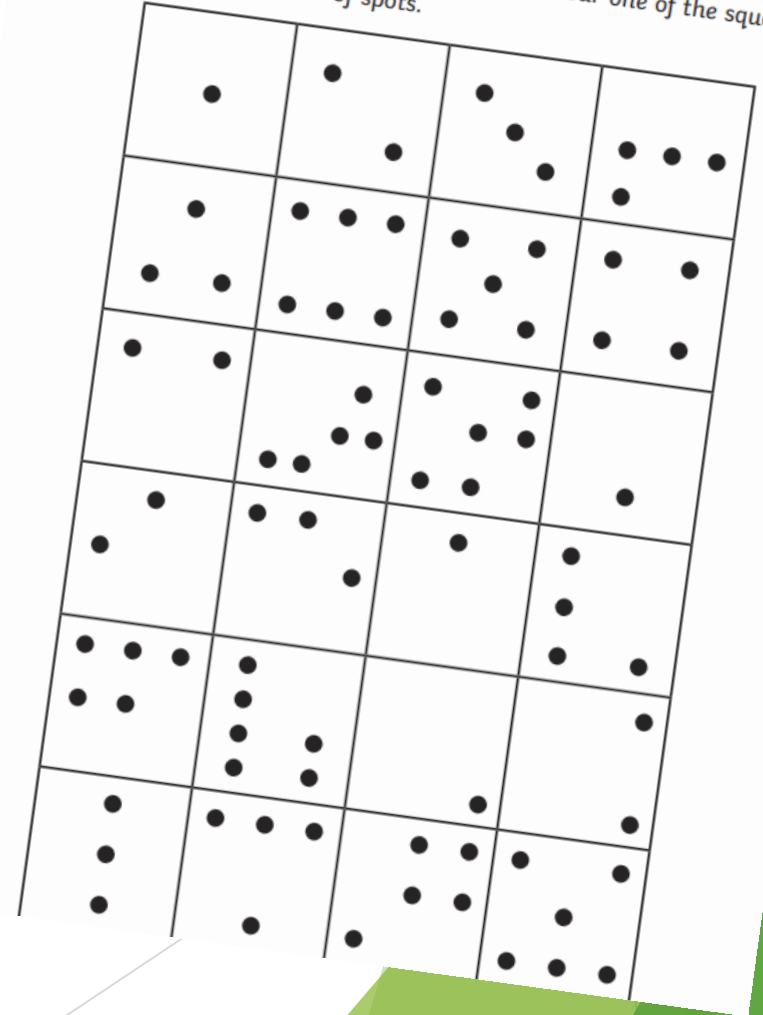
Provide a 1-3 dice. Roll the dice and cover or colour one of the squares with the corresponding number of spots.

Don't count, say the amount!



Numbers 1 to 6 Subitising Roll and Cover

Provide a 1-6 dice. Roll the dice and cover or colour one of the squares with the corresponding number of spots.



Magic Counters!



Grown-ups, hide some counters under the towel.

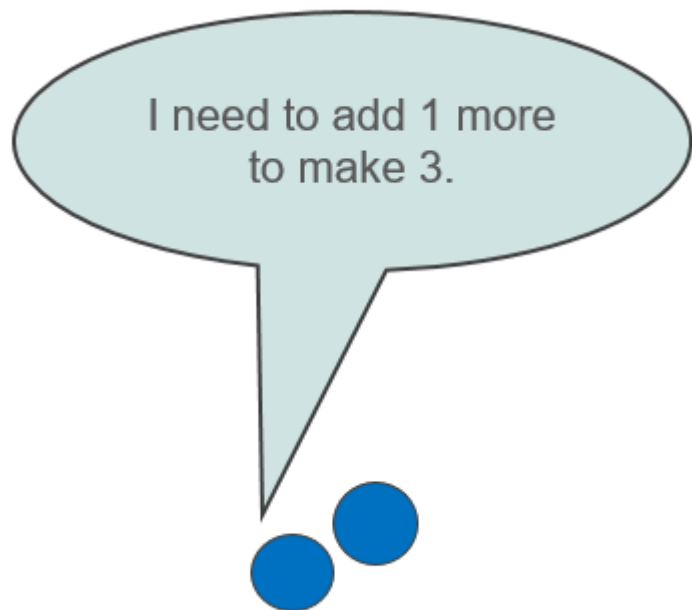


Reveal them quickly and ask your child...



3 or not 3?

Now ask: 'What do you need to do to make it 3?'



How will knowing how numbers are 'made' help?

If children know that 4 can be made of 3 and 1, they can apply this knowledge later on to see that:

30 and 10 is 40

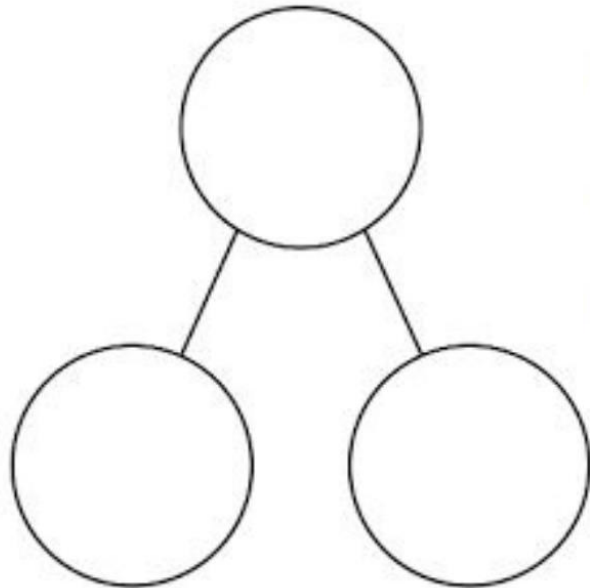
300 and 100 is 400

and that;

400 take away 100 is 300

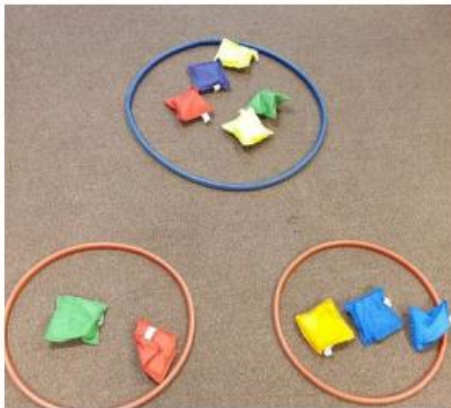
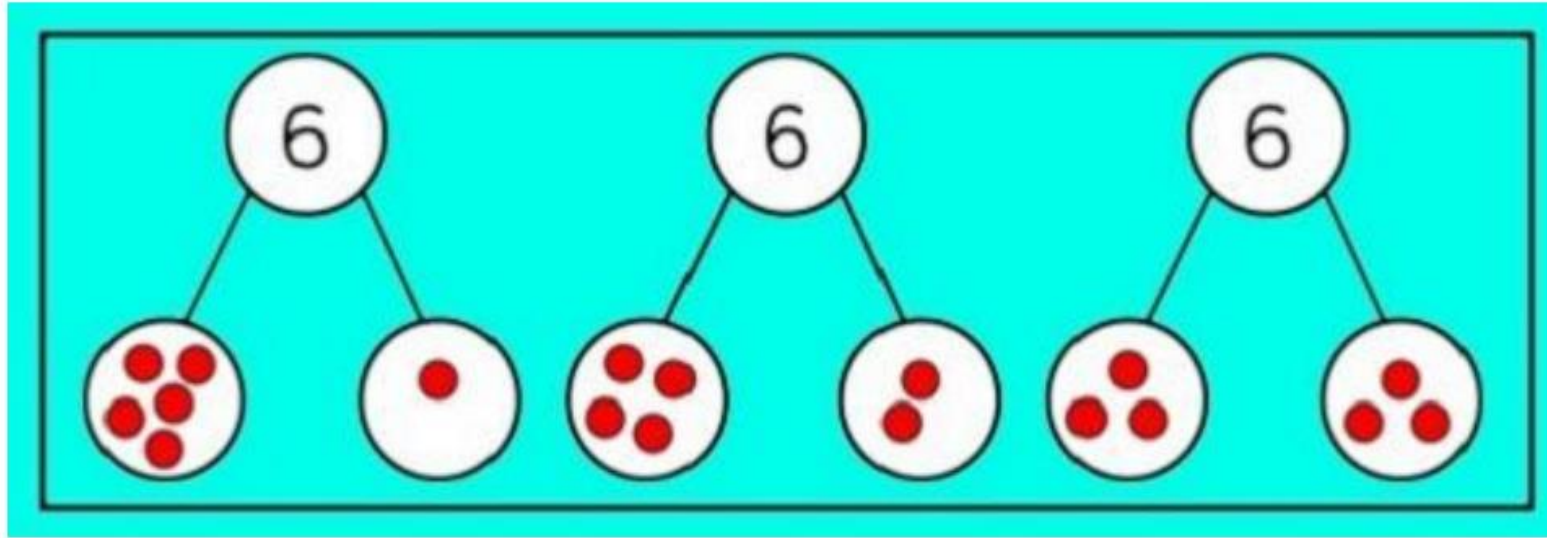
Composition of number

As well as subitising to help the children to recognise the composition of number we also use a whole part model.

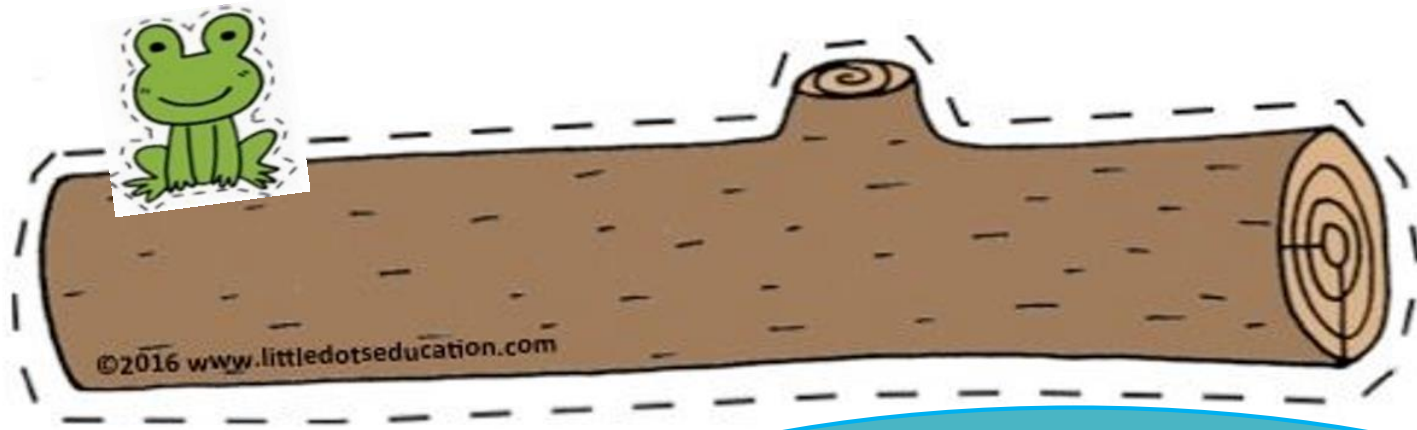


Numbers are composed of smaller numbers

- Numbers can be made of 2 parts
- Numbers can be made of more than 2 parts
- Numbers can be made of equal parts
- Numbers can be made of unequal parts



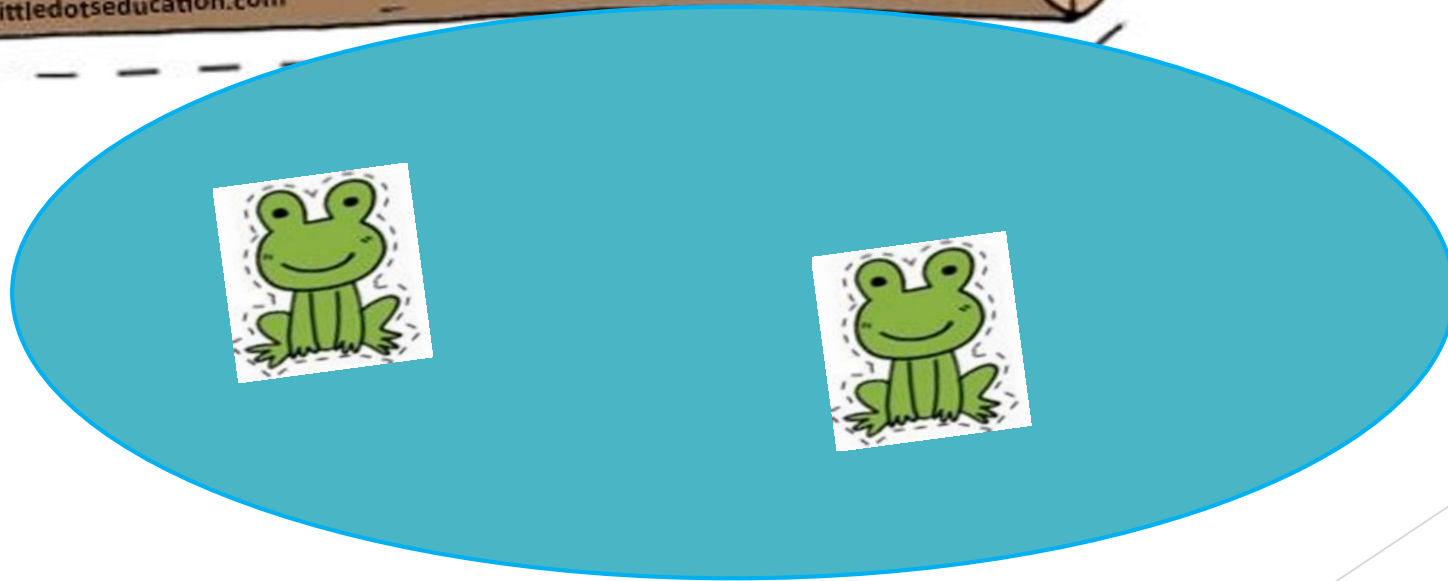
Frogs on a log!



You will also need to show the numbers on your fingers!

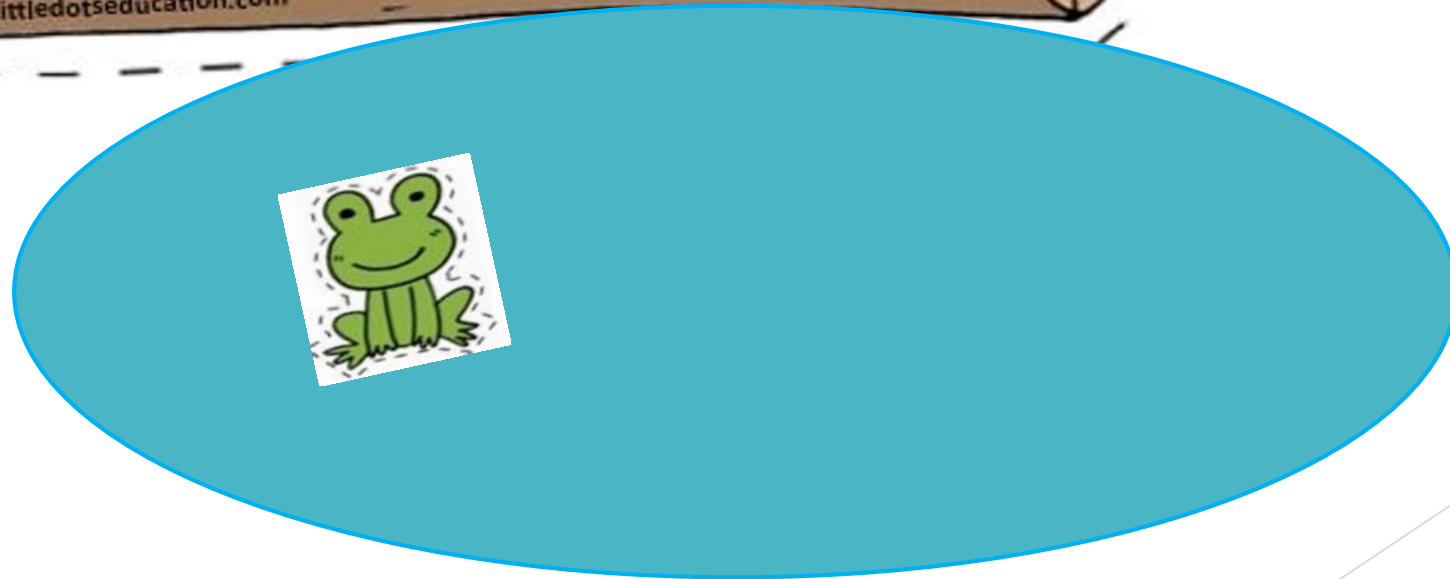
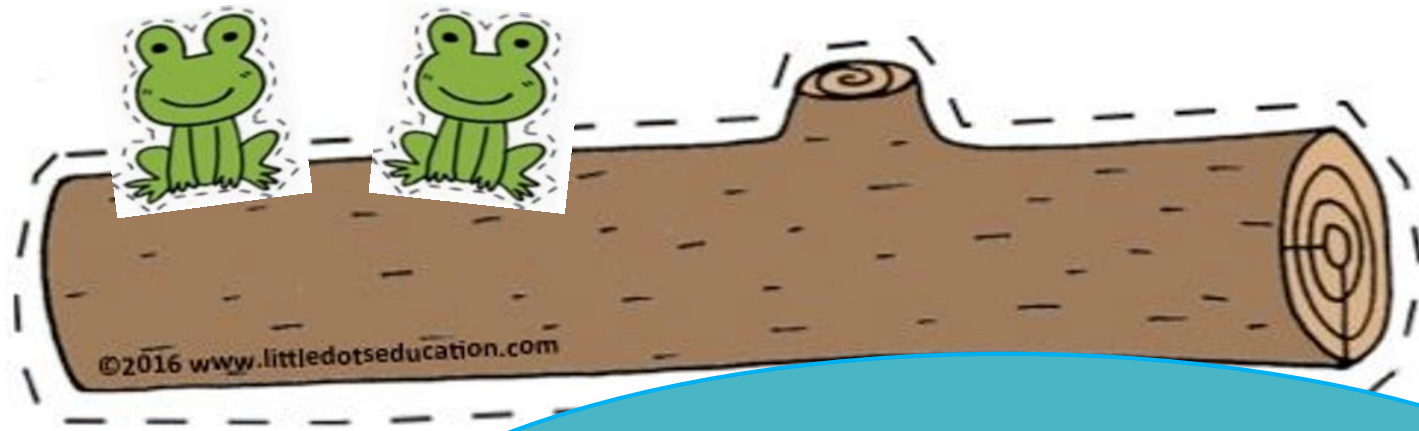


Frogs on a log!



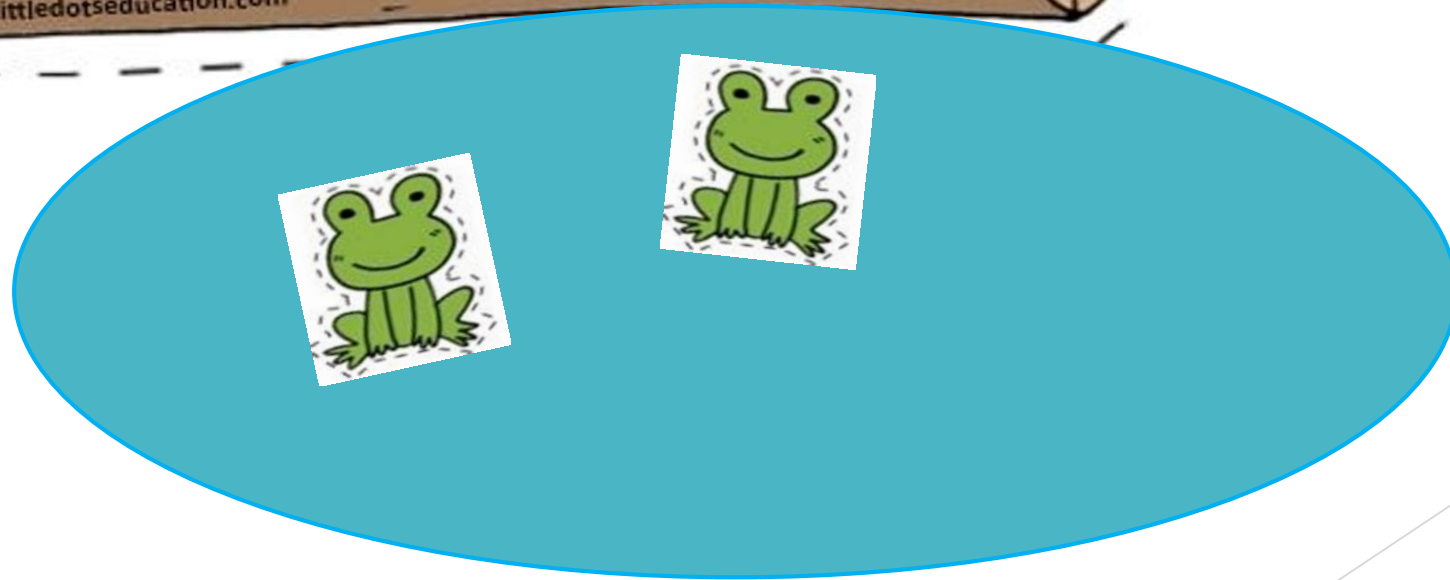
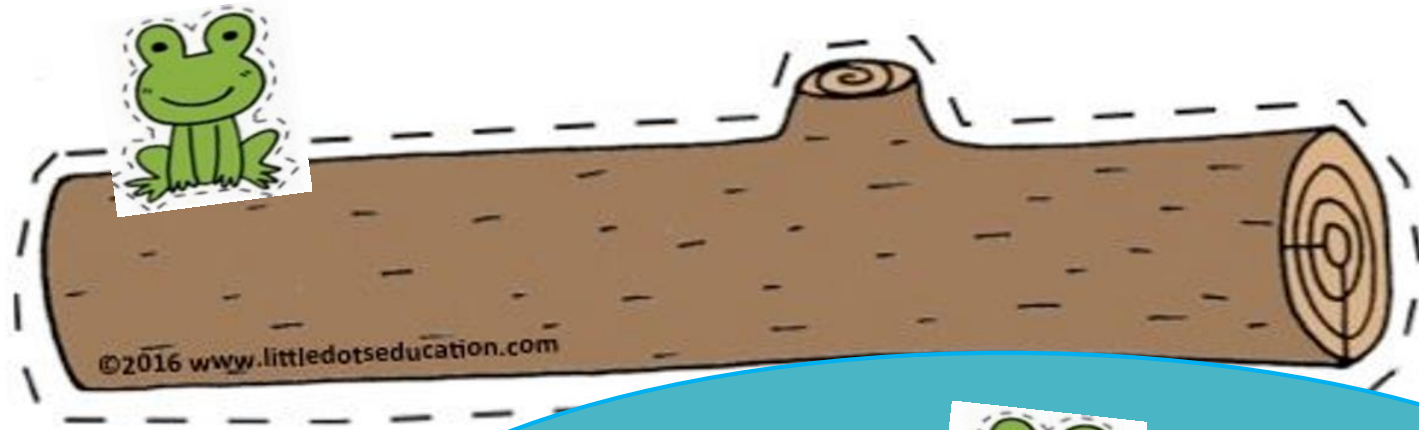
Show with your fingers:
How many are on the log?
How many in the pool?
How many altogether?

Frogs on a log!



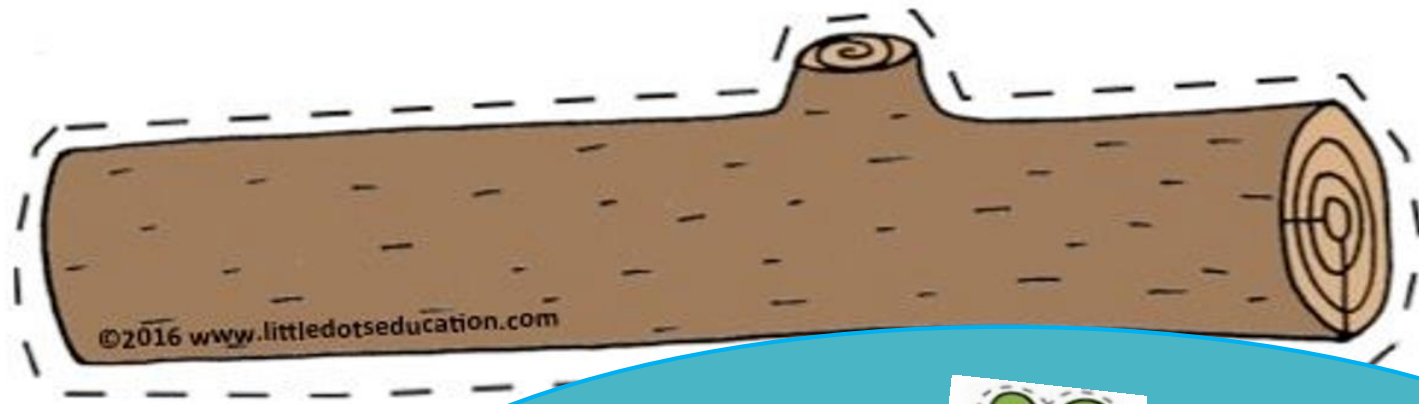
Show with your fingers:
How many are on the log?
How many in the pool?
How many altogether?

Frogs on a log!

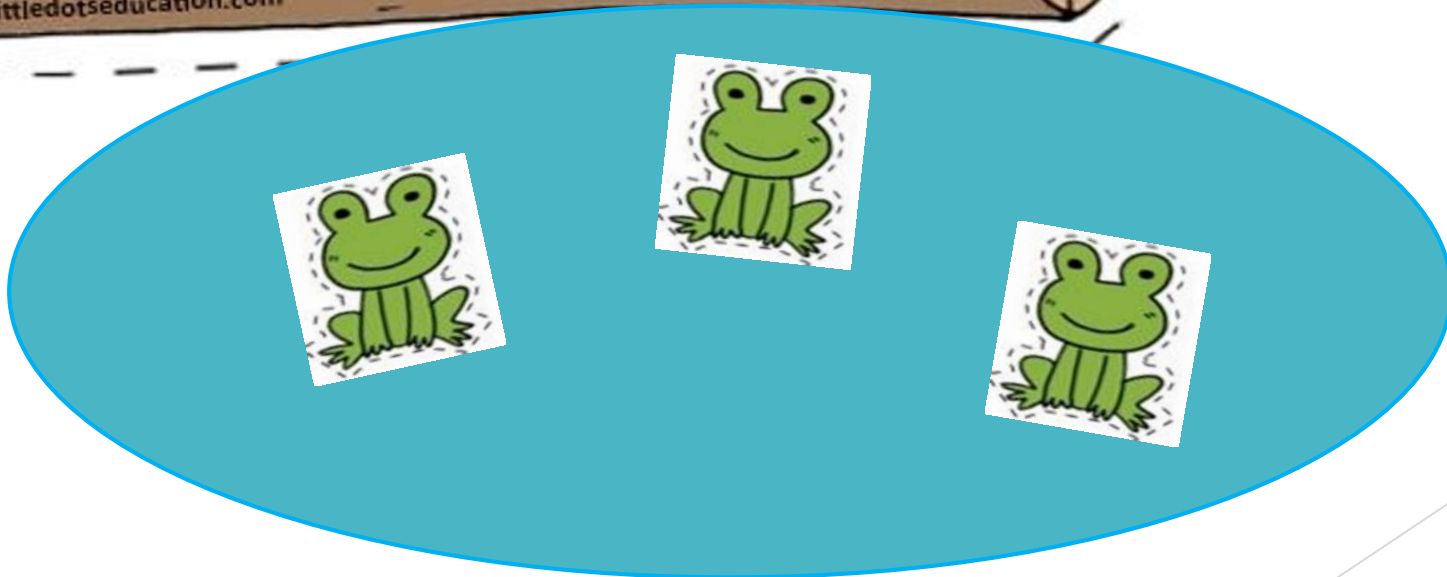


Show with your fingers:
How many are on the log?
How many in the pool?
How many altogether?

Frogs on a log!



Show with your fingers:
How many are on the log?
How many in the pool?
How many altogether?



Counting on...

Snakes and Ladders

FINISH 20	19	18	17	16
11	12	13	14	15
10	9	8	7	6
1 START	2	3	4	5

The board features two snakes and four ladders. Snake 1 (yellow and blue) connects 19 to 11. Snake 2 (pink and purple) connects 14 to 6. Ladder 1 connects 16 to 14. Ladder 2 connects 15 to 12. Ladder 3 connects 12 to 8. Ladder 4 connects 8 to 4.



Counting Backwards...



Why focus on just low numbers...

$$5 + 6 = 5 + 5 + 1 = 11$$

$$40 + 30 = 3 \text{ tens} + 4 \text{ tens} = 7 \text{ tens} = 70$$

$$3 + 3 = 6. \text{ Half of } 6 \text{ is } 3$$

$$8 \div 2 = 4 \quad 8 \text{ sweets divided into groups of } 2 \text{ is } 4$$

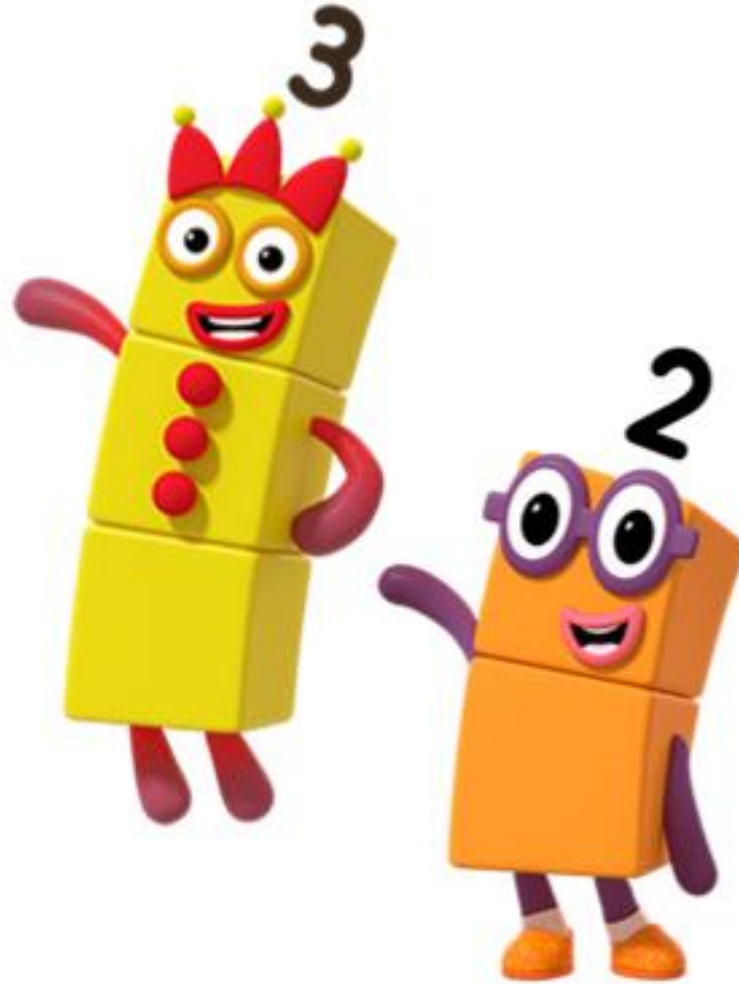
$$4 \times 3 = (3+3) + (3+3) = 12$$

NUMBER FORMATION

0 1 2 3 4 5 6 7 8 9 10

The image shows the numbers 0 through 10 in a light gray font. Each number has small green arrows and red dots indicating the correct stroke order for writing. For example, the number 4 has three arrows and two dots, showing the sequence of strokes. The numbers 9 and 10 are highlighted with a white background, suggesting they are the focus of the current lesson. The background features abstract green geometric shapes on the right side.

Number Blocks!

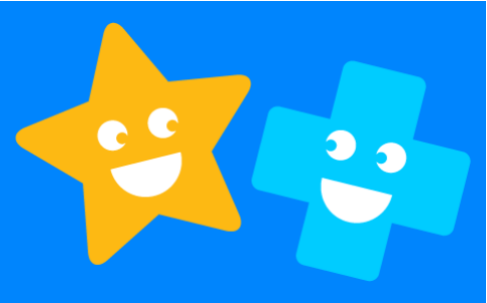


Doodle Maths



doodlemaths

Doodle Maths



Menu → Learning Zone

Oh no! You didn't Doodle yesterday, and your streak was up to 2 days! Do yesterday's work now to keep your streak.

5 a-day new 5 a-day

+

Add Assignment

Diagram illustrating the 'Learning Zone' interface. It features a navigation menu, a central area with icons for '5 a-day', 'new', and '5 a-day', and a notification bubble. A red 'Add Assignment' button is at the bottom right.

Q1

How many more counters will make 5?

Click to make bigger!

7 8 9

4 5 6

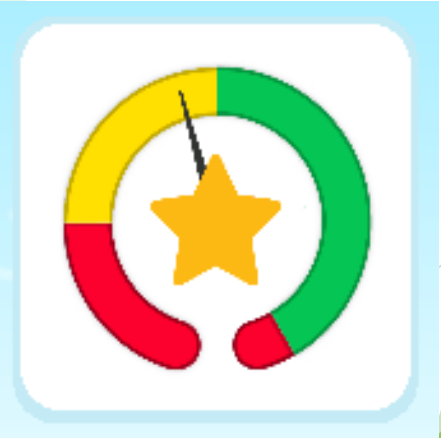
1 2 3

. 0 del

Done

Help

Diagram illustrating a math problem interface. It includes a question 'Q1 How many more counters will make 5?', a numeric keypad, a 'Done' button, and a 'Help' icon. A progress indicator shows four red counters.



THANK YOU