Welcome to Maths in Early Years

and Key Stage 1

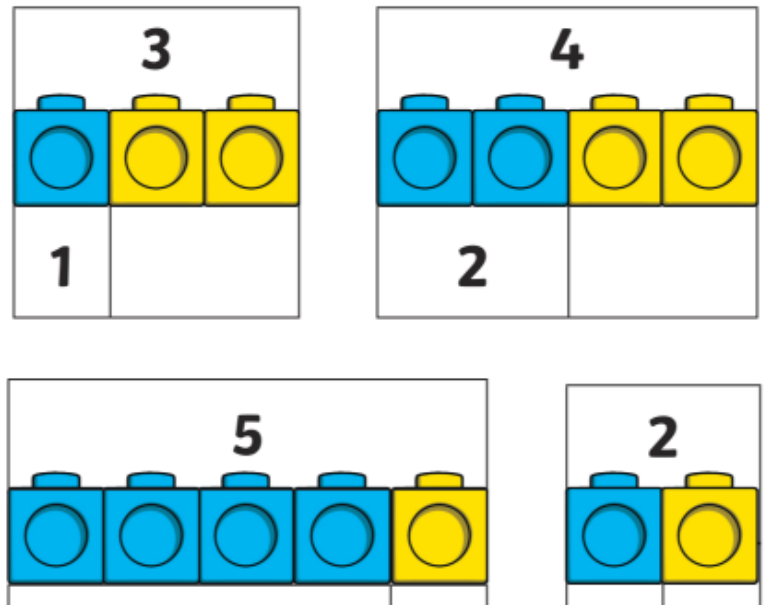
Purpose of this meeting:

- To raise an awareness of how maths is taught here at school
- To give you some ideas of how to support your child in maths

Early Years:

Your child will be -

- Learning to master number - what does this mean?
- mastering number is NOT being able to count up to 100! - understand number and its composition
- being able to subitise - means being able to tell you how many objects there are without counting them.
- Can your child tell you that there are 3 objects even if they are arranged in any pattern?
- In Year R chn start by understanding 1, 2 and learning to subitise to 3
- Composition of 3, 4, 5, etc....
- Gradually building up to 6, 7 and 8 - using language like '6 is made of 5 and a bit'- and that bit is 1 more
- 7 is made of 5 and a bit (2 more)



BBC bitesize great for learning about composition and ideas!

What are numbers made up of?

Counting and *Cardinality*:

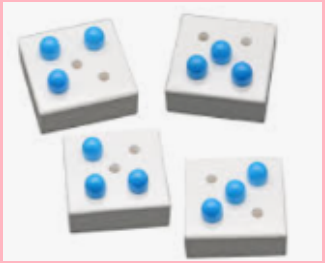
How many things are in the set and the number name

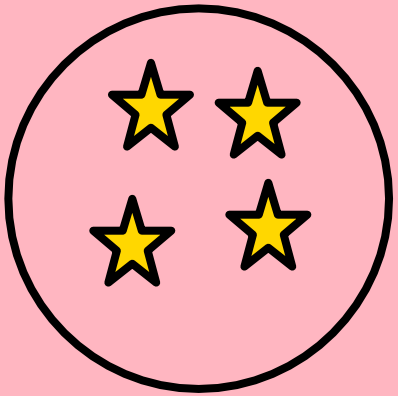
Children who have mastered this, understand that the last number counted is the number of objects in the set

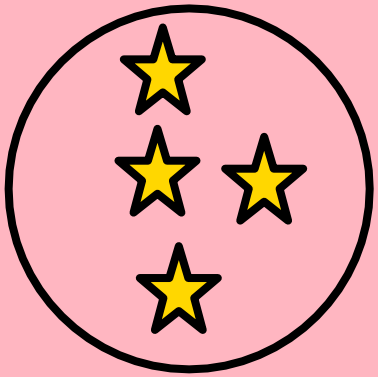
Rote / alphabet song

If a child cannot do this then they have not mastered the skill of cardinality.

Images of subitising







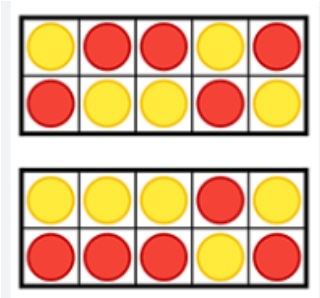
Are there still 4?

Rekenrek - these are used to help children count and see patterns up to 20.

Children can see that 5 and 5 makes 10. Later on children will be able to easily see that 6 is made of '5 and a bit' etc...

One push ....

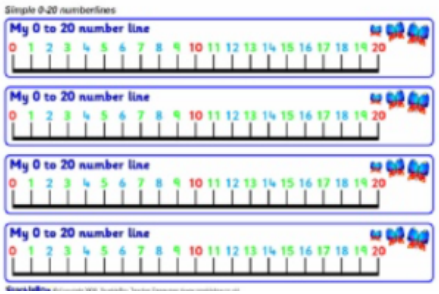
Arithmetic lessons are developing fluency of number in children.



tens frames

double sided counters

multilink



numberlines

https://www.bbc.co.uk/bitesize/articles/zsjbcmn

If we can get this right with our children - we will be giving them the best chance to succeed at school and become deeper thinkers in Maths.

Different kinds of subitising

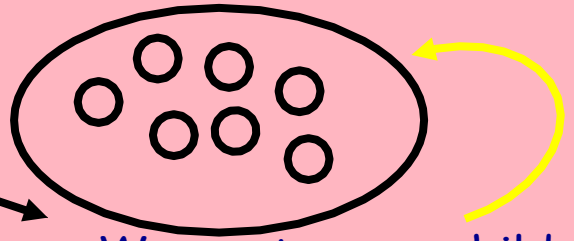
There are two different types of subitising. The first is perceptual. This is where children see an amount instantly. For instance, if you were watching two ducks swimming in a pond you would be able to see there were two just by looking at them.

Once they've grasped peceptual subitising, they can move onto a higher level skill: conceptual subitising. This is where children see larger patterns and can break down the amount into smaller groups using mental maths strategies.

For instance, if there were 6 ducks swimming, you might subitise by splitting the group up into two smaller groups of 3, or even 3 groups of 2. Through subitising, children can take on basic maths concepts such as odd and even numbers and number bonds.

Often children memorise numbers but don't always fully understand the relationship between numbers and amounts. It's a tough concept to grasp but subitising helps them connect the mathematical dots, which will help them in their Early Years learning.

eg:



We want every child to eventually, be able to see a larger pattern and break it down into smaller groups to count

To help your child get comfortable with subitising up to 5, you can start off by using your hands. Sing songs, play games and encourage them to visualise the numbers instead of counting out loud.

How can you help at home?

- **Play games - board games involving dice eg: snakes and ladders; Frustration**
- **Out for a walk? how many swans? bikes? trees? etc**
- **at home: arrange carrot sticks in 3/4/5 ; grapes; anything**
- **Sing nursery rhymes/ counting songs - 10 green bottles, 5 little ducks, 6 in a bed etc**
- **Children need to see everyday objects in their learning - maths can be using anything - not just maths objects!**

Maths in Key Stage 1 - Years 1 and 2

In Year 1 children will learn to:

-recognise and know number bonds to 10 and 20 and see patterns: eg: **3+7=10, 7+3=10, 10-3=7, 10-7=3**

Children are working on knowing all their number bonds to 10 with automaticity.

Maths is fun and we can all do it. It may be challenging to start and we may need to have a few goes; but we want all children to have success and enjoy learning number.

Play number games:

https://www.topmarks.co.uk/

Topmarks

Numberblocks https://www.bbc.co.uk/iplayer/episodes/b08bzfnh/numberblocks

These are 2 very good websites to start with; brilliant ideas and fun games and rhymes

Year 2

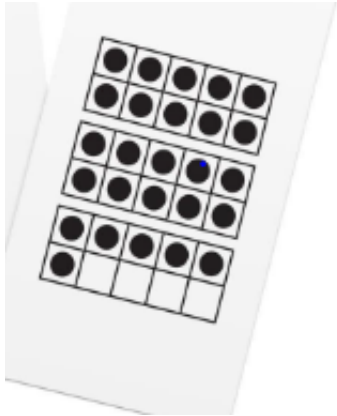
Children will use their knowledge of number bonds to 10 and within 20 to then be able to bridge 10.

8+4 = ?

Children will look at this and reason that if they know that 8 + 2 is 10, so 2 more will be 12

Children should be exploring other ways of counting. Counting in ones is very time consuming - there are quicker and better ways to count.

eg:



How many?

'I can see 2 tens so that's 20 and 6 more.

so that's 26'

- knowing number facts within 20, 50 and 100 3+7=10; 30+70=100; 23+17=40;

- ·knowing relationship between + and - eg: 3+17=20; 20-3=17 **Inverse**

÷

- Knowing relationship between X and

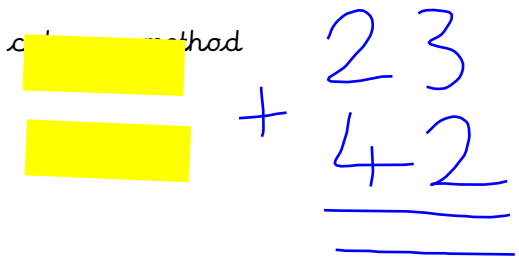
3+2=5; 5-3=2

28 has

8 ones and 2 tens

3+5 =8 so 23+5 =28

4+6=10 and 6+4=10



Once children are fluent in number - Resilience is key!

If children are presented with problems - they give up too easily - they need to try and reason to work it out.

Ron has these digit cards.

1 4 6

He uses two of the cards to make a 2-digit number.

How many even 2-digit numbers can he make?

Annie and Ron each think of a number.

The sum of their numbers is 25
What is Ron's number?

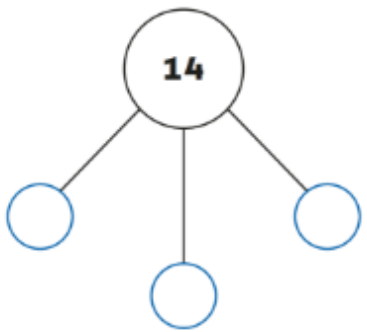
There are 5 marbles in a bag.

Ron has 10 bags of marbles.

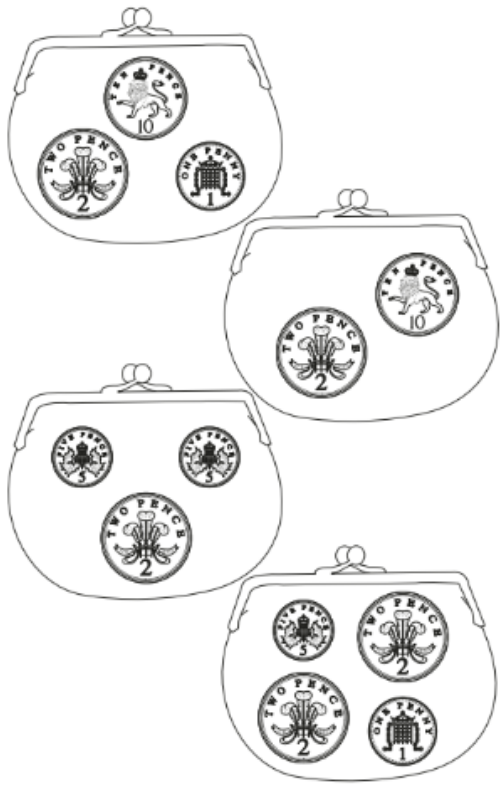
He puts 1 more marble in each bag.

How many marbles are there in total now?

Write a number in each empty circle so that all three numbers total **14**



Tick **two** purses with the **same** amount of money.



Complete the number sentence below.

$5 \times \square = 5$

Ajay had **18** strawberries.

He picked some **more**.

Ajay now has **24** strawberries.

How many **more** strawberries did he pick?

Past SATs questions

https://play.ttrockstars.com/ttrs/dashboard

TTRS Logins and letters