



Helping your child with maths



Year 1

A guide for carers/parents

By the end of Year 1, children should be able to...

Count forwards and backwards initially to 20 and then at least 100 from any given number and count in steps of twos, fives or tens; find one more or less than any number to 10, 20 and then beyond.

Recognise, read and write numbers to 100.

Understand what each digit represents in numbers to 20 initially and then beyond in order to compare numbers up to 100.

Derive and recall all addition and subtract facts for each number to ten and then twenty and know related subtraction facts e.g. $6+4=10$, $4+6=10$, $10-6=4$, $10-4=6$. $9+7=16$, $7+9=16$, $16-9=7$ $16-7=9$

Add or subtract mentally 1 and 2 digit numbers to 20

Know that addition can be done in any order and subtraction cannot. Appreciate that addition and subtraction “undo one another” (inverse)

Use the vocabulary related to addition and subtraction and symbols $+$ and $=$ to record and interpret numbers sentences; calculate the value of an unknown in a number sentence e.g. $7+?=10$. Solve simple multiplication and division problems including doubling and halving practically. Begin to recognise and use symbols for multiplication and division.

Recognise and know value of coins to £1 and begin to use £ and p.

Recognise and name common 2D and 3D shapes and know properties regardless of size or orientation.

Tell the time to the hour or half past the hour and use vocabulary related to time including yesterday, today, tomorrow, morning, afternoon. Recognise and use language of dates including days of the week, months and year.

Compare, measure and record in non-standard and then standard measures; length in metres and centimetres, mass in kilograms and grams, capacity in litres, time in hours, minutes and seconds.

Remember that all children are different and reach their goals at different rates. You can support your child's next step in learning (target) by helping them complete their Milly's Number Challenge.



Ways you can help you child at home

Maths should be part of children's everyday lives.

It should be about exploring the world around them.

Maths is all around us all the time and there are lots of opportunities for real life problem solving at home!

Here are a few ideas to get you started ...

Telling the time

Use a real clock to talk about the times certain events happen at home, for example, getting up in the morning, meal times, when the it is time for school or to go to bed. Use language related to time including yesterday, today, tomorrow, morning, afternoon.



Money

Finding totals and working out change at the shop. Finding different ways to make amounts of money e.g. How many ways can you make 10p
Play 'dicey coins" with a dice and about twenty 10p coins. Take turns to roll dice and take that number of 10p coins. Guess how much money this is and then count aloud to check e.g. saying ten, twenty, thirty, forty. If you do it correctly you keep a 10p coin. First person to collect £1 wins.



Number Hunt

Look for numbers in the environment e.g. door numbers, road signs, bus numbers, sports shirts, number plates, advertising -phone numbers.. Who can find the biggest number Smallest number? A number between 10 and 20. A number greater than ... A number smaller than

As you are walking down the street, look at house numbers. These will probably follow a pattern of either odd or even numbers. Can your child predict what number will be on the next house. Talk about the pattern.



Cupboard maths

Choose two tins or packets from your food cupboard.

Ask your child to hold one in each hand and tell you which is heavier and which is lighter. Check by reading weights on each tin or packet.

If he or she is right, they keep the lighter one. Then choose another item for the cupboard, trying to find one that is lighter still. Carry on until your child has found the lightest item in the cupboard..



Useful Websites

Please find below a selection of websites with maths games that are suitable for Key Stage 1 children. If your child is accessing the internet independently, please ensure that they are using the web safely and securely.

nrich.maths.org is a site is full of problems that start with a basic task that is easy to access but then has lots of opportunities to extend thinking. Your child will need to select 'lower primary' challenges to solve. The star rating tells you how easy the basic task is (one to three stars)



Recommended sites for developing recall of number facts and mental calculation

icgames.com
mathszone.co.uk
www.bbc.co.uk/schools/bitesize/KS1/maths



Some questions to develop mathematical thinking when your children are problem solving ...

Explain why you think it is correct?
Can you prove it?
How could you check?
Which is the tricky bit?
What did you use to help you?
What do you already know that could help you?
Why did you choose to do it that way?
What made you really think today?
Would it work with different numbers?
What would happen if ...?

Talk to your child about how you work things out



Ask your child to explain their thinking.

Family Games

Playing and talking about games will encourage mathematical development and support learning in school. Many family games help develop mathematical thinking including

Card games

Payday

Monopoly

Top Trumps

Battleships

Sudoku problems

Dominoes

Dice games

Bingo

Keeping score in games like skittles

Yahtzee

Uno



Dice games to play at home

Addition

Decide on target e.g. 20

Each person takes it in turn to throw two dice, add the faces together and record the score.

Keep a running total. First to reach target is the winner. They must score exactly so they may choose to use just one die as they get close.

Subtraction

Decide on starting number 20

Each person takes it in turn to throw two dice, add the faces together and subtract the score.

Keep a running total. First to reach 0 is the winner. They must score exactly 0 so they may choose to use just one die as they get close.

Make up your own rules

For example, roll 1 dice and double the score, roll the dice three times and add the scores

Be creative. Children love making up games and changing rules!

*It's great when we learn together.
Have fun with maths!*



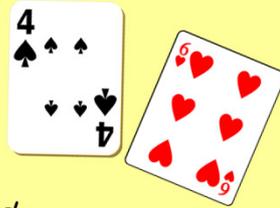
Many traditional card games will encourage mathematical thinking

Pontoon (making 21)

All take two cards. Can you make 21? If not ask dealer for another card. Be careful, if you go over 21 you will go bust. When you have got as close to 21 as you can you 'hold' until the end of the game. When everyone is ready to 'hold' reveal cards to see who was closest to 21.



Number bonds Donkey (Old Maid)



Find pairs of cards that total 10.

Pull pairs out of a regular pack of cards. Remove one of a pair so that there is an odd number of cards. Take turns selecting a card from the other person's hand until all the pairs are made and the loser remains holding the odd card - the donkey/Old Maid!

Stop the Bus

Each player is dealt three cards. Draw a card from the deck or waste pile and then discard one card. Try to get as close to 31 as you can with the same suit. Aces are worth 11 and picture cards are worth 10. When you get as close to 31 as you can 'Stop the Bus' by knocking on the table. The other players have one last turn then all players reveal cards.



Make up your own games ...

Use pack of cards without tens, jack, queen king-

Game 1 play game of pairs where you try to turn over two cards that add up to ten.

Game 2 play a game where each player is dealt four cards and everyone has 1 minute to make up a calculation using cards they have in their hand so answer is value of next card turned over. Use a scoring system such as one point for using two cards, two points for using three cards and three points for using all four cards.