P6 Numeracy activities – Monday 11th – Friday 15th May

Fractions – improper fractions and mixed numbers, adding and subtracting fractions (1 day)

- Before we begin, take a look back through last week's activities, PowerPoints, Education City activities and Classroom Secrets video. Revise how to change an improper fraction into a mixed number and vice versa.

- **To change an improper fraction into a mixed number, divide the numerator by the denominator**

  e.g. $\frac{19}{7}$ 19 ÷ 7 = 2 r 5

  The 2 becomes the whole number and the remainder 5 becomes the numerator of the fraction.

  The denominator does not change so $\frac{19}{7} = 2\frac{5}{7}$ (say two and five sevenths)

  e.g. $\frac{26}{4}$ 26 ÷ 4 = 6 r 2 so $6\frac{2}{4}$

  We could then simplify $\frac{2}{4}$ into $\frac{1}{2}$ so we could also write our answer as $6\frac{1}{2}$

- **To change a mixed number into an improper fraction, multiply the whole number by the denominator and then add the numerator**

  e.g. $8\frac{2}{5}$ 8 X 5 = 40 + 2 = 42

  42 becomes the numerator of my improper fraction and the denominator remains as 5

  so $8\frac{2}{5} = \frac{42}{5}$

  e.g. $3\frac{4}{9}$ 3 X 9 = 27 + 4 = 31 so $3\frac{4}{9} = \frac{31}{9}$

- Now revise adding and subtracting fractions**.**

When we add or subtract fractions with the same denominator, we add or subtract the numerators and the denominators remain the same

e.g. $\frac{3}{7} + \frac{2}{7}$ both denominators are the same (sevenths) so we add the numerators 3 + 2 = 5

so $\frac{3}{7} + \frac{2}{7} = \frac{5}{7}$

e.g. $\frac{8}{9} - \frac{5}{9}$ both denominators are the same (nineths) so we subtract the numerators 8 – 5 = 3

so $\frac{8}{9} - \frac{5}{9} = \frac{3}{9}$ I could then simplify my answer to $\frac{1}{3}$

When we add or subtract fractions with different denominators, we need to use equivalent fractions to find a common denominator

e.g. $\frac{3}{4} + \frac{2}{12}$ We cannot add these fractions because they have different denominators

However, $\frac{3}{4} = \frac{9}{12}$ (multiply both the numerator and the denominator by 3)

so now my question reads $\frac{9}{12} + \frac{2}{12} = \frac{11}{12}$

- When adding or subtracting fractions, if your answer is an improper fraction, change it into a mixed number

  e.g. $\frac{11}{12} + \frac{4}{12} = \frac{15}{12}$ my answer is an improper fraction so 15 ÷ 12 = 1 r 3

  so my answer becomes $1\frac{3}{12}$

  I could then simplify my answer to $1\frac{1}{4}$

- Download the "Fractions addition and subtraction challenge" worksheets (we did pages 1 and 2 last week).
  On page 3, practise adding fractions with the same denominator. Each answer will be an improper fraction so change it into a mixed number. Where possible, try to simplify your answer.
  On page 4, choose one of the challenge sections. The answers are on pages 7 and 8.

<u>Finding the mean (average) (2 days)</u>

Day 1

- Today we are going to think about finding the mean (or average) of a set of numbers.
- Log in to Education City and open the "Finding the mean" city in the Classwork section. Use the "Mean Bakers" learning screen to learn how to find the mean (or average). Then use the "Mean Beans" interactive activity to practise finding the mean and download the "Mean Beans" worksheet. **You are allowed to use a calculator for these activities – inputting information accurately into a calculator and then recording the answer correctly are both important skills in Maths.** The answer page can be downloaded from the school website.

Day 2

- After revising yesterday's work, download the "Mean in Maths" worksheets. Use page 1 to practise finding the mean of a set of numbers. **Again, you can use a calculator.** The answers are on page 2.

<u>Function Machines (1 day)</u>

- Function machines allow us to input a number, change it in some way (by adding, subtracting, multiplying or dividing) and then work out what our answer (output) will be.
- Download the "Introduction to Function Machines PowerPoint" and try to work out what happens to each number when it is put into the function machine. Make sure that you are viewing the PowerPoint as a slideshow!
- Download the "Two Step Function Machines worksheet" and answer the questions on pages 1 and 2. The answers are on page 3.
- CHALLENGE! Design your own function machine, decide what your function machine does (e.g. x 3, - 2) and then choose some input numbers. Send us a photograph of your work and we'll put them on our class pages for everyone else to work out the output numbers!

<u>If you're not doing the AQE practice papers this week</u>, why don't you do some time activities for revision? Log in to Education City and try the activities in the "Time revision" city. You'll also find lots of excellent time activities on www.interactive-resources.co.uk (username: brooklands password: brooklands) Go to View Folders – Teaching Time and try activities such as "Bang on Time" and "Stop the Clock".

Practice paper – Heinemann Paper 6 (1 day) **plus Windmill Series 1 Test2 (weekend paper)**

For those of you who have already emailed Mrs Bell to order more tests, your next set of practice papers will be available to collect from 10.00am on Monday 11th May in the school foyer. Please respect our social distancing measures and do not come into the main school building.

If you haven't yet ordered the next set of practice papers (which will take you through to the end of May) but would like a set for your child, please email Mrs Bell as soon as possible abell356@c2kni.net with your child's full name and class and we will arrange a time for you to collect these tests.

This week, you have two tests to complete. Try to complete the Heinemann Paper 6 on your own as a test. Find a quiet place away from all distractions and do your best to get through as many of the pages as you can within 45 minutes. Do your working-out in the spaces at the sides of the page.

If you don't get it all finished, don't worry! You will find that you will get faster over the coming weeks as you get used to doing these tests. You can try the remaining questions later. If you get stuck on a particular question, have a guess, put a circle around the question number and move on. You can always go back to the questions which you have circled at the end of the test if you have any time left.

It is very important to use any extra time to go back and check your work. It is very unusual for anyone to get every question right so look for any mistakes

e.g. if the question says "Tick the correct boxes", have you ticked more than one answer?

If your answer is in cm e.g. 25cm X 5 = 125cm, you might need to write your answer in metres so 1.25m

Once you have completed the test, download the answers and go through the test with an adult to mark your work. Take about an hour to go through the test together. The answers also show how you might set out your working-out. If there are any words which you don't understand, look them up in your dictionary.

Don't expect to get a wonderful score! These tests are supposed to be challenging and there will be some questions which you will find difficult. If there are particular questions which you are getting stuck on, it can be really useful to ask an adult to make up some extra questions - the more you practise, the better you'll get!

Good luck! And remember, at this stage, **scores don't matter**. We are simply getting used to doing these tests.

For those of you who are planning to enter the AQE tests, you now need to be doing two tests per week. Over the weekend, have a go at Windmill Series 1 Test 2. You might decide to work through it on your own and then mark it or you could sit with an adult and look through the questions together as you do your working-out. The answers can be downloaded from the school website.