Oak Class – Day One Remote Learning

All timings are a rough guide

Timing	Task
8:50 – 9:00	Get all your resources ready. You will need paper, a pencil, a rubber, a ruler and somewhere quiet to work. Start your day by practicing your timetables. Time yourself to see how quickly you can complete them.
9:00 – 10:00 Maths	Complete the challenge cards on pages 2 of this document.
10:00 – 10:30 Reading	Read 2 chapters of your reading book and answer the following questions. 1. Describe the main character. 2. List three events that happened in the story. 3. What does the main character feel about the events of the story? How do you know this? Use evidence to support your answer. 4. If you were the main character, what would you do in the story? 5. What will happen next? 6. Is this book similar to any others you have read? Why?
10:30 – 11:00	Take a break, stretch your legs
11:00 – 12:00 English	Imagine a tiny fairy door has appeared in your back garden. What does it look like? Write a short story about finding the door, describing what it looks like and what you see when you open the door. Where does it lead? What do you see? Does anyone greet you?  Remember to use your year 6 targets when writing!
12:00 – 1:00	Lunch Time
1:00 – 3:00 Science - Materials	Complete the activities on page 3 and 4 of this documents

Cafe Challenge

Here is the price list at a cafe:

1 bun and 1 cup of tea = 2 pounds and 50 pence.

2 buns and 2 cups of coffee = 7 pounds.

1 cup of coffee and 2 cups of tea = 4 pounds.

How much do you have to pay in total for 1 bun, 1 coffee and 1 tea?

What does each item cost by itself?

Car Sale Challenge

John bought a car for 200 pounds.

He then sold it for 300 pounds.

He bought it back for 400 pounds.

He sold it again for 500 pounds.

Did John make a profit or loss when he finally sold his car?

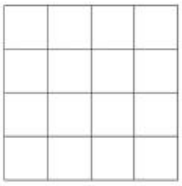
How much did he make or lose?

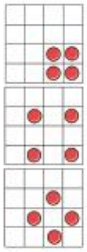
Counter Square Challenge

On each of these grids, the counters are at the four corners of a square.

What is the greatest number of counters you can put on a grid without making a square?

Here is an example:

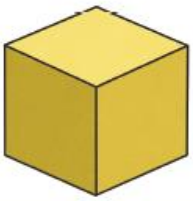




Cube Challenge

You have a cube and a box which is just the right size to hold the cube.

In how many different ways can you fit the cube into the box?



Eggs Challenge

This baker spends 10 pounds on 100 eggs for her bakery.

Small eggs cost her 5p each.

Medium eggs cost her 10p each.

Large eggs cost her 50p each.

She bought the same number of eggs for two of the sizes. How many of each size did she buy?

Estimating Challenge

Estimate how many sweets there are in this jar.

Five Number Challenge

Take 10 cards numbered 0 to 9.

Use all ten cards each time.

Sort the cards to make:

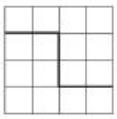
1. five numbers that are multiples of 7
2. five prime numbers
3. five numbers that are multiples of 3

Create more problems to use all ten cards that make five numbers.

Grid Challenge

This grid is divided into two identical parts. Each part is exactly the same.

On some squared paper, draw a 4 by 4 grid.



Find five different ways of dividing the grid into two identical parts by drawing along the lines of the grid.

Rotations and reflections do not count!

Have a go at finding more ways of dividing the grid into two parts with equal areas but different shapes.

MATERIALS – FOOD PACKAGING

Supermarkets use a variety of different packaging for different food items. Draw four different packages. What material is each made from, and why is that material used?

IMPROVING FOOD PACKAGING

There is pressure on supermarkets to reduce the amount of plastic packaging that they use. People are now reusing plastic bags or have swapped to fabric shopping bags. So how could we change other packaging so that it is more environmentally friendly?

DESIGN BRIEF:

Design a new style of packaging for a food product found in a supermarket. Think about how you can make your packaging as environmentally friendly as possible.

What food item will you design new packaging for?

What materials are currently being used for the packaging?

Why is this packaging not environmentally friendly (think about how easy it is for the materials to be recycled)?

MY DESIGN

Draw your packaging below.
Add labels to show what materials you will use.

WHY MY PACKAGING SHOULD BE USED

Explain how it will protect and preserve the food and how it is more environmentally friendly.

Investigation 1 – dissolving

You will need kitchen ingredients, such as flour, salt, sugar, baking powder rice, pasta or bread.

What does it mean to dissolve something?
Which materials will dissolve in water?
Place a teaspoon of different solids into a beaker of water and stir. Which materials dissolve in water? Materials that dissolve are called soluble materials and when they dissolve in water, they form a solution.

How can you make soluble materials dissolve quicker? Investigate whether stirring or heating the water can improve how quickly a material dissolves.

Investigation 2 – magnetic materials

You will need a magnet for this investigation.

Collect a variety of different materials from around your home. Which are magnetic?

Sort the materials to show which are magnetic and which are non-magnetic.