Birchfield PRIMARY SCHOOL

Year 4 Curriculum Overview Term 2.2

Teaching Team:
Miss Fisher, Miss Beck, Mr Barnes, Mrs Khatri

SLT:
Mr Mazhar

PE Days: Thursday

Homework: Tuesday & Friday

Enquiry Question	How can we change materials?
Significant People	- Professor Joe Finley – inventor of Micro:Bit Lancaster University
Class Texts	King of the Cloud Forests 'Escaping from China as the Japanese invade, Ashely and Uncle Sung embark on a perilous journey across the Himalayas. Then Ashley finds himself alone in the hostile mountains, battling for his life. He is just about to give up all hope, when he has a mysterious and terrifying encounter.'
Reading	During this half term, the children will recap their learning on retrieval and learn how to skim and scan the text. They will then be learning how to identify and explain how meaning is enhanced through a choice of words and phrases. The children will continue to read out loud to the teacher during weekly word reading sessions.
Writing	The children will begin this half term writing explanation texts. The children will be learning to write formally, in an explanatory manner using paragraphs, subheadings and diagrams/captions. They will identify the features of an explanation text and write their own explanation text using the features. During the middle of this half term, the children will move onto writing recounts. They will look at the features of recounts including chronological order, present tense and formal language. The children will use these features when writing their own recounts

Maths	This half term, we will continue focusing on multiplying and dividing number by a 1-digit number, we will then be moving onto fractions, learning how to count beyond 1. The children will be learning about what a fraction is, unit and non-unit fractions. They will also be learning about equivalent fractions and fractions that are greater than 1. The children will add 2 fractions and 2 or more fractions together, as well as this, they will subtract fractions and subtract fractions from whole amounts and fractions of a set of objects.
History	This half term, our focus will be on Vikings. Pupils will be extending their chronological understanding of significant events. We will be looking at when, where and why the Vikings settled in Britain. From this, pupils will be able to identify key changes and impact on Britain.

Science	Our science focus will be 'States of Matter.' In this project, your child will identify and classify solids, liquids and gases. They will learn the properties of solids, liquids and gases and discover that some materials have properties of more than one state. Your child will learn that particles make up all matter and how their arrangement determines whether the material is a solid, liquid or gas. They will find that materials can change from one state to another and learn about how this change can happen. The children will complete experiments into changing state and will record their results in tables and graphs.
DT	This half term, the children will be creating a night light. They will be exploring electrical systems and writing algorithms. The children will be using micro-bits and will debug their algorithms if necessary.
Music	During their music lessons, the children will continue to learn on Charanga. The unit will be 'Stop!' a song/rap about bullying. This is a five-week Unit of Work that builds on previous learning. All the learning is focused around a rap/song about bullying. Children will learn about the interrelated dimensions of music through games, singing and composing.

Computing	This half term, your child will begin to develop their understanding of how digital images can be changed and edited, and how they can then be resaved and reused. They will consider the impact that editing images can have and evaluate the effectiveness of their choices.
PSHE	This half term we shall complete the 'how can we help in an accident or emergency' strand of PSHE. Our lessons shall include: - How to carry out basic first aid. - How do we support someone with a head injury. - What should we do when someone is having an asthma attack or bleeding? - Seeking adult help. - Contacting the emergency services.
RE	This half term, the children will be learning how to be merciful and forgiving. Our lessons will include: - The Joseph story in Genesis 35:23 – 29 and exploring what it has to say about forgiveness. - What do Christianity and Judaism say/think about forgiveness? - What do Christians believe about forgiveness because of Jesus' death on the cross? During the second half of the half term, the children will be covering: responding to suffering. Our lessons will include: - What kind of things hurt people? - How do Muslims respond to the suffering of others? - The Easter Story
PE	During this half term the children will be swimming. We will continue to consolidate our learning on dodgeball.

Please see below an overview of the main themes, knowledge and skills we will be covering this half term.

Knowledge Organiser – Stop! – Year 4, Unit 3

charanga MUSICAL SCHOOL

1 – Listen & Appraise: Stop! (Grime)

Structure: Intro and 6 rapped verses, each with a sung chorus.

Instruments/voices you can hear: Digital/electronic sounds, turntables, synthesisers, drums.

Can you find the pulse as you are listening? Dance, clap, sway, march, be an animal or a pop star.

2 – Musical Activities using glocks and/or recorders

Warm-up games play and copy back using up to 2 notes – C + D.
Bronze: no notes | Silver: C, sometimes D | Gold: C + D challenge.
Which challenge did you get to?

Singing and rapping in unison and in parts.

Compose your own rapped lyrics about bullying or another topic or theme that you decide.

3 — Perform & Share

Decide how your class will introduce the performance. Perhaps add some choreography? Tell your audience how you learnt this song and why. Record the performance and talk about it afterwards.

The performance will include one or more of the following:
Improvisations • Compositions • Rapped lyrics that you composed

About this Unit

Theme: Grime and other styles of music.

Facts/info: Stop! is a song/rap written in a Grime style for you to compose your own lyrics.

Listen to 5 pieces of music in different styles:

- Gotta Be Me performed by Secret Agent 23 Skidoo (Hip Hop)
- Radetzky March by Strauss (Classical)
- Can't Stop The Feeling! by Justin Timberlake (Pop with Soul, Funk and Disco influence)
- Libertango by Astor Piazzolla (Tango)
- Mas Que Nada performed by Sergio Mendes and the Black Eyed Peas (Bossa Nova and Hip Hop)

Vocabulary: Musical style, rapping, lyrics, choreography, digital/electronic sounds, turntables, synthesisers, drums, unison, pulse, rhythm, pitch, tempo, dynamics, texture structure, compose, improvise, hook, riff, melody, solo

Reflection

What did you like best about this Unit? Why? Was there anything you didn't enjoy about it? Why?

Did you have any strong feelings about it? Were you proud of yourself, happy or annoyed?

Plot

The Anderson family have moved to China to help with the sick in a small town called Ping Ting Chow.
Not long after, the country is invaded by Japan, and it is not safe to stay. Ashley, with the help of a family friend, flees to India, but they must cross the Himalayas.
Sadly, Ashley and Uncle Sung are separated, but Ashley is looked after by some creatures. Will they ever find each other again and make it to India?

Themes

- Love
- Loyalty
- Friendship
- Death
- Reunion

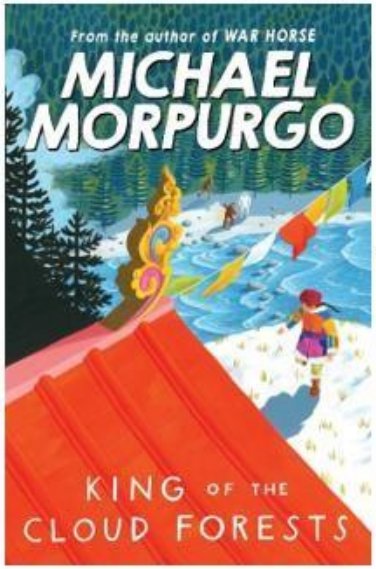
Characters

Ashely Anderson – a young boy who lives with his father in China.

Ashley's Father – a missionary helping the sick in a town called Ping Ting Chow in China.

Uncle Sung – a family friend from Tibet who helps Ashely escape China as the Japanese have invaded.

The Yetis – a community of strange creatures that befriend and help Ashley.



Key Quotes

'I see a ruler stand before me. I tell you, this boy of yours will be king and soon.'

'The creature was crouched by the fire and when he rose, his bulk filled the room. He was like a giant man but not yet a man, for he was covered in a coat of long, red hair.'

Name of book: King of the Cloud Forests

Date Published: 1987

Author: Michael Morpurgo

Genre: Adventure

Perilous	Full of danger or risk
Missionary	A place where Christians help whilst promoting the teachings of the Lord.
Bewilderment	A feeling of being confused.
Philling	The Tibetan name for foreigners
Hostility	Unfriendly behaviour towards others
Adamant	Refusing to be persuaded
Baulking	Unwilling to an accept an idea
Beseeching	Begging someone to do something
Denouement	The final part of something.
Mesmerized	Transfixed, caught their complete attention

Division Knowledge Organiser

Maths

mathematical symbols

÷	divide, shared into groups of	=	is equal to

dividing by 10

When you divide by 10, the number becomes 10 times smaller.

253 ÷ 10 = 25.3

We move the digit one place to the right.
2 hundreds ÷ 10 = 2 tens (20)

H	T	O	t
2	5	3	
	2	5	3

The 5 tens become 5 ones and we move the 3 ones into the tenths column (after the decimal point).

dividing by 100 and 1000

7500 ÷ 100 = 75

When dividing by 100, digits move two places to the right.

Th	H	T	O
7	5	0	0
		7	5

2100 ÷ 1000 = 2.1

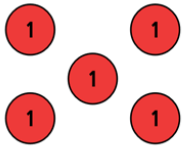
When dividing by 1000, digits move three places to the right.

Th	H	T	O	.	t
2	1	0	0	.	
			2	.	1

dividing by 1

When you divide by 1, the answer remains the same.

5 ÷ 1 = 5
5 divided by 1 = 5



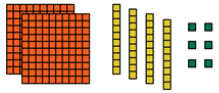
halving

Halving is the same as dividing by 2.

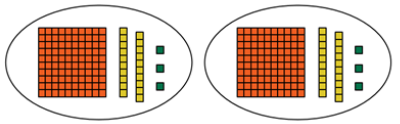
halve 246

246 ÷ 2

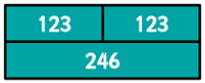
use apparatus



divide into 2 equal groups



bar model

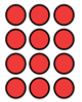


partition it

halve 246 = 123
halve 200 = 100
halve 40 = 20
halve 6 = 3

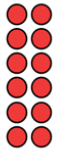
factors

Factors are the numbers multiplied together to get a given number.

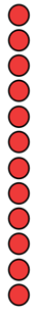


Factors of 12

3 x 4 = 12
2 x 6 = 12
1 x 12 = 12



1, 2, 3, 4, 6 and 12 are all factors of 12.



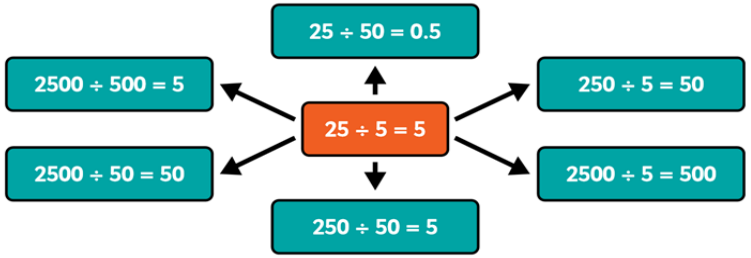
Factors also tell us which numbers that can be divided exactly into a given number.

12 ÷ 4 = 3
12 ÷ 3 = 4
12 ÷ 6 = 2
12 ÷ 2 = 6
12 ÷ 1 = 12
12 ÷ 12 = 1

mental methods

Can I work it out in my head, with apparatus or with jottings?

related facts



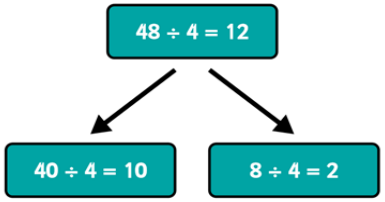
partition it

48 ÷ 4 = 12

40 ÷ 4 = 10

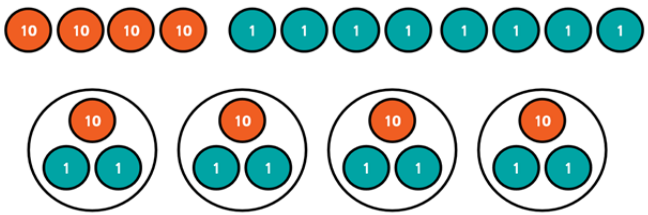
8 ÷ 4 = 2

part-whole model



use apparatus

48 ÷ 4 = 12



use your times tables knowledge

How many nines are in 81?

81 ÷ 9 = 9

1 x 9 = 9
2 x 9 = 18
3 x 9 = 27
4 x 9 = 36
5 x 9 = 45
6 x 9 = 54
7 x 9 = 63
8 x 9 = 72
9 x 9 = 81
10 x 9 = 90
11 x 9 = 99
12 x 9 = 108

How many sixes are in 48?

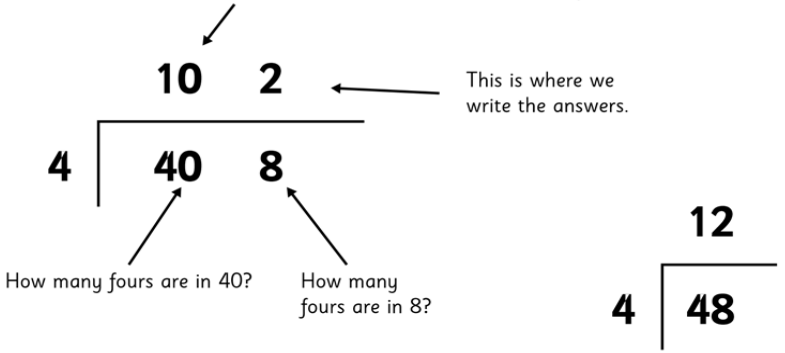
48 ÷ 6 = 8

1 x 6 = 6
2 x 6 = 12
3 x 6 = 18
4 x 6 = 24
5 x 6 = 30
6 x 6 = 36
7 x 6 = 42
8 x 6 = 48
9 x 8 = 54
10 x 6 = 60
11 x 6 = 66
12 x 6 = 72

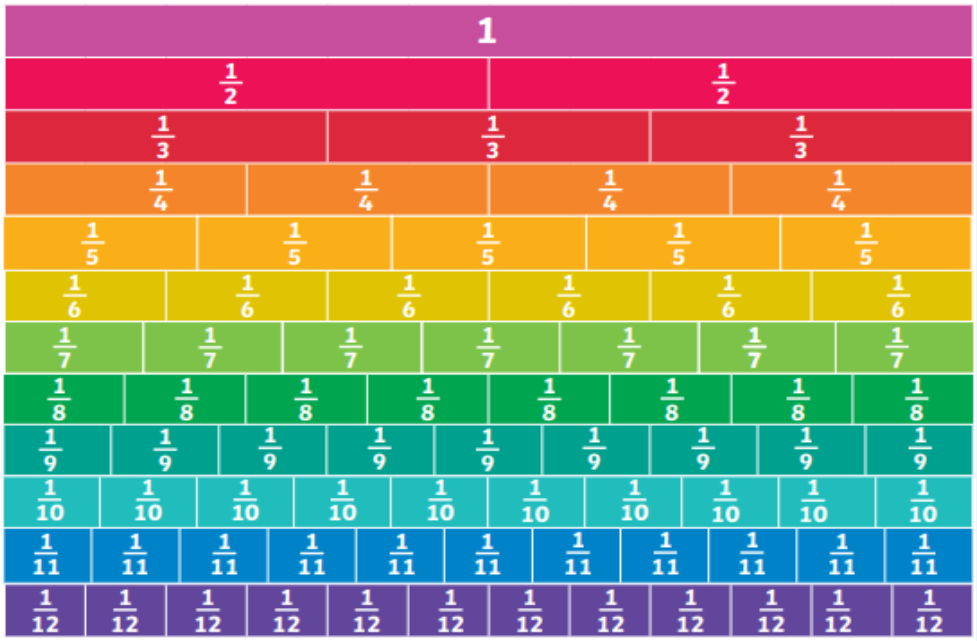
written methods

Do I need to use a formal written method?

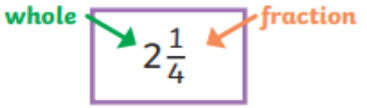
With this written method we start at the left column.

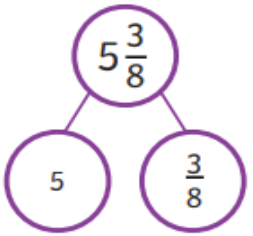


- numerator
- denominator
- unit fraction
- non-unit fraction
- equivalent
- quantities
- whole
- halves
- thirds
- quarters
- fifths
- sixths
- sevenths
- eighths
- ninths
- tenths
- elevenths
- twelfths
- mixed number
- improper fraction

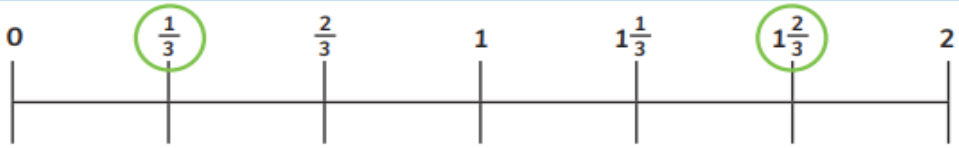


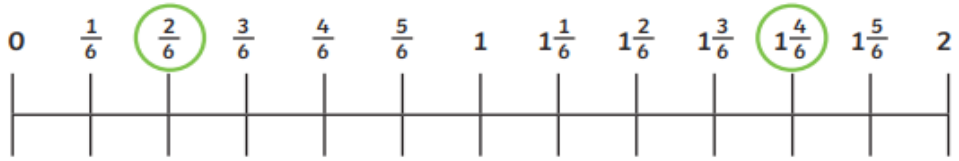
Mixed numbers contain a whole number and a fraction.





Equivalent Fractions

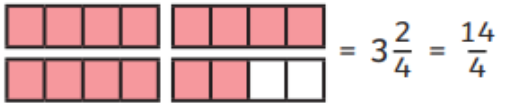




Improper Fractions

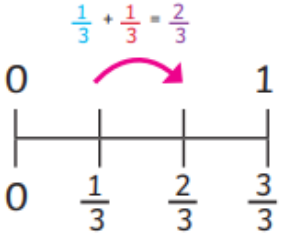
An improper fraction has a numerator which is greater than or equal to the denominator.

$\frac{5}{3}$

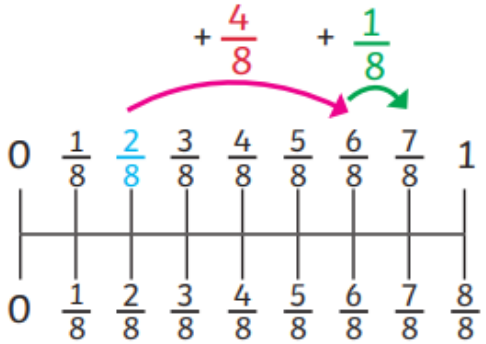


led when the denominators are the same.

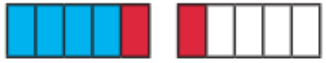
$\frac{1}{3} + \frac{1}{3} = \frac{2}{3}$

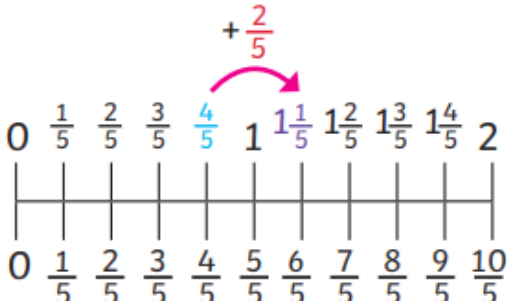


$\frac{2}{8} + \frac{4}{8} + \frac{1}{8} = \frac{7}{8}$



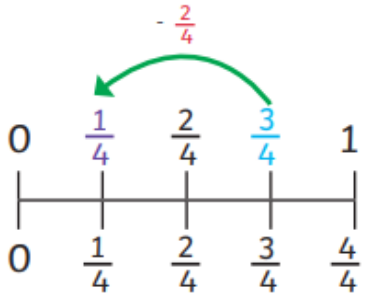
$\frac{4}{5} + \frac{2}{5} = \frac{6}{5}$ or $1\frac{1}{5}$



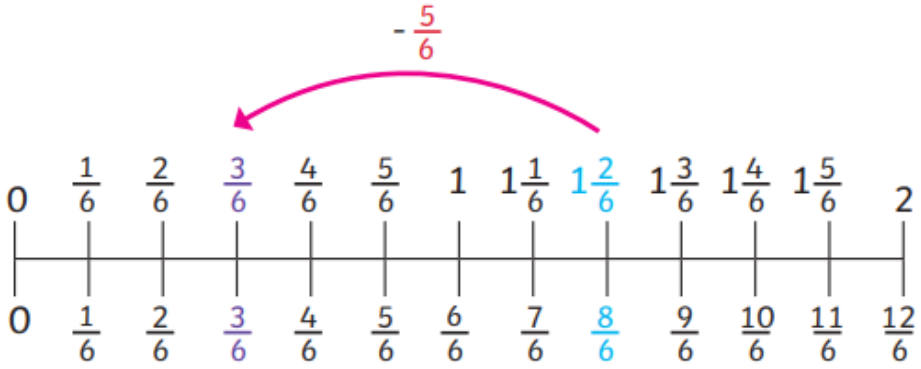


Fractions can be subtracted when the denominators are the same.

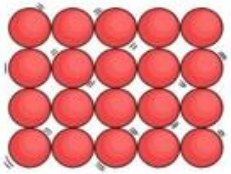
$\frac{3}{4} - \frac{2}{4} = \frac{1}{4}$



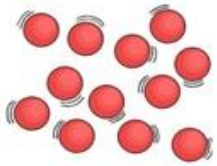
$1\frac{2}{6} - \frac{5}{6} = \frac{3}{6}$



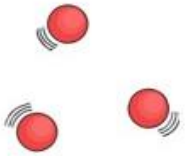
Subject Specific Vocabulary	
States of Matter	Materials can be one of three states: solids, liquids or gases.
Solids	These are materials that keep their shape unless a force is applied to them. They can be hard, soft or even squashy. Solids take up the same amount of space no matter what has happened to them.
Liquids	Liquids take the shape of their container. They can change shape but do not change the amount of space they take up. They can flow or be poured.
Gases	Gases can spread out to completely fill the container or room they are in. They do not have any fixed shape but they do have a mass.
Particles	Particles are tiny bits of matter that make up everything in the universe. They are that tiny, we cannot see them.
Reversible	Able to be reversed so that the previous state is restored.
Irreversible	Not able to be undone or changed back to its original state.
Melt	This is when a solid changes to a liquid.
Freeze	Liquid turns into a solid during the freezing process.
Evaporate	Turn a liquid into a gas.
Condense	Turn a gas into a liquid.



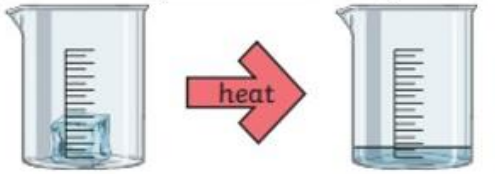
<u>Solid Particles</u>
Particles in a solid are close together and cannot move. They can only vibrate.



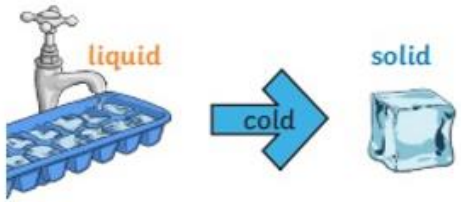
<u>Liquid Particles</u>
Particles in a liquid are slightly more spread out and can move around in small spaces.



<u>Gas Particles</u>
Particles in a gas are spread out and can move around very quickly in all directions.



If a solid is heated to its melting point, it melts and changes to a liquid. This is because the particles start to move faster and faster until they are able to move over and around each other.



When freezing occurs, the particles in the liquid begin to slow down as they get colder and colder. They can then only move gently on the spot, giving them a solid structure.

Evaporation occurs when water turns into water vapour. This happens very quickly when the water is hot, like in a kettle, but it can also happen slowly, like a puddle evaporating in the warm air.

Condensation is when water vapour is when water vapour is cooled down and turns into water. You can see this when droplets of water form on a window. The water vapour in the air then cools when it touches a cool surface.

Home Learning and Useful Links:

Homework

Your child's homework will be on Atom Learning. Please make sure they are logging on to complete this. They will have 3 pieces to complete – reading, SPAG and maths.

https://app.atomlearning.com/school/

Spellings

These are words your child will be using daily and will need to be familiar with. We will also be sending home words with your children that are key in Year 3 and 4. Please encourage your child to practise their spellings at the weekend and across the course of the week, as they will be tested on these at the end of each week.

Times tables

Each week, your child will receive a sheet of times tables to help prepare them for the Y4 Multiplication Check.

Please encourage your child to practise these times tables ready for a small test every Monday.

Your child should be to completing at least 5 minutes of times table practice daily.

Please use the website below

Times Table Multiplication Check Website:

https://www.timestables.co.uk/multiplication-tables-check/

Reading:

At the end of each week, your child will also come home with a reading book.

Please encourage your child to read this book regularly and listen to them read when you can.

Within their reading diary, we ask that you please make a comment on how your child has read, whether they are enjoying their book or even any questions you may have asked them and discussed about their story.

Both the reading book and reading diary need to be returned to school by Wednesday.

Reading:

Oxford Owl for School and Home

Reading and comprehension - English - Learning with BBC Bitesize - BBC Bitesize Books for Year 4 children aged 8-9 | School Reading List

Phonics:

Letters and Sounds, English Games for 5-7 Years - Topmarks

PhonicsPlay

Phase 2 Games – Letters and Sounds (letters-and-sounds.com)

Writing:

Year 4 English - BBC Bitesize

Writing in Year 4 (age 8–9) - Oxford Owl for Home

Spelling and Grammar, English Games for 7-11 Years - Topmarks

Maths:

Year 4 Maths Curriculum Toolkit | 8 & 9 Year Olds | Home Learning (thirdspacelearning.com)

Key Stage 2 Maths - Topmarks Search https://www.timestables.co.uk/multiplication-tables-check/

Science:

What are the states of matter? - BBC Bitesize

Home | WowScience - Science games and activities for kids

History:

Vikings - KS2 History - BBC Bitesize

Computing:

Is my child safe online? Parent's questions answered | Barnardo's (barnardos.org.uk)

Parents and Carers - UK Safer Internet Centre

Parental Controls & Privacy Settings Guides | Internet Matters

PSHE:

Talk PANTS & Join Pantosaurus - The Underwear Rule | NSPCC

How to make an emergency 999 call – West Midlands Ambulance Service University NHS Foundation Trust (wmas.nhs.uk)

PE:

Nutrition Based Physical Activity Games - Action for Healthy Kids

Kids Active Learning & PE at Home – Think Active