

Knowledge Organisers

1st Autumn Term

Science

History

Geography

Art

PSHE

French

Computing

R.E.

Music

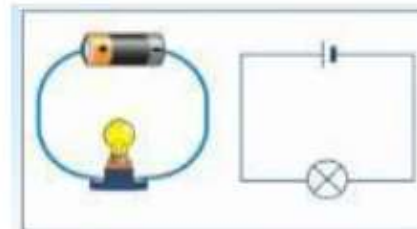
P.E.

Class 3 – year 4

Knowledge Organiser - Science – Year 4 – Electricity

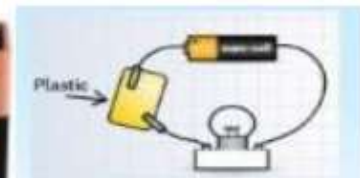
Key Vocabulary:	
electricity	energy made available by the flow of electric charge through a conductor
conductor	a substance that allows heat or electricity to pass through or along
insulator	a substance that does not allow heat or electricity to pass through or along
component	a part that can be separated from or attached to a system
circuit	an electrical device that provides a path for electrical current to flow
current	a flow of electricity through a wire or circuit
static electricity	static electricity is the build up of an electrical charge on the surface of an object. It's called "static" because the charges remain in one area rather than moving or "flowing" to another area like an electrical current.
electron	an elementary particle with negative charge
appliance	a device or machine often in your home that you use to do a job such as cleaning or cooking - appliances are often electrical
negative charge	having a surplus of electrons; having a lower electric potential
positive charge	having a deficiency of electrons; having a higher electric potential
electromagnet	a magnet which attracts metals only when electrically activated
atom	the smallest, indivisible constituent part or unit of something.

Key Knowledge:
I know the main uses of electricity.
I know the components and symbols of a basic electrical circuit.
I understand the difference between a current and static electricity.
I understand the importance of conductors and insulators.
I know what an electromagnet is.



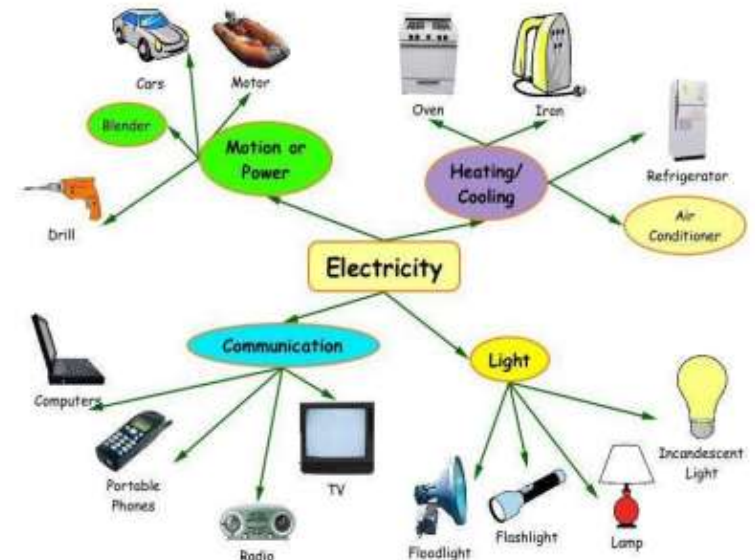
Electrical circuits can be represented as circuit diagrams.

A battery is the power source in a circuit. It has two terminals.



Plastic does not conduct electricity. We use plastic as an electrical insulator. Can you think of other materials that are electrical insulators.

Uses Of Electricity In Our Daily Life



Knowledge Organiser - Spatial Sense - Geography - Year 4

Key Vocabulary	Definition
Lines of Latitude	Imaginary lines that help us identify how far north or south of the equator a location is.
Lines of Longitude	Imaginary lines that help us identify how far east or west of the Prime Meridian a location is.
Equator	An imaginary line that shows us the locations that are half way between the north and south pole. The Equator divides the earth into the Northern Hemisphere and the Southern Hemisphere.
Prime Meridian	The line of longitude that measures 0° and runs through Greenwich in London.
Tropic of Cancer	The most northern line of latitude where the sun can be directly overhead. Named after the constellation of Cancer.
Tropic of Capricorn	The most southern line of latitude where the sun can be directly overhead. Named after the constellation of Capricorn.
Scale	The representation of distance on a map.

a) (1 centimeter represents 250 meters)

b) 1: 25 000

c) 0 1000 2000 3000 4000 meters

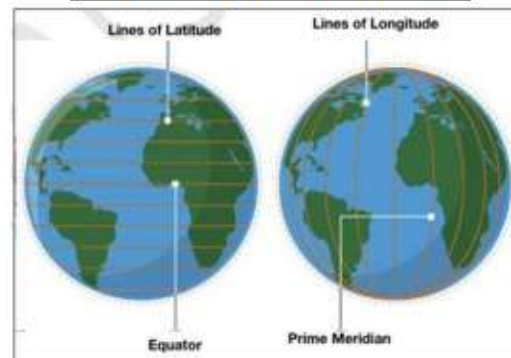
1 centimeter = 1 kilometer (1:100,000)

0 1 2 3 4 5 6 7

Scale 1:10,000

metres 100 200 300 400 500
mm 10 20 30 40 50

Lines of Longitude and Latitude



Key Knowledge

I know the difference between latitude and longitude

I understand that a scale allows me to measure between two points on a map

I can use eastings and northings to find places on a map

I know that I can find key places using a map in my area

I understand that changes to the local area have happened over time and that I can see these on a map

Tropics of Cancer and Capricorn



Knowledge Organiser- Space - Visual Arts - Year 4

Key Vocabulary	Definition
space	The distance within, around and between things in art.
dimension	A measurement.
height	The measurement of something from top to bottom. This is one of the dimensions.
width	The measurement of something from side to side. This is one of the dimensions.
depth	The measurement of something from front to back. This is one of the dimensions.
3d	Something 3d (3 dimensional) has height, width <i>and</i> depth – the three dimensions. You can touch it all the way around.
2d	Something 2d (2 dimensional) has only height and width – 2 dimensions. It is flat. In a drawing the object that is drawn has only height and width.
foreground	The part of a view that is closest to us in a picture.
background	The part of a view that is furthest away from us in a picture.
middle ground	Between the foreground and the background.
detail	A small part in a work of art which is clearly shown e.g. a blade of grass.

Key Knowledge

I understand that artists can create the illusion of three dimensions.

I understand that an artist uses foreground, middle ground and background to create depth

I can find foreground, middle ground and background in paintings that I look at.

I can create an image that has foreground, middle ground and background.

Paintings

The Gleaners – Millet (1857)



The Peasant Wedding – Bruegel the Elder



Knowledge Organiser - Anglo Saxons, Scots and Vikings - History- Year 4

Key Vocabulary:	
Anglo-Saxon	A mix of people from Germany, Denmark and the Netherlands who came to live in England during the 5th Century. The three biggest tribes were the Angles, the Saxons and the Jutes
Viking	People of Scandinavian origin who travelled by sea and raided, invaded and settled in Europe from the 8th century
Kingdom	A country or place ruled by a King or Queen
Scots	People who lived in Scotland (previously thought to have migrated from Ireland)
Picts	Early settlers in Scotland who fought with the Romans
Settlement	A place where people live, and sometimes work
Raid	An unexpected attack where an enemy comes to steal and/or destroy
Invasion	To enter a country or place by force with the intent of taking over
Pagan	A word used to describe people who believe in many Gods and Goddesses
Trade	Exchange of goods
Oath	A serious promise
Heir	Someone who inherits a title, land or a position after someone else has died

Key Knowledge:
To know that the Anglo Saxons arrived after the Romans and the Picts and the Scots were early settlers in Scotland.
To know what the Anglo Saxons did for fun and their beliefs.
To know how shipbuilding skills helped the Vikings to explore.
To know that King Alfred defeated the Vikings.
To know that King Canute understood the limits of his power

KEY PEOPLE	
 King Canute (Canute)	A Viking king who ruled Denmark, England and Norway
 Edward the Confessor	An English king who built the original Westminster Abbey
 Alfred the Great	Ruled the kingdom of Wessex and fought back against the Vikings in Britain
 Kenneth MacAlpin	King of the Picts who, according to national myth, was the first king of Scots
 Bede (Bede the Venerable)	A monk who wrote about life in Anglo Saxon England
 Ethelred the Unready	English king who paid the Vikings to stop them attacking
 William the Conqueror	Defeated Harold Godwinson at the Battle of Hastings, 1066 and became King of England

Timeline



Knowledge Organiser – PSHE – Being Me in My World - Year Five

Vocabulary	
Refugee, Asylum, Refugee.	See below
Prejudice	Preconceived opinion that is not based on reason or actual experience.
Citizen	Someone who is a citizen of a particular country is legally accepted as belonging to that country.
Persecution	Hostility and ill-treatment, especially because of race or political or religious beliefs.
Collaboration	The action of working with someone to produce something.



Knowledge Organiser Year 5 French Unit 3: La nourriture_ê

Key Language	English
Je voudrais	<i>I would like</i>
s'il vous plaît	<i>please</i>
un sandwich au poulet	<i>a chicken sandwich</i>
un sandwich au thon	<i>a tuna sandwich</i>
un sandwich au fromage	<i>a cheese sandwich</i>
un sandwich à la tomate	<i>a tomato sandwich</i>
une glace au chocolat	<i>a chocolate ice-cream</i>
une glace à l'orange	<i>an orange ice-cream</i>
une glace à la fraise	<i>a strawberry ice-cream</i>
une glace à la vanille	<i>a vanilla ice-cream</i>
mangez	<i>eat</i>
coupez	<i>cut</i>
prenez	<i>take</i>
mettez	<i>put</i>
une baguette	<i>a french stick</i>
le beurre	<i>the butter</i>
les frites	<i>chips</i>
les bonbons	<i>sweets</i>
les pommes	<i>apples</i>
les carottes	<i>carrots</i>
les haricots	<i>green beans</i>
les gâteaux	<i>cakes</i>
j'aime/Je n'aime pas	<i>I like/I don't like</i>
C'est bon pour la santé	<i>It's healthy</i>
Ce n'est pas bon pour la santé	<i>It's unhealthy</i>

un sandwich au fromage



un sandwich au poulet



J'aime les gâteaux.
Ce n'est pas bon pour la santé.



Je n'aime pas les carottes.
C'est bon pour la santé.

KEY QUESTIONS

Qu'est-ce que tu veux?

What do you want?

Tu aimes les carottes?

Do you like carrots?

C'est bon ou ce n'est pas bon pour la santé?

Is it healthy or unhealthy?

Knowledge Organiser- Computing Systems and Networks – Communication & Collaboration - Year 6

Key Vocabulary	Definition
Protocol	a set of rules governing the exchange or transmission of data between devices.
data	Facts and statistics collected for reference or analysis
Internet protocol address	a unique string of characters that identifies each computer using the Internet Protocol to communicate over a network.
Domain Name Server (DNS)	the part of a network address that identifies it as belonging to a particular domain.
Packet	Information sent from device to device in small chunks. Each packet includes information about where the data is going to go, where it is from and how to interpret it.
Data Payload	The information or message in transmitted data
Chat	The online exchange of messages
Slide deck	A program that searches the web to create an index of data
Collaboration	Working together
Internet	a global computer network providing a variety of information and communication facilities
Private	Conversation or activity only involving a particular person(s)
Public	Open to or shared by all people

Key Knowledge

To know the importance of internet addresses

To recognise how data is transferred across the internet

To understand how sharing information online can help people to work together

To be able to evaluate different ways of working together online

To be able to name and evaluate different methods of online communication

Transferring Information

Protocols and Packets:

- Protocols are an agreed way of doing something.
- In computing, protocols exist within the way that computers communicate with each other.
- The information they send digitally are called 'Packets'.



Online Communication

-Communication is when we share information with one another. We can communicate in lots of different ways on the internet, e.g. messaging services, emails, social media, video calling and gaming platforms.

-Public communication is visible to all, whilst private communication is restricted to only some people.

-Some communications are one-way (e.g. Youtube) whilst others are two-way (e.g. Skype).

-Some communications are to one person, whilst others are to many.

-We should consider which type of communication is most appropriate to our needs, safety and privacy.



R.E. Year 5 Spring 1 Sikhism Knowledge Organiser
Enquiry: How far would a Sikh go for his/her religion?

Key vocabulary	Definition
Kalsa	The Sikh community who follow the rules of the five 'Ks'.
Guru Nanak	The founder of Sikhism (the person who started Sikhism).
Guru	Teacher
The Langar	The food served by volunteers at the Gurdwara.
The Golden Temple Harmandir Sahib	Harmandir Sahib is the real Sikh name for The Golden Temple. It means <i>house of God</i> . It is located in the city of Amritsar, Punjab, India
Gurdwara	Sikh temple

Key Knowledge
I know what a commitment is.
I know the 5 key beliefs of Sikhism are: God is in everything, Sikhs should serve others, everyone is equal, share what you have, give to charity.
I know that Sikhs are willing to sacrifice their time, effort, money, energy and even life for the well-being of others.
I know that Sikhs believe it is a good thing to treat people equally and share with people. Sikhs see the Langar as an opportunity to give, more than as a sacrifice.
I know that there are different levels of commitment and I can explain how committed I am to various interests.


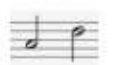





The Golden Temple in India



The Langar – a community kitchen giving free meals to visitors



Key Vocabulary	Definition
Time signature	The rhythm following a clef <i>3/4 — there are three crotchet beats in a bar</i>
Key signature	The key of a piece of music depends on the flats and sharps in the music. <i>G major — there is one sharp in the key signature (#)</i>
Tempo	The speed at which music is played <i>Allegro — At a brisk speed (155 bpm)</i>
Rhythmic patterns using:	Dotted Minims: 
	Minims: 
	Dotted crochets: 
	Crotchets: 
	Quavers: 
Chord	A group of notes played together
Triad	A group of 3 notes played together.

Songs Covered	
Freedom is Coming	South African Pop
All Over Again	20 th and 21 st Century Orchestral
Do You Ever Wonder?	20 th and 21 st Century Orchestral

Key Signature: C major — there are no sharps or flats in the key signature



Key Signature: E♭ major — there are three flats in the key signature

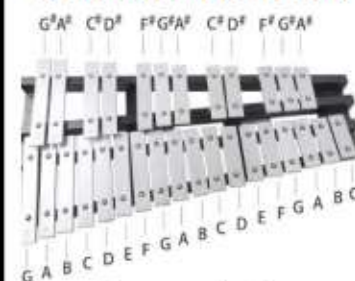


Key Signature: F major — there is one flat in the key signature



Improvise Together

Glockenspiel Notation



3/4 Time Signature



Notes you composed with...

F, G, A, B♭, C, D, E



Key Vocabulary	Definition
Cooperate	To work together towards the same goal.
Map	A pictorial representation of an area.
Route	A way of getting from one point to another.
Orienteering	A sport in which people run through a series of waypoints (controls) to guide then










Skill Development

Keep the map set (or orientated) so that you know where you are on the map and which direction you need to travel. When turning, make sure the map does not turn, and stays 'set'.

To communicate and co-operate effectively with others

To follow a set route on a map

To record clues and decipher a code.

Skills	
Legend	 <p>  Open land  Out of bounds  Forest, light trees/bushes: slow running  Forest, thick trees/bushes: walk  Hedge  Flowerbed  Wall </p>
Problem solving	
Map reading	