# **Year 4: Electricity**

Subject Spe	ecific Vocabulary	Working Scientifically	
circuit	An electrical circuit is a completed path through which an electrical current flows.	☐ Set up simple practical enquiries, comparative and fair tests.	W
buzzers	A buzzer is an automatic signalling device. They are used as alarms and door bells.	<ul> <li>Tests.</li> <li>Use results to draw simple conclusions, make predictions for new values, suggest improvements and raise further questions.</li> <li>Identify differences, similarities or changes related to simple</li> </ul>	M
conductor	A conductor is an object or type of material that allows the flow of an electrical current in one or more directions		
battery	A battery is a device that stores chemical energy and makes it available in an electrical form.	scientific ideas and processes.  Report on findings from enquiries using oral and written explanations, displays or presentations of results and conclusions.	
cells	An electrical cell is a device that is used to generate electricity.		
switch	A switch is an electrical component that can 'make' or 'break' an electrical circuit.		
socket	Sockets allow electrical equipment to be connected to the alternating current (AC) power supply in buildings and at other sites.		
appliance	An electrical appliance is a device that uses electricity to perform a function.		
appliance series circuit	Components connected in series are connected along a single path, so the same current flows through all of the components.		
insulator	An insulator is a material whose internal electric charges do not		

flow freely.

By the end of this unit, I will know:

What appliances run on electricity?

Why do we need to be safe around electricity?

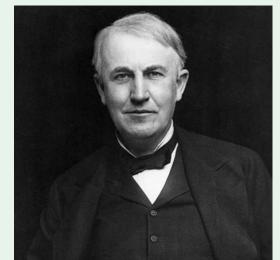
What are the components of a circuit?

How do we construct a circuit?

What are conductors and insulators?

What materials can be used to create circuits?

Our famous scientist for this unit is: Thomas Edison



# Where will our U.S.A road trip take us?

Subject S	pecific Vocabulary	BERM	Key Skills	
nomad	A member of a people that travels from place to place to find fresh pasture for its animals and has no permanent home.		Identify and locate geograph regions and their identifying human and physical characteristics, including hills	
Native American	A member of any of the indigenous peoples of North, Central, and South America.		mountains, rivers, key topographical features and la use patterns.	
American state	The U.S. is a country of 50 states covering a vast swathe of North America.	*******	□ Identify, name and locate the states of North America. □ Compare geographical regions of the initial states in the states of	
national park	An area of countryside, or occasionally sea or fresh water, protected by the state for the enjoyment of the general public or the preservation of wildlife.	By the end of this unit, I can answer these questions:	and their identifying human a physical characteristics, include hills, mountains, cities, rivers, key topographical features are land-use patterns, and understand how some of the aspects have changed over till aldentify the main physical a	
Human feature	Structures that are man made and have been built by people	Where is the USA located in the world?		
Physical feature	Structures that are naturally occurring, such as rivers and mountains.	What are the 50 states of the USA?	human characteristics of the states of North America.  Formulate, respond to a	
Statue of	The Statue of Liberty is a colossal sculpture on Liberty Island in New York		offer explanations of geographical questions about	
Liberty  Harbour in New York City.	What are the human and physical features of North America?	the physical and human characteristics of a locations.  □Identify and locate countrie		
Niagara Falls	Niagara Falls is a group of three waterfalls at the southern end of	How is the UK different to the USA?	and <b>describe</b> features using maps, atlases and	
	Niagara Gorge, between the Canadian province of Ontario and the US state of New York.	What is the climate like in the USA?	digital/computer mapping.  Summarise the key physical and human features of a loca	
tribe	The definition of a tribe is a group of people, or a community with similar values or interests	Who were the Native American Peoples?	using a range of resources.	

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## Year 4 DT Knowledge mat - Mechanisms (Model car)

Subject Specific Vocabulary		Key Skills		Sticky Knowledge
Wheel	found below a vehicle the revolves on an axle to move easily over the	<ul> <li>Generate, develop, model and communicate their ideas through</li> </ul>		Know that a vice will hold wood still when cutting it with a saw
	ground.	discussion, annotated sketches, cross-		Know that a saw should be used
Axle	a rod that passes through the centre of a group of wheels	sectional and exploded diagrams, prototypes, pattern pieces and computeraided design		responsibly and against a vice when cutting
Engine	a machine with moving parts that converts power	<ul> <li>Select from and use a wider range of tools and equipment to perform practical</li> </ul>		Know that a car needs wheels to enable it to move over a surface
	to motion	tasks accurately		Know that an axle joins two wheels and is
Steering wheel	used by the driver to control direction of the	Know how to use all tools and equipment		used to help them rotate
vehicle		safely and when to ask for support		Know that the power from the engine
Headlight	powerful light at the front	Evaluate their ideas and products against		moves the axle and wheels
ricadiigiit	of a vehicle.	their own design criteria and consider the		Know an electric circuit is used to light
Hacksaw A saw with a narrow fine		views of others to improve their work		the bulbs in the headlights of a car
	toothed blade set in a frame	<ul> <li>Understand and use electrical systems in their products</li> </ul>		
Dowel rods	Cylindrical rods usually made from wood, plastic or metal	their products		
Vice	An object attached to a			





table or bench to hold

wood firmly





## Year 4: Dodgeball

### **Subject Specific Vocabulary**

Pressure	Tactics
Officiate	Opponent
Referee	Fair play
Consistently	Outwit
Support	Sportsmanship
Tournament	Cooperatively
Accuracy	Control
Aim	Agility

### **Local Clubs**

Canterbury Crocodiles Dodgeball Club



## **Key Skills - Objectives**

To develop the ability to throw at a moving target.

To use jumps, dodges and ducks to avoid being hit.

To develop catching skills at different heights.

To learn how to block using the ball.

To understand and apply the rules of the game.

## Rules of the game

You may only pick up one ball at a time.

When throwing, you aim for the chest, arms and legs. Headshots are not allowed.

If the ball hits your chest, arms or legs, you are out of the game.

If you catch a ball someone else threw, they are out of the game.

Movement is essential.

### Team Work / Fair Play

Working as a team to succeed.

Supporting each other throughout the game.

Trusting team members to do their part.

Attitude – being accepting of success or defeat.



## Year 4: PE – Basketball

### **Subject Specific Vocabulary – Key words**

Dribble	Basket
Double dribble	Hand-eye coordination
Space	Agility
Opponent	Speed
Defender	Direction
Attacker	Communication
Chest pass	Aim
Bounce pass	



## **Key Skills - Objectives**

To develop protective dribbling against an opponent.

To move into a space to support a teammate.

To choose where to pass and when to dribble the ball.

To track an opponent and use defensive techniques to win the ball.

To perform a set shot and a jump shot.

To understand the rules of the game and use them to play a game

To use all of the tactics learnt to play a game.



## Rules of the game

To win the game you must score more baskets than your opponent.

Players need to keep themselves and the ball inside of the playing area.

Players cannot walk or run while holding the ball, they need to dribble the ball whilst moving.

You cannot dribble with two hands at the same time.

You cannot double dribble. This is where you dribble, stop and then dribble again.

Players must not make unfair contact with another player.

## **Team Work / Fair Play**

Respect coaches, teammates, opposition and referees.

To accept the decision of the referee with good grace.

Players work towards a collective effort to score baskets to achieve success.

Listen and take on board the ideas of others.

## Famous People/Teams

Ben Gordon – British player for Chicago Bulls

LeBron James (Famous American basketball player)

Basketball England

### **Local Club**

**Kent Crusaders** 

https://www.kentcrusaders.co.uk/wp/

## Year 4 : PSHE – Being my best

Subject	Specific Vocabulary
Hygiene	Ways of promoting health and preventing illness, usually through cleanliness.
Feelings	An emotional state or reaction.
Sleep cycle	The regular pattern of rest that your body uses to recover after each day.
First aid	Help given to a sick or injured person until full medical treatment is available.
Injury	When someone harms or hurts themselves or others.
Emergency services	Public organisations that respond in emergencies such as the police and the fire service.
Community	A group of people who share common goals, ideals or characteristics.
Screen time	The amount of time spent looking at computerised screens such as televisions and phones.



## **Key Skills**

Identify a range of factors that maintain a balanced and healthy lifestyle.

To know what good physical health means and how to recognise the signs of illness.

To know if someone is injured to seek medical assistance, calling the emergency services if necessary.

To know what good physical health means and how to recognise the signs of illness.

To know what a healthy balanced diet looks like, and how to manage a healthy diet well.

Understand the different age groups that make up and contribute to a community.

Know about the individuals and groups in the local community that help, including through volunteering and work.

To know that it important to balance physical activities with screen time, so that w do not develop sedentary lifestyles.

# Sticky Knowledge about The wider world

Sleep and rest are important for growing and keeping healthy.

Medicines and vaccinations can help people stay healthy and manage allergies.

Food and drink can help keep our teeth healthy alongside good dental hygiene routines.

Sometimes we need to ask for help and advice and there are different ways that we can do this.

The emergency services are there to help us and keep us safe in dangerous situations. We can call the ambulance, police, fire service and coastguard.

It is important to have good hygiene and look after our body by eating healthily, washing regularly and the like.



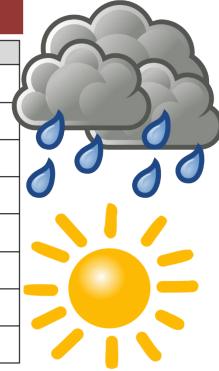


# Year 4: Spanish – What is the weather?

## **Subject Specific Vocabulary**

Spanish	English
¿Qué tiempo hace?	What is the weather?
Está lloviendo.	It is raining.
Está nevando.	It is snowing.
Hay tormenta.	There is a storm.
Hace sol.	It is sunny.
Hace mucho viento.	It is windy.
Hace buen tiempo.	The weather is fine.
Hace mal tiempo.	The weather is not good.

Spanish	English	
Hace frío.	It is cold,	
Hace calor.	It is hot.	
En el norte de España	In the north of Spain	
En el sur de España	In the south of Spain	
En el centro de España	In the centre of Spain	
En el oeste de España	In the west of Spain	
En el este de España	In the east of Spain	
el clima	the weather	



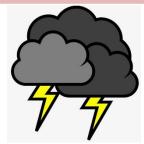
### By the end of this unit I will be able to answer:

- What different types of Weather are there?
- What is the weather loke outside today?
- What is the weather like in different places?
- How would I ask for more than one item?



- Repeat and recognise the vocabulary for weather in Spanish.
- Ask and say what the weather is like today.
- Create a Spanish weather map.
- Describe the weather in different regions of Spain using a weather map with symbols.

**Key skills:** 





# Year 4 RE: Judaism – How important is it for Jewish people to do what God asks them to?

Subject	Specific Vocabulary	Lines of enquiry:	Key Skills
Passover	A Jewish festival to remember the freeing of slaves from Egypt.	What is the importance of food?	Describe the variety of practices and ways of
Kashrut	The Jewish laws about which foods are and are not allowed to be eaten.	What are Jewish people able to eat?	<ul><li>life in different religions.</li><li>Identify religious symbolism.</li></ul>
		What is Passover?	<ul> <li>verbal and non-verbal actions are used to convey meaning.</li> </ul>
Seder	The special dinner and ceremony that Jewish families hold on the first two nights of Passover. It usually involves a range of foods and readings from the Torah.		<ul> <li>Describe and explain the main rituals within acts of worship and recognise that shared feelings are part of it.</li> <li>Examine how religious festivals are related to key figures events and</li> </ul>
		Why is the Seder meal important?	
		How do Jewish people show their respect to God?	
Kosher	Food that is able to be eaten by Jewish people.		STOTIES.
Treif	Food that is not able to be eaten b Jewish people.		
Exodus	A mass departure/movement of people.		

# Year 4 RE: Judaism – What is the best way for a Jew to show commitment to God?

Subject	Specific Vocabulary	Lines of enquiry:	Key Skills
Responsibility	Having a duty to deal with something or someone.	When are we old enough for responsibility?	<ul> <li>Describe the variety of practices and ways of life in different religions.</li> </ul>
Bar Mitzvah	The initiation ceremony of a Jewish boy at the age of 13, who is considered ready to observe religious rules and take	What is a Bar Mitzvah?	<ul> <li>verbal and non-verbal actions are used to convey meaning.</li> <li>Describe and explain</li> </ul>
	part in public worship.	What are the different ways Jews show commitment to God?	the main rituals within acts of worship and recognise that shared
Bat Mitzvah	The initiation ceremony of a Jewish girl aged 12 years and 1 day, considered the age of religious maturity.	How do Jews show their commitment to God?	feelings are part of it.  • Understand the different ways in which people show commitment to their faith.
Mitzvoth	A commandment or religious duty.		
Tu B'Shvat	A Jewish holiday on the 15th day of the month of Shevat. Known as the 'New year of the trees' people often plant trees in celebration.	Tu B'shvat	

## Year 4: Programming A – repetition in shapes (ICT)

Sul	oject Specific Vocabulary	Software and Tools	Lines of enquiry about repetition in shapes
Algorithm	A set of specific instructions to be able to complete a process.	Turtle academy – coding and movement of an image.	How do I program a screen turtle?
Command	An instruction causing a computer to perform a simple function.	© → ○ ■ * Methodology processing	How can I program letters?
			How can I create patterns and repeats?
Debug	To identify and remove errors from a computing program.	Sat size rate from	How can I use loops to create shapes?
Value	The amount assigned to a point or place.		How can I use code to program?
		Logo – coding and repetition of shapes.	
Decomposition	Breaking down a program into smaller parts.	© 0 © 1 Response report   State   Control   State   State   Control   State   Control   State   Control   State   Sta	What will my program do?
		To Brow Se Zoon Nije	Unit Overview:
Snippet	A small piece of program.		Learners will create programs by planning, modifying, and testing commands to create shapes and patterns. They will use Logo, a text-based programming language.
Loop	A program of instructions that is repeated.	Property 200   Left 39 Encount approach   Hui Share   Search States   States   States   Search States   States   States   Search States	This unit is the first of the two programming units in Year 4, and looks at repetition and
Health, wellbein	E-Safety (Project evolve) g and lifestyle / Self-image and identity		loops within programming

I can explain how using technology can be a distraction from other things, in both a positive and negative way. I can identify times or situations when someone may need to limit the amount of time they use technology e.g. I can suggest strategies to help with limiting this time.

I can explain how my online identity can be different to my offline identity.

### E-safety (continued)

I can describe positive ways for someone to interact with others online and understand how this will positively impact on how others perceive them.

I can explain that others online can pretend to be someone else, including my friends, and can suggest reasons why they might do this.

## Year 4: Music – How does music shape our way of life?

Subject Specific Vocabulary		
Melody	Another name for a tune.	
Rhythm	Long and short sounds that happen throughout the music.	
Time signature	An indication of rhythm and how many beats are in a bar.	
Ensemble	A French word used to describe playing/singing/performing together.	
Major	A key with a bright/happy sound	
Acapella	Singing without instruments.	
Gospel	Music that is Christian and sung with rich harmony and call and response	
Harmony	Different notes sung or played at the same time to produce chords	
Call and response	A solo person sings or plays and the rest of the performers sing or play a different musical idea.	







## **Sticky Knowledge**

#### Gospel music is:

- Passionate, uplifting lyrics about God, heaven and salvation.
- A strong solo vocalist supported by a choir or instrumental accompaniment.
- Often includes instruments such as drum kit, electric bass and keyboard or Hammond organ.
- Use of syncopated rhythms and a faster tempo than traditional hymns or Spirituals.

#### 20<sup>th</sup> and 21<sup>st</sup> century orchestral music is:

- Any style or combination of styles can be performed by an orchestra, in any context.
- Any instrument can be included in the orchestra, including amplified instruments, electronic instruments and audio effects.
- Use of harmonies, melodies and rhythms that weren't heard in earlier styles of orchestral music.
- Use of vocal and instrumental performance techniques that weren't heard in earlier European orchestral styles.

#### Classical music has:

- Simple, homophonic texture featuring strong melodies and an accompaniment.
- Instrumental pieces are neatly divided into sections, like a song.
- Use of a medium-sized orchestra and/or piano (not harpsichord).
- The mood and dynamics change quite often.

# Key Skills (Lesson Learning) Children will be:

- Find and keep a steady beat in the time signatures of: 2/4, 3/4 and 4/4.
- Recognise and copy back rhythmic patterns made of semibreves, minims, dotted crotchets, crotchets, quavers, semiquavers and their rests, by ear or from notation.
- Copy back melodic patterns using the given notes in the key of C major.
- Recognise the sound and notes of the pentatonic scale by ear and from notation.
- Describe legato and staccato.
- Rehearse and learn songs from memory and/or with notation.
- Sing in different time signatures: 2/4, 3/4 and 4/4.
- Sing as part of a choir with awareness of size: the larger, the thicker and richer the musical texture.
- Sing 'on pitch' and 'in time'.
- Sing expressively, with attention to breathing and phrasing.
- Read and perform pitch notation within a range.
- Follow and perform simple rhythmic scores to a steady beat: maintain individual parts accurately within the rhythmic texture, achieving a sense of ensemble.
- Rehearse and learn to play a simple melodic instrumental part by ear or from notation, in C major, F major, G major and D major.
- Improvise on a limited range of pitches on the instrument you are now learning, making use of musical features, including smooth (legato) and detached (staccato) articulation.
- Improvise over a simple chord progression.
- Improvise over a groove.
- Create a melody using crotchets, minims, quavers and their rests.
- Use dynamics.
- Use a pentatonic scale.
- Understand how the individual fits within the larger group ensemble.
- Reflect on the performance and how well it suited the occasion.