

St. George's Church of England Academy



Year 9

Knowledge Organiser

Progress Period 1

Name: _____ Form: _____

St. George's Church of England Academy

Homework Policy and Guidance

What is a Knowledge Organiser?

- A Knowledge Organiser is a tool which sets out exactly what knowledge is vital in the curriculum.
- It clarifies for everyone – pupil, parent, teacher, headteacher – exactly what is being taught.
- It is not expected to cover the entirety of everything you may possibly cover in a topic – just what is vital.
- A Knowledge Organiser is a distillation of knowledge, not a textbook or step by step revision guide.

Benefits of Knowledge Organisers:

- For pupils they are a revision of ALL the key information the teacher has decided is necessary for the topic.
- Parents know what their children are learning and are able to get involved in supporting their revision through quizzing and testing at home.

Pupils are expected to undertake homework **every evening**. The expected amount of time to be taken on homework will vary for each year group and will increase year on year.

The purpose of homework at St. George's is very clear. Homework will:

- Support pupils to retain the key knowledge learned in lessons;
- Enable parents to support their children in their learning;
- Promote independence in learning;
- Promote a work ethic which will support success in further education;
- Support wider reading and study to support curriculum learning;
- Encourage practice of examined tasks and questions.

Homework will take the form of independent learning of key facts linked to the topics being studied in lessons. Knowledge organisers will be handed out at the start of each Progress Period. Pupils will be expected to learn all of the key knowledge on the organisers. Pupils will be tested in low stakes quizzes throughout the half term (this is how we will assess if students are doing their homework).

Year 9 Knowledge organiser timetable

	Subject 1	Subject 2
Monday	Option D	Maths
Tuesday	Option B	Chemistry
Wednesday	Option C	Biology
Thursday	RE	Physics
Friday	Option A	English

My option subjects:

Option A	
Option B	
Option C	
Option D	

English

English: Of Mice and Men Context and Setting

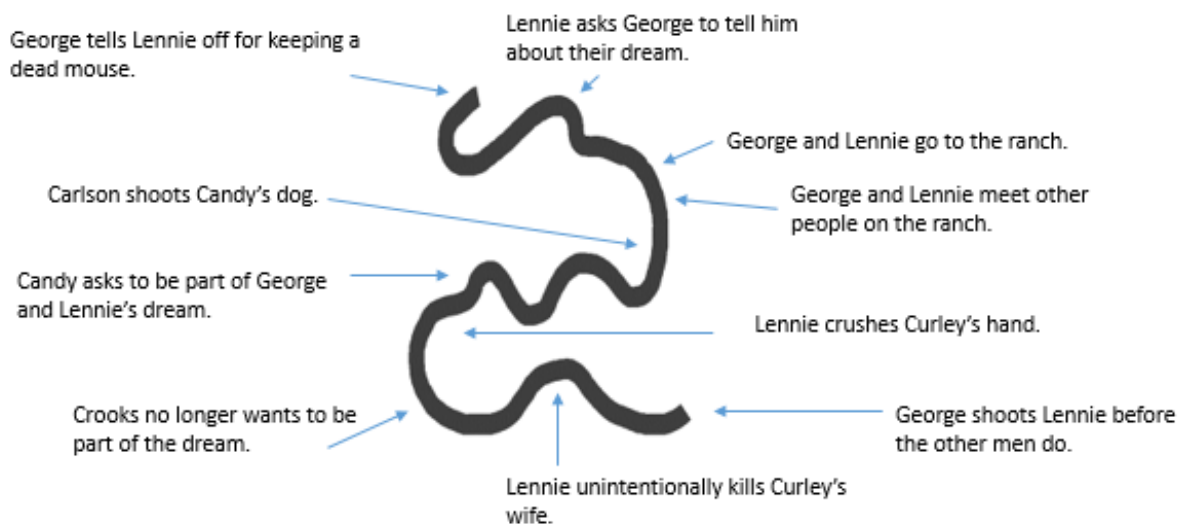
AO1 Key Information / Trivia

- Novel / novella published in 1937
- Cyclical
- The novel is set in a place called Soledad, (a Spanish word meaning solitude or loneliness) in California.
- The title is taken from Robert Burns' poem "To a Mouse", which reads: "The best laid schemes o' mice an' men / Gang aft agley". (The best laid schemes of mice and men / Often go awry.)

Key characters

- George – protagonist who travels with and looks after Lennie.
- Lennie – depends on George as he has a mental disability.
- Candy – the old 'one-handed' swamper on the ranch
- Curley – The Boss' aggressive son
- Curley's Wife – only woman on ranch, lonely
- Slim – skilled and respected rancher
- Crooks – only black man on the ranch, stable hand.
- Other minor characters including The Boss, Carlson and Whit.

AO1 – Pivotal Plot Events/References



AO3 Specific, Precise Context Links:

1. The novel is set during the Great Depression, a period of significant poverty and unemployment across the USA following the Wall Street Crash in 1929.
2. The Great Depression took place following the Wall Street Crash in October 1929 and affected the world's economy. Wall Street is a street in New York City, where many financial firms are based.
3. During the Great Depression, there was also the Dust Bowl – drought and dust storms swept across several states in mid-west America.
4. Racism increased during the Great Depression and racial violence, which had been decreasing,

Themes and Writer's Messages

1. There are different themes running through *Of Mice and Men*, all linked primarily to George and Lennie as the central characters of the novel. Their plan to own their own farm highlights the theme of dreams, which also involves Candy and Crooks, as well as Curley's wife. George and Lennie's unusual friendship introduces the idea of companionship, while also contrasting with the loneliness experienced by characters such as Curley's wife, Crooks and Candy.

rose again during the economic downturn

5. John Steinbeck was born in Salinas, California in 1902. Although his family was not poor, when he was a teenager he spent time working on ranches near his home and this had a big impact on his writing. His experience of working with farm labourers and his interest in their lives is clearly evident in *Of Mice and Men*, as well as in some of his other books, like *The Grapes of Wrath*.

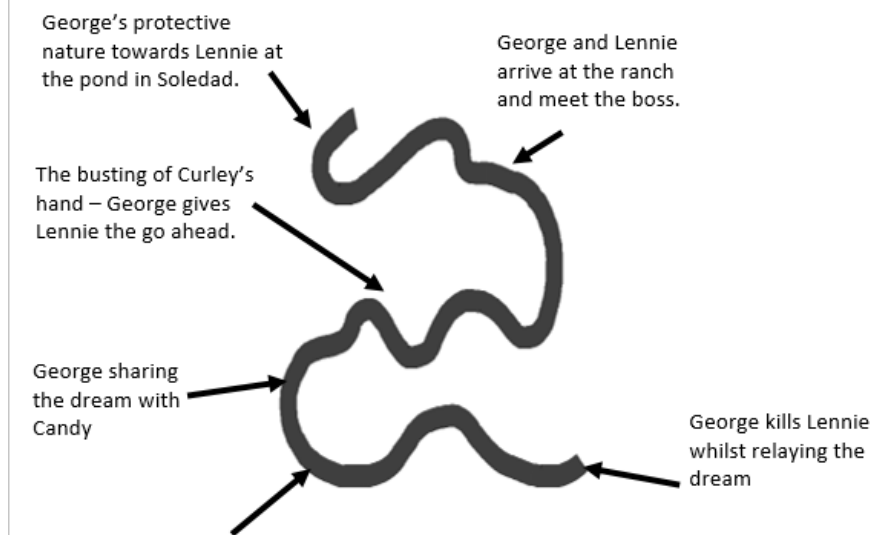
2. Dreams in *Of Mice and Men* are linked to the 'American Dream'. This is the idea that in America, it is possible for anyone to achieve success and improve their lives through hard work.

English: George

AO1 Key Information/Trivia

George "travel[s] together" with and looks after Lennie. They are best friends but complete opposites. Lennie is "huge" and George is "small" and "quick witted"

AO1 – Pivotal Plot Events/References



Candy and George find Curley's wife. George and the others go to find and hunt Lennie.

AO1/2 – Key Quotations Linked to Characteristics

- "The first man was small and quick, dark of face, with restless eyes and sharp, strong features."

AO1/2 – Key Quotations Linked to Pivotal Events

- "God almighty, if I was alone I could live so easy"
- "No he aint [much of a talker] but he's sure a hell of a good worker"
- "Don't you even take a look at that bitch"
- "We travel together."
- "I'm gonna kill that son of a bitch"
- "Tell me about the rabbits."

AO3 - Specific, Precise Context Links

1. American Dream and the false hope of material prosperity that is often dangled in front of the lower and middle classes.
2. Poverty due to Wall Street Crash

AO1/2/3 – Critical Theory Links

Edward Wilson saw *Of Mice and Men* as a simple social representation of Darwin's theory of survival of the fittest. He believed Steinbeck illustrates George killing Lennie to represent the strong killing the weak in society who are unfit for survival.

AO1/2 - Impact on other Characters

George protects Lennie until he cannot any longer. Candy becomes much happier after being part of the dream. As they talk, Slim is "quiet and receptive" (Ch. 3), displaying a respect for George.

English: Lennie

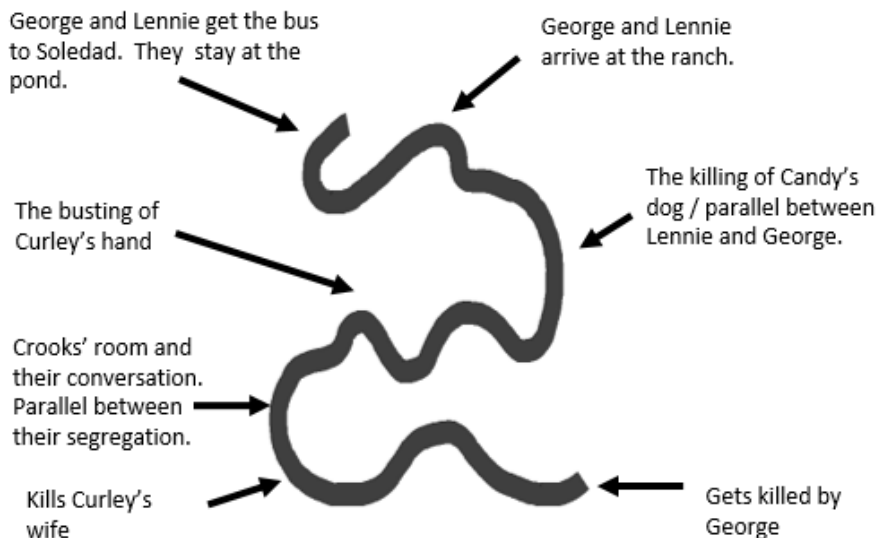
AO1 Key Information/ Trivia

Lennie has a mental disability. He depends on his friend George. George “travel[s] together with Lennie.

AO2 – Characteristic Methods

Subverted antagonist/protagonist (antihero), peripeteia, aporia, catharsis, volta

AO1 – Pivotal Plot Events/References



AO1/2 – Key Quotations Linked to Characteristics

“He is large but undefined”
“like an animal” “a huge man”, “shapeless of face”
“with large, pale eyes”
“dragging his feet a little, the way a bear drags his paws.”

AO1/2 – Key Quotations Linked to Pivotal Events

1. "Drank with long gulps, snorting into the water like a horse"
2. "Go on... George. How I get to tend the rabbits"
3. "Le's go, George. Le's get outta here. It's mean here."
4. Curley was flopping like a fish on a line
5. Her body flopped like a fish Lennie had broken her neck.
6. Lennie jarred, and then settled slowly forward to the sand, and he lay without quivering

AO3 - Specific, Precise Context Links

1. 1930s views on mental illness – segregation.
2. Poverty – dust bowl / wall street crash - drifters

AO1/2/3 – Critical Theory Links

1. Freud – Moves from the Id to a balance between the Id, Ego and Superego
2. Feminist criticism – Curley's wife – victim blame.
3. 1930s views on mental illness and is his mental disability excusing his violent behaviour?

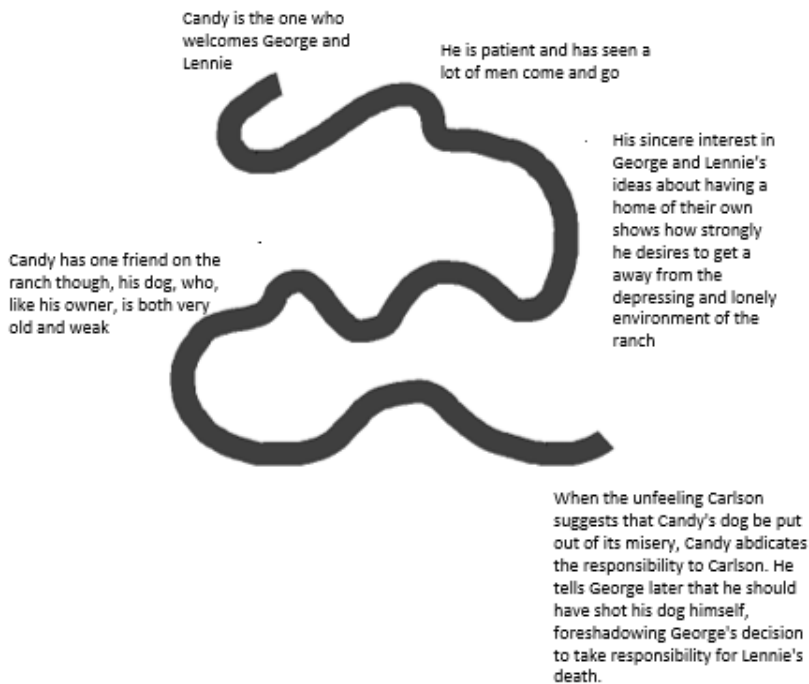
AO1/2 - Impact on other Characters

Rising violence – harmful to other humans and animals because of his vast size and mental disability.

English: Candy

AO1 Key Information/Trivia

- Old
- Friendly
- Lonely
- One-handed
- Weak
- Candy's main occupation on the ranch is to clean the Bunkhouses
- The 'old swamper'



AO1/2 – Key Quotations Linked to Characteristics

He realises that Curley's wife is more than 'just a tart' as he says she's 'a poor bastard'

Candy's relationship with his dog reflects that of George and Lennie's, one of equal compassion for the other *At his heel walked a drag footed sheep dog*"

AO1/2 – Key Quotations Linked to Pivotal Events

- 'The old swamper.'
- 'Candy looked for help from face to face.'
- 'Candy cried, 'Sure they all want it ... He stopped overwhelmed with his picture.'
- 'Now Candy spoke his greatest fear ... He knew.'
- 'let no stranger shoot my dog'
- 'Tell ya what Lennie I been figuring out about those rabbits'
- 'S'pose I went in with you guys'

AO3 - Specific, Precise Context Links

Candy, like George, is different from the other ranch hands because he has his dog as a constant companion, someone devoted and loyal to him

He's not quite seen an insider, although he loves in the bunk house he is cast aside by the other men

AO1/2 - Impact on other Characters

Candy finds comfort with Crooks/Lennie (they are all discriminated against)

English: Curley

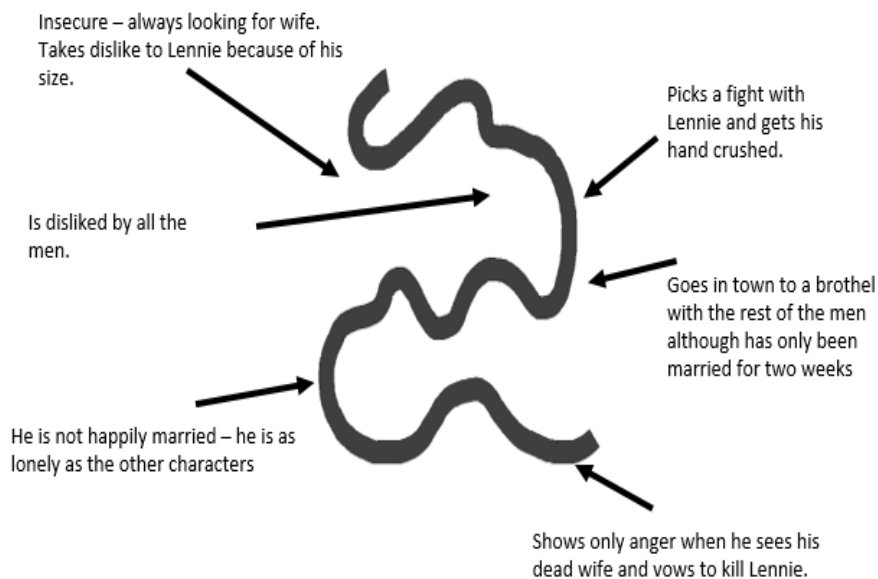
AO1 Key Information/Trivia

Boss's son, nepotism, disliked by all, insecure, coward, mean, aggressive, craves respect.

AO2 – Characteristic Methods

Antagonist (antihero), catharsis, semantic field of aggression and violence.

AO1 – Pivotal Plot Events/References



AO1/2 – Key Quotations Linked to Characteristics

1. 'Curley's like a lot of little guys. He hates big guys'
2. 'You seen a girl around here?'
3. 'This guy Curley sounds like a son-of-a-bitch to me. I don't like mean little guys.'

AO1/2 – Key Quotations Linked to Pivotal Events

1. 'You seen a girl around here?'
2. 'Curley lashed his body around. "By Christ, he's gotta talk when he's spoke to"
3. "'Come on, ya big bastard. Get up on your feet'"
4. 'The next minute Curley was flopping like a fish on a line.'
5. 'Think I don't know where they all went. Even Curley'
6. 'Carlson laughed. "You God damn punk" he said..."You're yella as a frog belly."
7. "'Sure I gotta husband. You all seen him. Swell guy, ain't he?'"
8. "'I know who done it," he cried. "That big son-of-a-bitch done it...I'll shoot 'im in the guts."

AO3 - Specific, Precise Context Links

1. The Great Depression/crash of the stock market 1929 many people were unhappy.
2. American society was racist and prejudice in 1930s - Curley picks on Lennie, disrespects his wife.

AO1/2/3 – Critical Theory Links

1. Freud's theory of suppressed desires gradually reveal themselves.
2. Locke's theory: behaviour – humans become victims of their environment

AO1/2 - Impact on other Characters

1. Takes out his own unhappiness on the weaker characters.

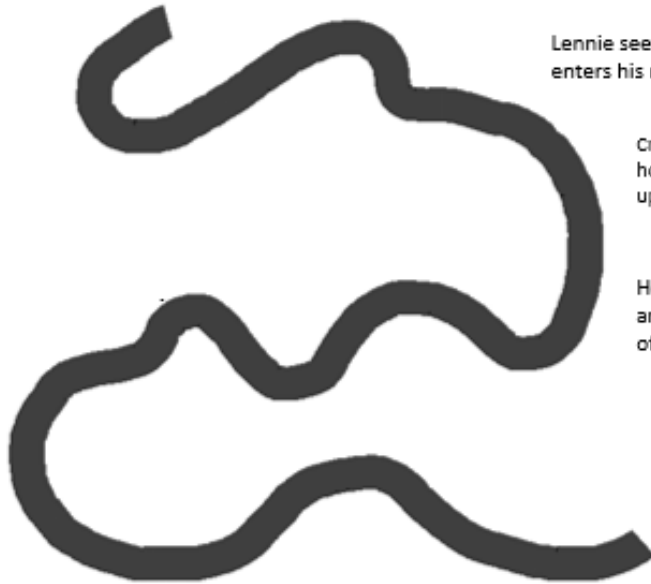
English: Crooks

AO1 Key Information/ Trivia

- Scapegoated
- Discrimination
- His possessions are symbolic

He is mention as a
'scapegoat for mindless
violence/entertainment'

His room and possessions are
described in detail



Lennie sees his light on and
enters his room.

Crooks is not without his faults,
however. He scares Lennie and makes
up the story of George leaving him.

He joins in with 'the dream'
and believes he can be a part
of something

The dream falls apart
and Crooks shows the
reader that it is
unobtainable for weak
in society

AO1/2 – Key Quotations Linked to Characteristics

'The door opened
quietly, lined with pain,
the eye patient.'
'A guy needs
somebody – to be near
him. A guy goes nuts if
he ain't got nobody'
Crooks was a 'proud
and aloof man'
'He owns the
'Californian Civil code'

AO1/2 – Key Quotations Linked to Pivotal Events

'Nobody never
gets to heaven,
and nobody
gets no land'
Curley's wife
tells him she'll
have him
'lynched'
'Nobody got a
right to be in
here but me'

AO3 - Specific, Precise Context Links

Animal imagery within Crooks' room description: 'box full of straw' linking to the sub-human treatment of Negroes in the 1930s

AO1/2/3 – Critical Theory Links

Racial discrimination is part of the microcosm Steinbeck describes in his story.
Manslow's Hierarchy of needs- all people need someone.

AO1/2 - Impact on other Characters

Lennie and Candy find comfort with him (they are all discriminated against)
Only Lennie does not see his flaws

English: Curley's Wife

AO1 Key Information/Trivia

- Pretty
- Lonely
- Young
- Unhappy
- Cruel

AO1/2 – Key Quotations Linked to Characteristics

attractive - "She's purty"
Lonely "I get awful lonely"
Flirtatious "She got the eye goin' all the time on everybody"

AO1/2 – Key Quotations Linked to Pivotal Events

'Girl', 'full rouged lips', 'red mules with little bouquets of red ostrich feathers' (Ch.2)
"Think I don't like to talk to somebody every once in a while" (ch.4)
" I could have you strung up so easy it ain't even funny." (Ch.4)
" I coulda been in the pictures." (Ch.5)

Ch.1 - We hear about her from Candy before we meet her. She is simply known as 'Curley's Wife' shows how she's a possession.

Ch. 2 - She arrives at the bunkhouse in chapter 2 and 'cuts off' the light – foreshadows her death and lasting impact on George & Lennie and the farm.

Ch.2 - Slim is the only rancher who greets her nicely. The rest are hostile towards her.

Ch.5 - Finally, she receives attention from Lennie, however this attention leads to her death. She appears softer to the reader. With it dies the dream of the ranch.

Ch. 4 - Powerless as a female, she relishes the opportunity to taunt both Crooks & Lennie. She is nasty. (power struggle)

AO3 - Specific, Precise Context Links

She's name less- highlights how women lacked power and rights in society.
Also highlights how women were just another possession of their husband.

AO1/2/3 – Critical Theory Links

Red – associated with danger, sex and blood.
Her make-up, clothes and shoes present her as a 'tart' but also link back to girl from Weed. It symbolizes blood and foreshadows her death.

AO1/2 - Impact on other Characters

Asserts her power over Crooks and is derogatory towards him.
Acts as a foil to George and Lennie's dream ranch.

English: Friendship and Loneliness

AO1 Key Information/Trivia

1. As bunk houses on ranches like the one George and Lennie travel to in search of work are filled with men—often men traveling alone, separated from their families—male friendship became a necessary distraction (and often even survival mechanism) in the face of social upheaval and economic devastation.
2. The novel explores male friendship, and through the relationships, Steinbeck argues that “a guy needs somebody”—even when society seems to value or demand solitude and independence.

George and Lennie are travelling companions.

When they arrive at the ranch, The Boss and others are suspicious of their friendship – so George says Lennie is his cousin.

Slim is surprised that they travel together and Curley mocks their friendship.

Candy's only companion is his dog until George and Lennie arrive.

Crooks is segregated as the only black man on the ranch.

Curley's wife is the only woman on the ranch.

Candy and Crooks join in on the dream.

George shoots Lennie and ends up alone.

AO1/2 – Key Quotations Linked to Pivotal Events

“I want you to stay with me Lennie”

“I told his old lady I'd take care of him”

“Crooks – scattered about the floor were a number of personal possessions for being alone he could leave things about”

“I get lonely” said she “You can talk to people but I can't”

“Old Candy lay down in the hay and covered his eyes with his arm”

AO3 - Specific, Precise Context Links

1. Lennie and George's friendship is the central focus of *Of Mice and Men*—even as it is presented as a total anomaly in a world where individualism, distrust, and the struggle for survival define the social landscape. “Ain't many guys travel around together,” says Slim “I don't know why. Maybe ever'body in the whole damn world is scared of each other.”
2. Slim's simple, straightforward assessment of the American landscape during the depression reflects the mistrust and selfishness of the time period and shows how unusual—and even suspect—George and Lennie's devoted friendship is to the men around them.

AO1/2 - Impact on other Characters

When the other laborers and ranch hands see George and Lennie's mutual trust, they're skeptical at first—but slowly, over the few days that George and Lennie stay, the social dynamics on the ranch begin to change.

English: Hopes and Dreams

AO1 Key Information/Trivia

1. George and Lennie have a **dream**: to scrounge enough money together to someday buy their own little house and a plot of land to farm. They **dream** of roots, stability, and independence.
2. "The American Dream is that dream of a land in which life should be better and richer and fuller for everyone, with opportunity for each according to ability or achievement. It is not a dream of motor cars and high wages, but a dream of social order in which each man and each woman shall be able to achieve the fullest stature of which they are capable of, and be recognized by others for what they are, regardless of the circumstances of birth or position."
3. Although dreams are initially a source of hope in the book, Lennie's death makes his and George's dream impossible so as the novel ends, we see that even simple, modest dreams are unattainable in the harsh environment of America during the Great Depression.

AO1/2 – Key Quotations Linked to Pivotal Events

'Someday – we're gonna get the jack together and we're gonna have a little house and a couple of acres an' a cow and some pigs'

'But it'll be our own place, an' I'll be let to work on our own place'

'Everybody wants a little bit of land, not much. Jus' som'thin' that was his'

'He ain't gonna let me tend no rabbits

'Coulda been in the movies, an' had nice clothes'

AO3 - Specific, Precise Context Links

The American Dream is the idea that everyone in the United States has the chance to achieve success and prosperity.

It states:

"All men are created equal, that they are endowed by their Creator with certain unalienable Rights, that among these are Life, Liberty, and the Pursuit of Happiness"

AO1/2 - Impact on other Characters

Curley's wife – dream to be in the movies destroyed

Candy's / Crooks' dream – to be useful and have a place to go is also destroyed

Ranch workers – don't have a dream – work from day to day and then spend earned money in a 'cathouse'.

Biology

Year 9 PP1 Science: Biology Unit 1

1.	What is a cell?	Basic unit of life
2.	How is a cell classified as eukaryotic?	DNA enclosed in a nucleus
3.	State three subcellular structures of plant and animal cells (eukaryotes)?	Possible answers: cell membrane, cytoplasm, nucleus, mitochondria, or ribosomes
4.	State the three sub cellular structures only found in plant cells?	Chloroplasts, permanent vacuole, and cell wall
5.	What are cells walls made from?	Cellulose
6.	How is a cell classified as prokaryotic?	DNA is not enclosed in a nucleus
7.	Give an example of a prokaryotic cell	Bacteria
8.	What are plasmids?	Single loop of DNA found in the cytoplasm?
9.	Describe the function of the nucleus.	Contains the genetic material of the cell.
10.	Describe the function of the cytoplasm.	The location of chemical reactions.
11.	Describe the function of the cell membrane.	Control movement of substances in and out of cell
12.	Describe the function of the mitochondria.	Where aerobic respiration occurs to release energy.
13.	Describe the function of the ribosomes.	Protein synthesis
14.	Describe the function of the chloroplasts.	The location of photosynthesis.
15.	Describe the function of the permanent vacuole.	A storage area for ions and water to keep the cell turgid
16.	How is cell wall in bacteria different to the cell wall of plant cell?	No made from cellulose
17.	How do you convert millimetres into micrometres?	X1000
18.	How do you convert nanometres into micrometres?	÷1000
19.	What is the function of the objective lens?	Magnify the specimen
20.	What is the function of the fine focus?	Focus lens to give a clearer image
21.	What are the two advantages of electron microscopes over light microscopes?	1. Increased magnification, 2. Increased resolution.
22.	What is the resolution microscope?	The ability to determine two close objects as separate images.
23.	State the equation that links magnification, image size and real size	Magnification = image size ÷ real size
24.	Describe a specialisation of a sperm cell.	Able to move due to flagellum, many mitochondria to allow high energy release for movement, streamlined head and enzymes in head to break down egg membrane.

25.	Describe a specialisation of a nerve cell.	Possible answers Many mitochondria to provide lots of energy for active transport Many proteins embedded in cell membrane to allow ion movement.
26.	Describe a specialisation of a muscle cell.	Possible answers- Many mitochondria to provide lots of energy for contraction Many ribosomes to synthesise proteins.
27.	Describe a specialisation of a root hair cell.	Possible answers- Elongated shape to increase surface area for ion absorption Many mitochondria to provide lots of energy for active transport.
28.	How many pairs of chromosomes are in a human body cell?	23 pairs
29.	What is a chromosome?	Chromosomes are long lengths of a molecule called DNA
30.	What is a gene?	A small section of DNA that codes for a protein
31.	Name the stages of the cell cycle	1. Growth 2. DNA synthesis 3. Mitosis
32.	What is mitosis?	A cell makes a copy of itself by dividing to form two identical offspring
33.	Why is mitosis important?	Possible answers: Growth of multicellular organisms Repairing or replacing damaged tissues Asexual reproduction
34.	What has to happen within the cell before it can divide? (2 steps)	1. Cell organelles (e.g. mitochondria and ribosomes) must replicate, 2. DNA has to be replicated (copied).
35.	What is "cell differentiation"?	The process of a stem cell dividing and becoming a specialised cell.
36.	What is a stem cell?	A cell that is not specialised
37.	What are the two types of human stem cells?	Bone marrow and embryos
38.	Describe the function of stem cells in embryos.	To develop into multiple cell types aiding in the development of the embryo into a mature organism.
39.	Describe the function of stem cells in adult animals.	To be the source of cells used in growth and repair of the mature animal.
40.	What is different about plant cells' differentiation?	They retain the ability to differentiate throughout life (e.g. a stem developing roots when planted in soil)
41.	What is different about plant cells' differentiation?	They retain the ability to differentiate throughout life (e.g. a stem developing roots when planted in soil)
42.	What are stem cells called in plant?	Meristems
43.	Where are stem cells found in plant?	Close to the tip of the shoot and tip of the root
44.	Describe the function of stem cells in plant meristems.	To allow a plant to keep growing throughout its life (animals stop growing when mature) by specialising into any type of cell.
45.	What is a potential use of stem cells in medicine?	To treat conditions where cells have been damaged e.g. diabetes, paralysis.

46.	What is the principle of therapeutic cloning?	An embryo is produced with the same genes as the patient.
47.	Give an advantage of therapeutic cloning.	No rejection of the new cells by the patient (as they are the patient's own cells).
48.	Give two potential problems with therapeutic cloning.	1. Risk of viral infection, 2. Religious/ethical objections around the use of embryos.
49.	Define "diffusion".	The net movement of particles from an area of high concentration to an area of low concentration down a concentration gradient across a semi-permeable membrane.
50.	Name three substances which move by diffusion within animal cells.	Oxygen, Carbon dioxide and Urea
51.	Name three factors which affect the rate of diffusion.	Concentration gradient, Temperature and Surface area of the membrane.
52.	State three organs in the body where diffusion occurs	Small intestine, Lungs and Kidneys
53.	State how to calculate the area of a rectangle	Area = length x width
54.	State how to calculate the volume of a cube	Volume = length x width x height
55.	State two common features that aid the exchange of substances in animals	Large surface area Thin membrane to provide a short diffusion path.
56.	How are alveoli adapted for diffusion?	Possible answers: Large surface area, moist lining, thin wall and good blood supply
57.	How are gills adapted for diffusion?	Gill filaments and lamellae: increase the surface area provide a good blood supply thin surface
58.	Define osmosis.	The diffusion of water from a high-water concentration to a region of low water concentration through a partially permeable membrane.
59.	What is a partially permeable membrane?	A membrane that only allows certain substance to pass through
60.	What piece of apparatus is used to measure volume of liquid?	Measuring cylinder
61.	What piece of apparatus is used to measure the mass of solid?	Balance
62.	When investigating osmosis, why is it important to dry the vegetable chips before measuring the mass?	Removes excess water than will alter the mass
63.	Define active transport.	The movement of substances from a low concentration to a high concentration (against a concentration gradient).
64.	What two things does active transport require that diffusion doesn't?	A transport protein (found in the cell membrane), Energy.
65.	From what reaction does the energy required for active transport come?	Respiration.
66.	Where does respiration occur in a cell?	Mitochondria
67.	Give two examples of where active transport	Plant root hair cells absorbing mineral ions from the soil Glucose absorption from the small intestine into the blood.

Triple Biology ONLY

1.	What is binary fission?	Type of cell division that occurs in bacterial cells
2.	How many daughter cells are produced in binary fission?	2
3.	What is the first stage of binary fission?	DNA replication
4.	State temperature required for optimal bacteria growth	37°C
5.	How do you sterilise inoculating loops?	Pass them through a Bunsen burner flame before use.
6.	What is the maximum temperature cultures should be incubated at in schools or colleges? Explain why	25°C To avoid growing potential pathogens.

Chemistry

Year 9 PP1 Science: Chemistry Unit 1

7.	What is an element?	A substance made of one type of atom.
8.	What is a compound?	A substance which contains two or more elements chemically combined in fixed proportions.
9.	What is an atom?	Atoms are the smallest part of an element that can exist alone.
10.	What is a mixture?	A substance consisting of two or more elements or compounds not chemically combined .
11.	What is the charge on an Ammonium ion?	Positive
12.	What do we call this ion: CO_3^{2-} ?	Carbonate ion
13.	What do we call this ion: F^- ?	Fluoride ion
14.	What do we call this ion: OH^- ?	Hydroxide ion
15.	Name two naturally occurring mixtures	Crude oil and air
16.	Name the five ways to separate mixtures	Filtration, Crystallisation, Simple distillation, Fractional Distillation, Chromatography
17.	What is a solvent?	Liquid that can dissolve other substances
18.	What does insoluble mean?	A substance that will not dissolve in a specific solvent
19.	What does filtration separate?	An insoluble solid from a solution or liquid
20.	What process separates soluble solids from a solution?	Crystallisation
21.	What is evaporation?	When liquid turns to a gas
22.	How would you separate a mixture of two liquids with different boiling points?	Simple distillation
23.	What is the distillate?	The liquid that comes out of the condenser in distillation.

24	Which way does the water enter and leave a Leibig condenser?	Enters at the bottom Leaves through the top
25	Why is water passed through the Leibig condenser?	To cool down the gas inside the inner tube, so that condensation can occur faster.
26	What does fractional distillation separate?	Mixtures of more than two liquids with different boiling points.
27	What is a solute?	The substance that is dissolved in a solution
28	How would you separate different solutes with different solubility's?	Chromatography
29	What is a scientific model?	A scientific model is a physical or conceptual representation of a system of ideas or processes.
30	Who discovered the nucleus?	Ernest Rutherford and Geiger Marsden
31	What did John Dalton discover?	That atoms were tiny undivisible spheres.
32	What particle did James Chadwick discover in 1932?	The neutron
33	Who created the Plum Pudding model?	JJ Thompson
34	What sort of particles did Rutherford fire at gold atoms?	Alpha particles
35	Why were alpha particles bounced back?	Because they met with an area of high positive charge – the nucleus
36	Name the three sub-atomic particles	Proton, neutron and electron
37	What Is the charge of a proton?	Positive
38	What is the charge of a neutron?	Neutral (no charge)
39	What is the charge of an electron	Negative
40	What is the mass of a proton?	1
41	What is the mass of a neutron?	1
42	What is the mass of an electron	very small
43	Where is the location of protons in the atom?	In the nucleus
44	Where is the location of neutrons in the atom?	In the nucleus
45	Where is the location of electrons in the atom?	In shells, orbiting the nucleus
46	What does the atomic number tell you about an atom?	The number of protons
47	What does the mass number tell you about an atom?	The total number of protons and neutrons in the nucleus
48	What is the relative atomic mass (Ar)?	The relative atomic mass of an atom of an element.
49	What is the sum of the relative atomic masses of the atoms in a compound?	The relative formula mass (Mr)
50	Where is most of the mass of the atom found?	In the nucleus
51	What is an isotope?	Atoms of the same element with same number of protons but with different numbers of neutrons

52	How do you calculate the numbers of neutrons?	Mass number – atomic number
53	Which particle is located in shells around the nucleus?	electrons
54	How many electrons fit in the first three electron shells	1 st shell: 2 2 nd shell: 8 3 rd shell: 8
55	What is the electron configuration of Boron? Boron has 6 electrons	2, 4
56	What is the electron configuration of Sodium? Sodium has 11 electrons	2, 8, 1
57	Who first organised a table of elements based on atomic weights?	John Newlands
58	Why did Mendeleev leave gaps in his table?	For undiscovered elements
59	What are rows called in the periodic table?	Periods
60	What are columns called in the periodic table?	Groups
61	What does the group number tell you?	The number of electrons in the outer shell
62	Which elements react in a similar way – those in periods or groups?	Groups
63	What is the trend in reactivity for group 1?	As you go down the group the reactivity increases.
64	What is the trend in reactivity for group 7?	As you go up the group the reactivity decreases.
65	What sort of ions do metals form?	Positive ions
66	Give three properties of non-metals	Possible answers: Dull, Low density, weak, brittle, poor heat and electrical conductors
67	Do metals lose or gain electrons to form ions?	Lose
68	Which is the group with unreactive elements?	Group 0/Noble gases
69	Why are the Noble gases unreactive?	They have a full outer shell of electrons
70	Which group are the alkali metals?	Group 1
71	Why does reactivity increase down group 1?	The atoms get larger, so the outer electron is given away more easily because it is less strongly attracted to the nucleus.
72	Metals and non-metals to form which type of compound?	Ionic compounds
73	What are metal chlorides made from?	Metal and Chlorine
74	Which ionic compounds are formed when metals react with Oxygen?	Oxides
75	What is the gas produced when alkali metals react with water?	Hydrogen
76	Which group are the halogens?	Group 7
77	What is the trend in boiling points down group 7?	Boiling point increases
78	Why is Iodine less reactive than Chlorine?	Because it is harder to gain an extra electron as the outer shell is further from the nucleus in

		Iodine. Iodine is a bigger atom.
79	What is a displacement reaction?	When a more reactive element reacts to displace a less reactive one.
80	How many electrons do Halogens have in their outer shell?	7
81	Will Fluorine displace Bromine from its salt solution? Why?	Yes – Fluorine is more reactive than Bromine
82	Will Iodine displace Chlorine from its salt solution? Why?	No – Iodine is less reactive than Chlorine
83	How many electrons do Halogens have in their outer shell?	7

Triple Chemistry Only

1.	Do transition metals have high or low boiling points?	High
2.	State the names and symbols of three transition elements	Possible answers: Copper Cu, Titanium Ti, Chromium Cr, Iron Fe, Manganese Mn, Nickel Ni, Cobalt Co, Zinc Zn, Silver Ag, Gold Au
3.	State two properties of transition elements	Possible answers: good conductors, hard, strong, high density, high melting points
4.	Which are more reactive: group 1 or transition elements?	Group 1
5.	Where are the transition elements in the periodic table	Centre
6.	What is a catalyst?	A substance which speeds up a chemical reaction without being changed in the process
7.	Why might cadmium be used in paint?	Transition metals form ions which are highly coloured
8.	Name a difference between a transition metal and a group 1 metal	From: reactivity, density, melting and boiling points

Physics

Year 9 PP1 Science: Physics Unit 1

1.	What is energy?	Ability of an object to perform work
2.	What are the units of energy?	Joules
3.	State the different energy stores	Magnetic, Internal (thermal), Chemical, Kinetic Electrostatic, Elastic potential, Gravitational potential Nuclear
4.	State two objects with a chemical energy store	Food, electrical cells (battery)
5.	Energy stored in objects which move.	Kinetic
6.	What is a kinetic energy store	Energy stored in objects which move
7.	Chemical energy is stored as...?	chemicals waiting to react
8.	A battery is a store of _____ energy.	chemical
9.	Food is a store of _____ energy.	chemical

10.	A moving object is a store of _____ energy	Kinetic
11.	What is a gravitational potential store?	Energy stored in objects raised up against the force of gravity.
12.	A rock at the top of a hill is a store of _____ energy.	Gravitational potential
13.	What is an elastic potential store?	Energy stored in an object which has been stretched or compressed.
14.	A compressed spring is a store of _____ energy	Elastic potential
15.	An inflated balloon is a store of _____ energy	Elastic potential
16.	The internal energy store is...	Energy stored in the movement of particles.
17.	The internal energy store of an object can be changed by...?	Heating or cooling
18.	Energy stored in the nuclei of atoms is in the _____ store.	Nuclear
19.	List the 4 energy transfer pathways.	Mechanical, electrical, radiation and heat.
20.	Mechanical transfer is...?	The energy transfer when a force moves through a distance
21.	What is the type of energy transferred when a force moves through a distance?	Mechanical transfer
22.	Electrical transfer is...?	Energy transferred when a charge moves due to a potential difference
23.	What is the energy transferred when a charge moves?	Electrical transfer
24.	Radiation transfer is...?	The energy transferred as a wave.
25.	Heat transfer is...?	Energy transferred due to a temperature different.
26.	State the equation that links work done, force and distance	Work done = Force x Distance
27.	What is force measured in?	Newtons (N)
28.	What is work done measured in?	Joules (j)
29.	State the principle for the conservation of energy	Energy cannot be created or destroyed; it can only be transferred from one store to another.
30.	State equation linking kinetic energy, mass and velocity	$E_k = 0.5 \times \text{mass} \times \text{velocity}^2$ $E_k = \frac{1}{2} mv^2$
31.	What are the units of mass?	Kilograms (kg)
32.	What are the units of velocity?	metres per second (m/s)
33.	Calculate the kinetic energy of a man and a skateboard have a combined mass of 120kg and travel at a velocity of 5 m/s	$m = 120\text{kg}$ $v = 5\text{m/s}$ $E_k = \frac{1}{2} mv^2$ $E_k = \frac{1}{2} \times 120 \times 5^2$ $E_k = 1500\text{j}$
34.	Calculate the kinetic energy of a fish with a mas 2kg and swimming at a velocity of 2.5 m/s	$m = 2\text{kg}$ $v = 2.5\text{m/s}$ $E_k = \frac{1}{2} mv^2$ $E_k = \frac{1}{2} \times 2 \times 2.5^2$ $E_k = 6.25\text{j}$
35.	State two ways to increase the kinetic	Increase its speed

	energy of an object	Decrease its mass
36.	State the equation linking gravitational field strength, gravitational potential energy, and height	$E_p = \text{mass} \times \text{gravitational field strength} \times \text{height}$ $E_p = mgh$
37.	What are the units of gravitational field strength?	Newtons per kilogram (N/kg)
38.	What are the units for height?	Meters (m)
39.	What is Earth's gravitational field strength?	9.8N/kg
40.	State two ways to increase the gravitational potential energy of an object	Increase its height Increase its mass
41.	What does k stand for in the following equation? $E_e = \frac{1}{2} \times k \times e^2$	Spring constant
42.	The higher the spring constant...	the stiffer the spring
43.	What is the unit for spring constant	Newtons per meter (N/m)
44.	What does e stand for in the following equation? $E_e = \frac{1}{2} \times k \times e^2$	extension
45.	What is the unit for extension?	Meters (m)
46.	Define specific heat capacity?	The amount of energy required to raise the temperature of 1kg of substance by 1oC
47.	What does c stand for in the following equation? $E = m \times c \times \theta$	Specific heat capacity
48.	What does θ stand for in the following equation? $E = m \times c \times \theta$	Temperature change
49.	What is the unit for specific heat capacity?	J/kg°C
50.	When investigating specific heat capacity, what apparatus is used to measure temperature change?	Thermometer
51.	When investigating specific heat capacity, what apparatus is used to measure the mass of the block?	Balance
52.	When investigating specific heat capacity, why is the metal block wrapped in insulation?	Reduce energy being dissipated which will give a more accurate temperature reading
53.	What is the equation linking energy transferred, power and time?	Power = energy ÷ time $P = E \div t$
54.	What is the units of power?	Watts
55.	What is the units of time?	Seconds
56.	What is the definition of power?	Power is the rate of transfer of energy (work)
57.	Define efficiency	A measure of how much useful work a system performs. It is the ratio of useful work to total energy supplied
58.	What is the equation for calculating efficiency from energy?	Efficiency= useful energy output ÷ total energy input
59.	What is the equation for calculating efficiency from power?	Efficiency= useful power output ÷ useful power input

60.	Can an object or system be 100% efficient?	No
61.	State three ways to increase the efficiency of an object	Streamlining the object, Lubricating the object and Insulating the object
62.	State the three fossil fuels	Coal, Oil and Gas
63.	How are fossil fuels formed?	From fossilised dead plants and animal over millions of years
64.	State one non-renewable energy source that isn't a fossil fuel	Nuclear
65.	State the stages in a coal power station in order	Boiler – Turbine – Generator – National Grid
66.	Coal, oil and gas are stores of which type of energy?	Chemical
67.	State two advantages of using fossil fuels to generate electricity	Any from: Reliable, cost effective, Can meet the base load, can quickly respond to change in demand
68.	State two disadvantages of using fossil fuels to generate electricity	Any from: produces carbon dioxide (global warming), supplies of fuels are running out, produces sulphur dioxide (acid rain)
69.	State the two nuclear fuels	Uranium and Plutonium
70.	State how a nuclear power station is different to a coal power station?	Nuclear fission used to heat water into steam rather than burning of coal
71.	State two advantages of using nuclear fuel to generate electricity	Any from: Doesn't produce carbon dioxide or sulphur dioxide, reliable, produces a larger amount of energy compared with fossil fuels
72.	State two disadvantages of using nuclear fuel to generate electricity	Any from: produce nuclear waste with is difficult to dispose of, non-renewable energy source and potential for a nuclear disaster
73.	What is a reliable energy source?	One which can be used to produce electricity at all times
74.	State the different types of renewable energy resources	Hydroelectric Power, Wave Power, Tidal Barrages, Biofuels, Wind Power, Solar Cells and Geothermal Power
75.	When are biofuels considered renewable?	When trees are planted to compensate for the biofuels
76.	State two advantages of biofuels	Carbon neutral and reliable
77.	State two disadvantages of biofuels	Production of biofuel can damage ecosystems and reduce variety of crops grown
78.	State two advantages of wind power	Any from: No carbon dioxide produced, No fuel costs and renewable
79.	State two disadvantages of wind power	Any from: unreliable, expensive to construct and not suitable for all locations
80.	State two advantages of hydroelectric Power	Any from: no carbon dioxide produced, no fuel costs, renewable and reliable
81.	State two disadvantages of hydroelectric Power	Any from: blocks rivers preventing fish migration and expensive to construct
82.	State two advantages of geothermal power	Any from: No fuel costs, no carbon dioxide produced and reliable
83.	State two disadvantages of geothermal power	Any from: Expensive to build and only specific places can have geothermal power stations
84.	State two advantages of tidal power	Any from: No carbon dioxide produced, no fuel costs, renewable and reliable

85.	State two disadvantages of tidal power	Any from: expensive to construct, tidal barrages can damage ecosystem and only suitable for coastal areas
86.	State two advantages of wave power	Any from: No carbon dioxide produced, renewable and no fuel costs
87.	State two disadvantages of wave power	Any from: unreliable, high set up costs and disturb marine ecosystems
88.	State two advantages of solar power	Any from: No carbon dioxide produced, no fuel costs and renewable
89.	State two disadvantages of solar power	Any from: Unreliable, High starting costs and expensive to construct.

Triple Physics Only

1.	Define thermal conductivity	A measure of the rate of energy transfer through a material when it is heated
2.	What do we call materials with a high thermal conductivity?	Conductors
3.	What do we call materials with a low thermal conductivity?	Insulators
4.	State three ways to reduce unwanted energy transfers in the home	Any from: Loft insulation, Double glazing, Draught excluders, Carpeted floors and cavity wall insulation
5.	How does cavity wall insulation reduce energy transfer?	Reduces the amount of energy transferred by conduction as air or foam in the wall is an insulator
6.	How do draught excluders reduce energy transfer?	Stop draughts blowing in and out of rooms, therefore reduces energy transfer by convection.

Religious Education

Islam Beliefs and teachings

Key Words

1. Akhirah – everlasting life after death.
2. Allah – the Arabic name for God.
3. Angels – spiritual beings believed to act as messengers of God.
4. Beneficent – benevolent, all-loving, all-good.
5. Caliph – a person considered to be a political and religious successor to the prophet Muhammad.
6. Day of Judgement – a time when the world will end, and every soul will be judged by God.
7. Fairness – the idea that God treats everyone fairly and impartially.
8. Heaven – the state of eternal happiness in the presence of God; also called paradise. (Jannah)
9. Hell – the state of total separation from God. (Jahannam)
10. Iblis – a spiritual being made of fire, who was thrown out of paradise for refusing to bow down to Adam.
11. Imam – a person who leads communal prayer.
12. Imamate – the divine appointment of the prophets.
13. Immanent – the idea that God is present and involved within the world.
14. Jibril – Arabic name for Gabriel, the archangel who brought God's message to the prophets.
15. Justice – the idea that God is just and fair and judges' humans, rewarding good and punishing bad.
16. Merciful – the quality of God that shows compassion or forgiveness to humans.
17. Mika'il – Arabic name for Michael, the archangel of mercy who rewards and nourishes people.
18. Monotheistic – a religion that believes in only one God.
19. Omnipotent – almighty, having unlimited power.
20. Predestination – the idea that God knows or determines what will happen in the universe.
21. Prophet – a person who proclaims the message of God.
22. Prophethood – when God makes someone a prophet to communicate his message to people.
23. Qur'an – the holy book revealed to Muhammad by the angel Jibril/God's final revelation to humans.
24. Resurrection – rising from the dead or returning to life.
25. Risalah – the belief that prophets are an important channel of communication between God and humans.
26. Shi'a – Muslims who believe in the Imamate, the successorship of Ali.
27. Sunnah – the teachings and deeds of Muhammad.
28. Sunni – Muslims who believe in the successorship to Muhammad of Abu Bakr, Umar, Uthman and Ali.
29. Supremacy – supreme power or authority; a quality of God.
30. Tawhid – the Oneness and unity of God.
31. Transcendent – the idea that God is beyond and outside of life on earth.

ISLAM: Sources of scripture or sacred writings to quote.

*You do not need to quote these words for word;
but try to make reference to them.*

1. The Oneness of God and the Supremacy of God's will: 'Say, "He is God the One, God the eternal. He begot no one nor was he begotten. No one is comparable to Him' (Qur'an 112: 1-4)
2. Key beliefs: Sunni & Shi'a: 'There is only one god: "There is no god save Allah'
3. (Qur'an 47:19)

4. The nature of God: *'The Most Excellent Names belong to God: use them to call on Him'* (Qur'an 7:180)
5. Angels: *'Each person has angels before him and behind, watching over him by God's command'* (Qur'an 13:11)
6. Predestination: *'Only what God has decreed will happen to us. He is our Master: let the believers put their trust in God'* (Qur'an 9:51)
7. Life After Death: *'they will dwell amid scorching wind and scalding water'* (Qur'an 56:42)
8. *'there will be any fruit they choose; the meat of any bird they like...'* (Qur'an 56:20)
9. Prophethood and Adam: *'He taught Adam all the names of things...'* (Qur'an 2:31)
10. Ibrahim: *'Who could be better in religion than those who direct themselves wholly to God, do good and follow the religion of Abraham, who was true in faith? God took Abraham as a friend.'* (Qur'an 4:125)
11. Muhammad and the Imamate: *'Muhammad is not the father of any one of you men; he is God's messenger and the seal of the prophets: God knows everything'* (Qur'an 33:40)
12. The Holy Books of Islam: *'This is the Scripture of which there is no doubt, containing guidance for those who are mindful of God'* (Qur'an 85:21-22)

ISLAM: KEY TEACHINGS

<p>a) The Oneness of God & Supremacy of God's will</p>	<p>One of the most important beliefs of Sunni and Shi'a is Tawhid: the belief that there is only one God. This belief is repeated daily in the Shahadah: 'There is no God but Allah and Muhammad is his prophet'. A Muslim's most important duty is to declare faith in one God; an undivided entity that is unique.</p> <p>God is believed to be the one and only creator and controller of everything; therefore, nothing takes place unless God allows it to happen. No matter whether something is good or bad it is down to God's will. Muslims will try to accept the bad things in life as 'meant to be'</p>
<p>b) Key beliefs: Sunni & Shi'a</p>	<p>When Muhammad died, Islam divided into denominations with different beliefs.</p> <p>Sunni: 6 articles of faith. There is only one God. Angels communicate messages. The Qur'an holds highest authority. Muhammad: most important prophet. The Day of Judgement is where all humanity will be judged. The Supremacy of God's will; God controls what will happen.</p> <p>Shi'a: 5 roots of 'Usul ad-Din' Tawhid: God is One. Prophethood: Muhammad is God's last prophet. God is just and wise. The Imamate: accepting the 12 imams. Resurrection to be judged.</p>
<p>c) The Nature of God</p>	<p>Muslims believe that God revealed himself to people through Muhammad and the holy books. There are 99 names of God in the Qur'an and Hadith. Each name describes a quality that God has revealed about himself.</p> <p>Muslims believe that God is immanent, transcendent, omnipotent, beneficent, merciful, fair and just.</p> <p>Every day Muslims hear and say the words 'Allahu Akbar' meaning 'God is the greatest'. Muslims believe that God is so great he is beyond human understanding, and greater than anything humans can imagine.</p>

d) Angels	<p>Muslims believe that angels bring the direct word of God to the prophets or messengers of God. For Sunni, the belief in angels is one of the 6 articles.</p> <p>Angels are part of the unseen world. They are supernatural beings, created by God from light.</p> <p>Angels are involved in the lives of Muslims from conception until death. The angel Israfil will blow a trumpet to announce the Day of Judgement.</p> <p>Jibril – archangel who delivered the Qur'an to Muhammad. He is the angel most familiar to Christians & Jews too.</p> <p>Mika'il – archangel of mercy who will reward righteous people. Mika'il also has responsibility for sending rain, thunder, and lightning to earth.</p>
e) Predestination	<p>This is the idea that God knows or determines everything that will happen in the universe.</p> <p>Sunni Muslims believe that God has already determined everything that will happen and has been written down in the book of decrees.</p> <p>Shi'a Muslims believe that God knows everything that is going to happen, but he does not decide for us. Humans have been given free will.</p> <p>As God has given humans free will, they themselves are responsible for whether God rewards or punishes them for the choices they have made.</p>
f) Life After Death	<p>Many Muslims believe that after death the person still has a conscious existence in the grave. Here they will enter a state of waiting called 'barzakh', which means a barrier.</p> <p>Muslims believe that a day will come when God's purpose for the universe has been fulfilled. Only God knows when that will be. The present world will be totally transformed into a new world 'Akhirah' – everyone who ever lived will be raised from the dead.</p> <p>Belief in life after death encourages a person to be responsible for their actions with the reward of heaven or the punishment of hell.</p>
g) Prophethood and Adam	<p>Muslims believe that God has chosen many prophets to bring the message of Islam to people. This belief is known as Risalah.</p> <p>Prophethood – when someone is made a prophet – is a gift from God.</p> <p>Adam was believed to be the first man on earth and the first prophet of Islam. He was created by God from the dust of the ground, he is regarded as the Father of humans and is therefore treated with respect.</p> <p>Adam is important to Muslims as a prophet because God gave him understanding and Adam in turn passed on his knowledge to the rest of humans through his descendants.</p>
h) Ibrahim	<p>Ibrahim is the Arabic name of the prophet Abraham. Muslims believe that he fulfilled all the tests and commands given to him by God.</p> <p>The Qur'an presents Ibrahim as a role model because of his obedience to God, his kindness and compassion and his refusal to worship idols.</p> <p>Many Muslims believe that Ibrahim had a dream in which God asked him to sacrifice his son to him. God did not take the boy although Ibrahim was willing to sacrifice him, showing his obedience.</p> <p>Ibrahim is an important religious figure in Islam, Christianity and Judaism; for this reason, they are called the 'Abrahamic religions'.</p>

<p>i) Muhammad and the Imamate</p>	<p>Muslims believe that Muhammad received the final revelation of Islam from God. He is known as the last and greatest of the prophets. Whilst meditating on Mount Hira Muhammad was visited by the angel Jibril with a message from God. Over the next 22 years he received further messages that were combined to make the Qur'an. When Muhammad died it was not clear who should succeed him. Muslims split into two groups – Sunni and Shi'a. Abu Bakr was the first Caliph for Sunni and Ali was the first Imam for Shi'a. Shi'a believe that there have been 12 Imams in total – the last still alive and hidden by God on earth.</p>
<p>j) The Holy Books in Islam</p>	<p>Muslims believe that the Qur'an is the divine word of God. It contains the foundation of every believer's faith and is the most sacred text of Islam. The name Qur'an means 'the Recital', as Muhammad recited by heart each revelation he received and passed on. The Qur'an contains 114 Surahs (chapters) and Muslim children are encouraged to learn Arabic so that they can read the Qur'an in its original language. Muslims believe that there are other holy books that have been revealed by God. These include the Torah (revealed to Moses), the Psalms (revealed to David), and the Gospel (revealed to Jesus).</p>

Christianity Beliefs and teachings Key Words

1. **Afterlife** – what Christians believe follows life on earth.
2. **Ascension** – the event, 40 days after the resurrection when Jesus rose to heaven, to return to God.
3. **Atonement** – restoring the relationship between humans and God through Jesus.
4. **Blasphemy** – a religious offence which includes claiming to be God.
5. **Creation** – the act by which God brought the universe into being.
6. **Crucifixion** – Roman method of execution by which criminals were fixed to a cross.
7. **Day of Judgement** – a time when the world will end, and every soul will be judged by God.
8. **Denomination** – a sub-group within a religious faith with its own traditions.
9. **Forgiveness** – showing grace and mercy and pardoning someone for doing wrong.
10. **Grace** – a quality of God shown to humans by providing love and support that is unearned.
11. **Heaven** – a state of eternal happiness in the presence of God.
12. **Hell** – the place of eternal suffering. The state of being without God.
13. **Holy** – separate and set apart for a special purpose by God.
14. **Holy Spirit** – believed by Christians to be the inspiring presence of God in the world.
15. **Incarnation** – becoming flesh, taking a human form.
16. **Justice** – bringing about what is right and fair.
17. **Monotheistic** – a religion that believes there is only one God.
18. **Omnibenevolent** - the belief that God is all-loving.
19. **Omnipotent** – the belief that God is all-powerful.
20. **Original Sin** – everyone being born with a built-in urge to do bad things and disobey God.
21. **Purgatory** – a state where souls are cleansed to enter heaven.
22. **Resurrection** – rising from the dead/the event of Jesus rising from the dead on Easter Sunday.
23. **Salvation** – saving the soul, deliverance from sin and admission to heaven through Jesus.
24. **Satan** – name for the Devil – the power and source of evil.
25. **Sin** – any action or thought that separates humans from God/behaviour against God's laws.
26. **The Word** – term used at the beginning of John's gospel to refer to the Son of God.
27. **Trinity** – the belief that there are three 'persons' in the One God. (Father, Son & the Holy Spirit)

CHRISTIANITY: Sources of scripture or sacred writings to quote.

*You do not need to quote these word for word.
but try to refer to them.*

1. **The Nature of God:** *'I am the Lord your God...you shall have no other Gods before me'*
2. **(Exodus 20:2-3)**
3. **God as omnipotent, loving and just:** *'Nothing is impossible with God' (Luke 1:37)*
4. **The Oneness of God and the Trinity:** *'Go therefore and make disciples of all the nations, baptizing them in the name of the Father and the Son and the Holy Spirit...'* **(Matthew 28:19)**
5. **Beliefs about creation:** *'In the beginning, God created the heavens and the earth'* **(Genesis 1:1)**
6. **The Incarnation of Jesus:** *'The Word became flesh and made his dwelling among us'* **(John 1:14)**
7. **The Crucifixion:** *'Jesus called out with a loud voice, "Father, into your hands I commit my spirit." When he had said this he breathed his last'* **(Luke 23:46)**
8. **The Resurrection and Ascension:** *'While he was blessing them, he left them and was taken up to heaven'* **(Luke 24:51)**
9. **Resurrection and life after death:** *'Jesus said to her, "I am the resurrection and the life. The one who believes in me will live, even though they die; and whoever lives by believing in me will never die.'* **(John 11:25-26)**
10. **The afterlife and judgement:** *'And he will come to judge the living and the dead'*
11. **(The Apostles Creed)**
12. **Heaven and Hell:** *'And they will go away into eternal punishment, but the righteous into eternal life'* **(Matthew 25:46)**
13. **Sin and Salvation:** *'for all have sinned and fall short of the glory of God'* **(Romans 3:23)**
14. **The role of Christ in salvation:** *'For the wages of sin is death, but the gift of God is eternal life in Christ Jesus our Lord'* **(Romans 6:23)**

CHRISTIANITY: Key Teachings

a. The Nature of God	Christianity is a monotheistic religion – all Christians believe that there is one God. God is the creator and sustains all that exists. Although God is referred to as 'he' and 'Father' Christians do not believe that God is male. God shows ideas of male characteristics; power and strength as well as ideas of female attributes; love and care. The Bible says that God is 'spirit' and does not have flesh and bones. It also says that Jesus as God's son was the exact representation of God on earth.
b. God as omnipotent, loving & just.	As ' omnipotent ' there is nothing that God cannot do or achieve. For Christians, the idea that God is benevolent ; all loving, is very important. They believe that God loves humans and wants what is best for them. Many questions why a loving God would allow people to suffer. God is the perfect giver of justice ; he decides what is right or wrong and judges a person's character.
c. Oneness of God & the Trinity	The concept of the Trinity is that there are three 'persons' all of which are God. The Father, the Son, and the Holy Spirit. They are all God and so the idea of the Oneness of God should not be forgotten. The Trinity describes all three of the following at once. <ul style="list-style-type: none">• There is only one God.• Each 'person' is fully God.• Each 'person' is not the same. God the father shows that he is responsible for creation and cares for humans. God the Son refers to God incarnate as Jesus, and the Holy Spirit is the unseen power of God guiding life

d. Beliefs about creation	<p>Christians believe that God created the world and all living things on it. Genesis 1 states that God created the world and everything in it including humans in 6 days; on the 7th he rested. Everything that was created was 'good'.</p> <p>Some Christians believe that God did not literally make the world in 6 days and that the story is a metaphor.</p> <p>Biblical accounts mention the Trinity being present; the Holy Spirit hovered over the waters and Jesus (the Word) was also involved in creation.</p>
e. The incarnation of Jesus	<p>The gospels of Matthew and Luke clearly explain the Mary did not conceive Jesus sexually. In each account an angel appears to explain that the conception was not ordinary, and the child will be special.</p> <p>The virgin birth gives evidence that Jesus is incarnate – made flesh in human form, fully God yet fully human. This belief makes it easier for humans to accept the truth of his actions, including miracles and resurrection.</p> <p>Jesus is believed to be the Messiah – a spiritual one.</p>
f. The crucifixion	<p>Jesus was sentenced to death by crucifixion. Being fully human meant that Jesus experienced the pain of his death. He forgave the guards who crucified him as they did not realise what they were doing.</p> <p>Christians accept Jesus' sacrifice as sin can no longer destroy their lives as God forgives those who ask.</p> <p>Due to the Sabbath day of rest there was not enough time to bury Jesus properly, he was laid in a tomb and a stone blocked the entrance</p>
g. The resurrection & ascension	<p>On the Sunday morning, Jesus' body was to be anointed but was nowhere to be found.</p> <p>Over the next few days /weeks, Jesus appeared to several people telling them that he had risen from the dead as predicted.</p> <p>Jesus had the special power of God to rise from the dead, so many believe that he had the power to rise physically from earth and return to heaven. After meeting his disciples and asking them to carry on his good work, Jesus left them for the last time.</p> <p>The resurrection shows the power of good over evil and is proof of life after death.</p>
h. Resurrection & life after death	<p>Some Christians believe that a person's soul is resurrected soon after death. Others believe that when Jesus returns to earth as a judge; the dead will be raised.</p> <p>The Catholic and Orthodox Church are clear that resurrection will be a bodily one – the soul and body will reunite in a 'glorified state' with no suffering.</p> <p>Believing in life after death affects how Christians live their life; aiming to please God and live for eternity in His Kingdom. This means that they will fulfil the duties of a good Christian.</p>
i. The afterlife & judgement	<p>Christians believe that humans receive eternal life as a gift from God. It either begins upon death or at the Day of Judgement – when Jesus will come to judge the living and the dead.</p> <p>God decides the fate of those who die based on how they have tried to get close to him.</p> <p>The parable of the sheep and the goats describes how God will separate the good from the bad as a shepherd separates his flock.</p> <p>To access heaven, Christians believe they should follow the teachings of Jesus closely, along with treating other people well.</p>
j. Heaven & Hell	<p>The result of judgement for Christians is that they can experience the presence of God eternally (heaven) or God's absence (hell).</p> <p>Catholics believe in a state called purgatory where some souls wait to</p>

	<p>receive their place in heaven. Heaven is seen as a place of peace, joy and freedom from pain and a chance to be with loved ones already there. Hell is seen as a place of eternal suffering, terror, fire, and torture ruled by Satan. It is unclear whether these places are spiritual or physical.</p>
<p>k. Sin & Salvation</p>	<p>Sin is any actions or thought that separates humans from God. The idea of original sin (from Adam & Eve) leads Christians to believe that all humans commit sins as nobody is perfect. Humans are tempted by the devil to do things that displease God. God gave humans free will to choose how they live their lives. Sinful choices will separate them from God. Salvation means to be saved from sin and enables humans to be close with God again. A person achieves salvation by having faith in God.</p>
<p>l. The role of Christ in salvation</p>	<p>Jesus' death makes up for the original sin committed by Adam and Eve and brings people back to God. Jesus knew that his death was necessary to restore the relationship between God and man. Christians believe that through Jesus' death and resurrection, humans can receive forgiveness for sin, get close to God and receive eternal life. Jesus rising from the dead shows that God accepted Jesus' sacrifice as atonement.</p>

Geography

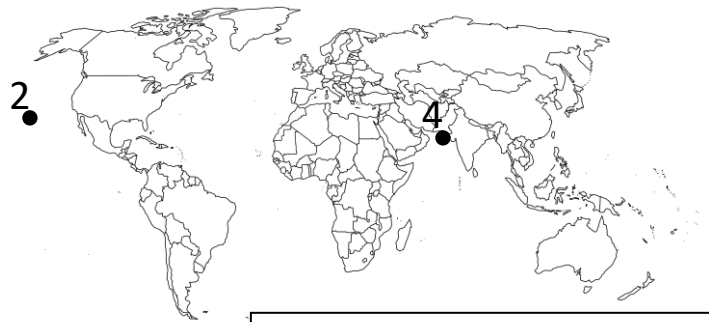
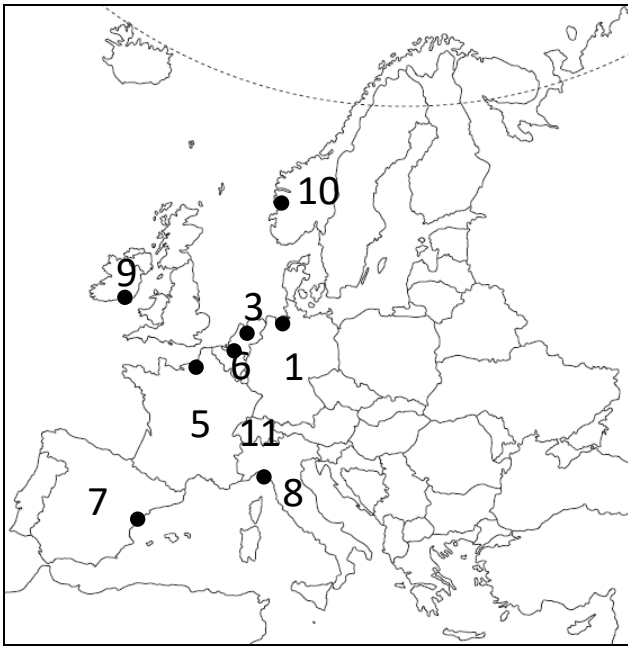
KO Section	Knowledge
1	<p>Continent: a large mass of land. The Earth is broken up into 7 major continents.</p> <p>Physical factor: events and processes that cannot be controlled by people. Natural events.</p> <p>Human factor: events and processes that are controlled by people.</p> <p>BIG QUESTION: How do physical and human factors influence places: Physical factors such as climate and relief create challenges for people which restrict population levels in certain places? Whilst human factors such as employment create opportunities which boost population levels in certain places.</p>
2	<p>Population: is the number of people living in a certain location.</p> <p>Rapid Growth: refers to a fast change in a population.</p> <p>Distribution: is the pattern created by a process or phenomenon.</p> <p>Population Density: the measure of how many people are located within a designated area.</p> <p>Sparse Population: a population which is spread out.</p> <p>Dense Population: a population which is packed and close together.</p>
3	<p>Challenge: a difficult or problem present in a location.</p> <p>Global Challenge: a difficulty or problem which affects many countries at the same time.</p>
4	<p>Hypothesis: a statement which is investigated to establish whether it is true or false.</p> <p>Contrast: the process of establishing similarities and differences between processes or places.</p> <p><u>CHINA FACT FILE:</u></p> <ul style="list-style-type: none"> • <i>China is an NEE.</i> • <i>Population of 1.3billion.</i> • <i>Population prediction of 1.4 billion in 2030.</i> • <i>56% of the population of China are found in urban areas (compared to a global average of 55%)</i> • <i>Life Expectancy in China is 76 years (compared to a global average of 70 years).</i>
5	<p>Quality of Life: refers to the health and happiness of a person based on their access to resources.</p> <p>Deprivation: a word to describe people who do not have the resources or money they need in order to be healthy.</p> <p>Affluence: a word to describe people who have more money than they require to be healthy.</p> <p>Development Measures: are statistics used to judge the development level of a country.</p> <p>Relief: the height and shape of land. Land can either be mountainous or flat.</p> <p>Landlocked: a country which has no coastline.</p> <p>Trade: the exchange of resources, products or services in exchange for cash.</p>
6	<p>Exploitation: is the process of taking advantage of someone or something.</p> <p>Pollution: refers to unwanted chemicals present in a place.</p>

	Hazard Event: an event with the ability to cause harm.
7	Employment: the percentage of people in a place with a job. Economy: the industries in an area which create employment and wealth.
8	Ecosystem: a community of plants and animals living in a certain area. Global Ecosystem: a large-scale ecosystem which covers a large section of the planet.
9	Producers: the elements (vegetation) that create food in an ecosystem. Consumers: an organism within an ecosystem that eats another element (either plant or animal) Decomposers: organisms in the ecosystem that recycle dead material. Food Chain: this is a simple diagram to show how one species in each layer of an ecosystem links. Food Web: this is a more complex diagram which shows how all the elements of an ecosystem link together. <u>UK Ecosystem EXAMPLE</u> <ul style="list-style-type: none"> • Epping Forest • Deciduous Woodland Ecosystem. • North East of London.
10	Abiotic: the non-living parts of an ecosystem e.g. Water. Biotic: the living elements of an ecosystem. Nutrient Recycle: the system within an ecosystem which transfers nutrients from one Equilibrium: is the balance between elements in an ecosystem.
11	Physical Characteristics: this is a natural feature of an area or element of an area. Humid Climate: a hot and wet climate. Flora: another words for plants/vegetation. Fauna: another word for animals. Forest Floor: the ground layer of the rainforest. Canopy: the largest layer of the rainforest made up of the leafy tree tops. Under Canopy: a layer of leafy tree tops between the forest floor and canopy. Emergent: trees which are extremely tall and grow through and out of the canopy layer.
12	Biodiversity: the range of plants and animals in a location. Leaching: the process of nutrients being washed out of the soil. Leaf Litter: dead material from plants and animals which collects on the forest floor. This material breaks down to release nutrients.
13	Adaptation: a change in the physiology or behaviour of an animals which helps it adapt to cope with the challenges of an environment. Buttress Roots: large roots at the base of emergent trees which help give them stability. Climbers: plants which wrap around trees to grow upwards and gain more sunlight. Epiphytes: plants which grow on the surface of other plants and collect nutrients from the air. Parasitic Plants: plants which grow on other plants and collect nutrients from this large plant.
14	Subsistence Farming: the process of farming to feed yourself and your family. Commercial Farming: the process of farming to generate a profit. Plantations: large scale farms which generally grow only one crop. For

	<p>example, rubber or banana plantations. Logging: the process of deforesting areas to generate a profit. Mineral Extraction: the process of removing raw materials from the ground in order to generate a profit. Energy Development: the process of using an area or an areas resources to generate electricity.</p> <p><u>Rainforest CASE STUDY: Amazon</u></p> <ul style="list-style-type: none"> • The largest tropical rainforest in the world. • Located in South America. • The majority of the rainforest is located in Brazil. • Commercial and Traditional (subsistence) deforestation takes place, though the majority (99%+) is commercial. • Illegal and legal deforestation takes place. • Deforestation increases wealth and employment. • Deforestation reduces biodiversity and increases the rate of climate change. • Deforestation has led to the decline of indigenous tribes.
15	<p>Impact: an effect or outcome created by an event or process. Economic Development: the process of a country and people within that country becoming wealthier. Soil Erosion: a reduction in the volume of soil in an area as the soil has been washed or blown away. Climate Change: a change in the normal weather patterns of an area. For example, more flood or drought events.</p>
16	<p>Sustainable Management: the process of managing an area so it will continue to exist in the future. Selective Logging & Replanting: this is the process of deforesting only certain species of trees and replanting tress which are deforested. Conservation and Education: this is the process of saving resources and informing people about the benefits of this strategy. Ecotourism: tourist activities which use the natural environment as the main attraction for tourism. International Agreements (hardwoods): agreements between countries not to deforest certain species of tree for economic gain. International Agreements (Debt Relief): HICs agree to cancel debts owed to them by LICs and in exchange LICs agree to preserve large areas of rainforest.</p>
17	<p>Road Building: the process of constructing roads. Population Growth: the process of the population growing due to natural increase and migration. Settlement: an area where people live. This can range from villages to megacities.</p>

18. Geography Place Knowledge

Map to show the countries with major trade links with the UK



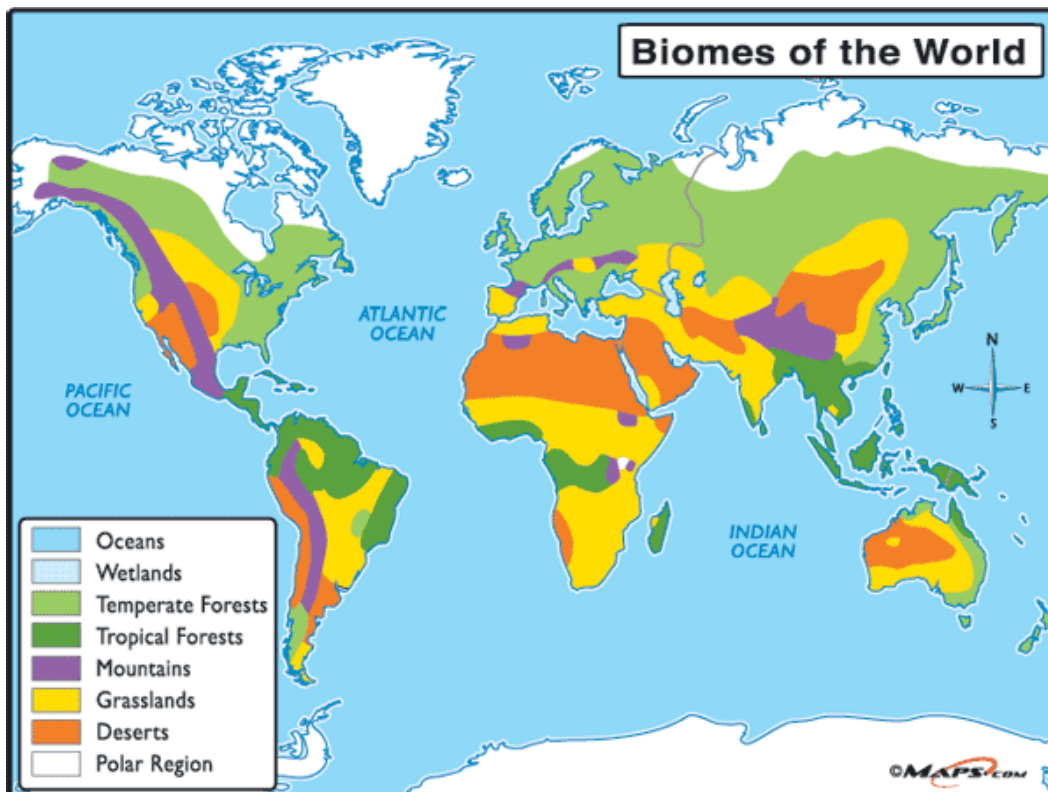
Country & major port (dot on map)

- 1= Germany (Hamburg)
- 2= USA (Houston, Texas)
- 3= Netherlands (Amsterdam)
- 4= China (Shenzhen)
- 5= France (Le Harve)
- 6= Belgium (Anvers)
- 7= Spain (Valencia)
- 8= Italy (Genoa)
- 9= Ireland (Cork)
- 10= Norway (Bergen)

Note: 11 countries are identified on the map.

Switzerland is in the top 10 of countries importing goods from the UK, but is not in the top 10 countries exporting to the UK. Belgium is in the top 10 of countries exporting to the UK, but is not in the top 10 of countries importing from the UK.

Map the major Biomes (Ecosystems) of the World.



History

PP1 History: Health & the People (the Middle-Ages & the Renaissance periods)

1	<p><u>The Middle-Ages (c.1000-1500)</u></p> <ul style="list-style-type: none">• <u>Hippocrates & Galen</u> – Four humours (blood, phlegm, yellow bile and black bile). Their ideas came to Europe via Constantine the African.• <u>The Church</u> – believed Galen's ideas were near to perfect. This was because Galen had spoken about a creator of all things. Those who questioned Galen's ideas could be arrested – eg the 13th century monk, Roger Bacon. In Europe religion shaped the development of medicine. Here medical research was not encouraged.• <u>What did people at this time think caused illness?</u> – the average person saw illness as a punishment from God. Physicians saw illness as due to a built up of a humour in the body. The aim was to rebalance the body through purging or bleeding.• <u>How did they seek to treat the victims of disease?</u> Purging, going on pilgrimage, praying, visiting an apothecary or wise woman.• <u>Hospital building</u> – between 1000-1500AD the Church build 700 hospitals.
Box 1 Questions	<ol style="list-style-type: none">1. Name each of the four humours.2. Why was Constantine the African important?3. Why was Roger Bacon arrested?4. Name two beliefs held that explained the cause of disease.5. Name two ways people in the Middle-Ages treated disease.6. How many hospitals did the Church build in this period?
2	<p><u>The significance of Islamic medicine.</u></p> <ul style="list-style-type: none">• Here the role of individual physicians shaped the development of medicine.• Al-Zahrawi used over 200 surgical tools and invented cat guts stitches. He also made 27 of his own surgical tools.• Rhazes wrote a book called Doubts about Galen.• Ibn-Nafis discovered the circulation of the blood 300 years before William Harvey.• Avicenna wrote an influential book on medicine (the Canon) which was in use still in the 18th century.• Islamic hospitals – Cairo hospital could treat 8000 patients. Wards treated patients with similar illnesses.
Box 2 Questions	<ol style="list-style-type: none">1. Name one contribution of Al-Zahrawi to medicine.2. Whose ideas did Rhazes question?3. What was Ibn-Nafis' contribution to the development of medicine?4. Why was Avicenna influential?5. What was significant about the hospital in Cairo?
3	<p><u>Surgery in the Middle-Ages</u></p> <ul style="list-style-type: none">• Surgery – in Europe, in towns barber surgeons performed bleeding and minor surgeries such as tooth extraction. They also could amputate limbs and offer trepanning. Barber surgeons learnt their trade as apprentices.• Universities – surgeons learnt from reading Galen. They did not do practical learning on patients. Universities such as Padua in Italy and Paris were important places for surgeons to learn. These surgeons had to pass exams over a seven-year period.• Battlefield surgeons – had to be inventive under challenging conditions. For example John Bradmore had to develop a new arrow pulling device to pull an arrow from the face of the future Henry V.

	<ul style="list-style-type: none"> Also, John of Arderne used his skill as a battle-field surgeon to treat patient with fistulas, 50% of his patients survived his surgeries.
Box 3 Questions	<ol style="list-style-type: none"> List three services a barber-surgeon could offer? Which two universities could train surgeons? How long was the training period for a university trained surgeon? What was John of Arerne's contribution to the development of medicine?
4	<p><u>The Black Death</u></p> <ul style="list-style-type: none"> The Black Death – visited England in 1348. Several outbreaks occurred until 1400. By this year 33%-50% of England's population had died due to the Bubonic Plague. <u>What did physicians think caused it?</u> – the University of Paris explained that it was a miasma that had come from the movement of the planets. Others said it was a punishment from God for the sins of the victims. <u>How did physicians and ordinary people try to heal victims?</u> – An amazingly strange range of cures were tried such as ten-year-old treacle, placing frogs on buboes. A mixture of figs, onions and butter on buboes and sitting in open sewers. Flagellants whipped themselves hoping God would see that as punishment enough for their sins. This way they hoped to avoid become victims of the Black Death.
Box 4 Questions	<ol style="list-style-type: none"> In what year did the Black Death come to England? What is the medical name for the Black Death? What percentage of the English population did it probably kill? What did the University of Paris say about its origins? Name two treatments used to attempt to treat victims? Why did flagellants whip themselves?
5	<p><u>Public health in towns & monasteries</u></p> <ul style="list-style-type: none"> <u>Towns</u> - the quality of sanitation was poor in towns. Open sewers existed where human waste from houses ended up. This was then put in cesspits. Towns were breeding grounds for disease e.g. the Black Death spread in the unhygienic town conditions. Worcester council tried to clean up streets in 1466 by banning businesses (e.g. butchers) from dumping waste in the streets. In <u>monasteries</u> monks saw hygiene as a sacred duty. They had infirmaries where the sick were treated. They believed in the doctrine of signatures which said that a cure for all sickness could be found if the correct plant was used to treat the sick. They had a good standard of sanitation compared to towns which – lavatoriums flushed waste into rivers.
Box 5 Questions	<ol style="list-style-type: none"> What was a cesspit? How did Worcester council act in 1466 to try to clean the streets of Worcester? Why did monks seek to be hygienic? What was an infirmary? Describe the doctrine of signatures. What was a lavatorium?
6	<p><u>Renaissance (1500-1700)</u></p> <ul style="list-style-type: none"> <u>The Renaissance</u> – a period in Europe where some physicians began to question Galen's ideas and use enquiry to discover the true nature of the world. However, for the majority of people, religious ideas still influenced how they saw medicine. <u>Vesalius</u> – produced an influential book (the Fabrica) of his anatomical drawings of the human body. He questioned Galen's ideas – e.g. noted Galen dissected only animals and that Galen's belief that human kidneys were the same as monkeys (one higher than the other) was wrong. Vesalius was a huge influence on John Hunter. This is a great example of how communication affected the development of

	<p>medicine as others were influenced by Vesalius – e.g. John Hunter.</p> <ul style="list-style-type: none"> • Pare – a battlefield surgeon. Developed a paste to cover cauterised wounds. Pare also used ligatures to tie arteries which stopped blood loss. Also, he developed artificial limbs. He is an excellent example of how warfare helped individuals to develop medicine. • William Harvey – this British physician of the early 17th century used scientific method to discover how the blood pumped around the body. He waited 12 years before he published his ideas because he feared being laughed at. This was because he questioned Galen’s ideas. It took the University of Paris 50 years to accept his finding.
Box 6 Questions	<ol style="list-style-type: none"> 1. <i>What was the Renaissance?</i> 2. <i>What was Vesalius’ book of anatomical drawings?</i> 3. <i>Name one mistake Vesalius said Galen had made.</i> 4. <i>List two ways Pare helped the development of medicine.</i> 5. <i>What did William Harvey discover?</i> 6. <i>Why did Harvey wait 12 years to publish his discovery?</i>
7	<p><u>Beliefs about the causes of disease & treatments used in the Renaissance</u></p> <ul style="list-style-type: none"> • How were ordinary people treated? In this period most people visited a barber surgeon, apothecary, wise woman (sometimes) or a quack (an unqualified doctor). • New plants were used following the discovery of the Americas such as quinine to treat malaria. At this time Nicholas Culpepper published his book of herbal remedies which spread knowledge during a time where more and more books were published. • The Great Plague (1665) As with the Black Death it was believed the plague spread through miasma. Also, the movement of the planets was still seen as a cause by physicians. Germ theory would not be discovered for a further 200 years so again physicians were powerless to stop the plague spreading. • In London in 1665 100,000 people died. Treatments used were; building bonfires to stop miasma, quarantining and stopping public gatherings of people.
Box 7 Questions	<ol style="list-style-type: none"> 1. <i>Where would ordinary people go in the Renaissance for treatment (name two places)?</i> 2. <i>How did Nicholas Culpepper contribute to the development of medicine?</i> 3. <i>What two ways were given to explain the causes of the Great Plague?</i> 4. <i>How many died in London in 1665 as a result of the Great Plague?</i> 5. <i>List two treatments used to try to stop the Great Plague spreading.</i>
Extension tasks to help you develop a deeper understanding of the topic.	
Box 1	<p>Explain the significance of Hippocratic & Galenic ideas in the development of medicine. [8 marks]</p>
Box 2	<p>Explain the significance of Islamic medicine in the development of medicine. [8 marks]</p>
Box 5	<p>Explain the significance of Vesalius medicine in the development of medicine. [8 marks]</p>
Boxes 6 & 7	<p>Plan & create a mind map of Renaissance medicine. It might help to concentrate on beliefs about causes, treatments, surgery and anatomy and public health.</p>

French

	English:	French:
	<i>What is your relationship like with your family?</i>	<i>Comment sont tes relations avec ta famille?</i>
1	I am called Marc and I live in Paris.	Je m'appelle Marc et j'habite à Paris.
2	She is called Lara and she lives in France.	Elle s'appelle Lara et elle habite en France.
3	My brother is called Henri and he is 15.	Mon frère s'appelle Henri et il a 15 ans.
4	Her sister is called Anna and she is 13.	Sa sœur s'appelle Anna et elle a 13 ans.
5	There are 5 people in my family.	Il y a cinq personnes dans ma famille.
6	Sam lives with his dad at the weekend.	Sam habite chez son père le week-end.
7	My parents are divorced.	Mes parents sont divorcés.
8	My parents let me go out at the weekend.	Mes parents me laissent sortir le week-end.
9	My dad treats me like a baby.	Mon père me traite comme un bébé.
10	I have a good relationship with my parents.	J'ai de bonnes relations avec mes parents.
11	My mum always trusts me.	Ma mère me fait toujours confiance.
12	I don't have a lot of self-confidence.	Je n'ai pas de confiance en moi.
13	My parents suffocate me.	Mes parents m'étouffent.
14	School makes me really stressed.	Le collège me stresse beaucoup.
15	My parents are never happy!	Mes parents ne sont jamais contents !
16	I get on very well with my mum but my dad is too strict.	Je m'entends très bien avec ma mère mais mon père est trop sévère.
17	He is selfish and jealous of everyone.	Il est égoïste et jaloux de tout le monde.
18	Camilla's boyfriend is tall and really funny.	Le petit ami de Camille est grand et vraiment drôle.
19	I am someone kind and hard-working.	Je suis quelqu'un de gentil(le) et travailleur(euse).
20	I live in a single parent family.	J'habite une famille monoparentale.
21	When I was 8 years old, my mum remarried so now I have a step-dad.	Quand j'avais 8 ans, ma mère s'est remariée donc maintenant j'ai un beau-père.
22	I have to share a bedroom with my sister and unfortunately she is a bit annoying.	Je dois partager une chambre avec ma sœur et malheureusement elle est un peu agaçante.
23	My mum's partner is nasty. I find him very selfish.	Le partenaire de ma mère est méchant. Je le trouve très égoïste.
24	I live with my mum and my step-dad because my parents are divorced.	J'habite avec ma mère et mon beau-père car mes parents sont divorcés.
25	I live with my parents and I am an only child. I would like a sister.	J'habite avec mes parents et je suis enfant unique. Je voudrais une sœur.
	<i>Would you like to get married?</i>	<i>Tu voudrais te marier?</i>
26	I love my girlfriend since we have the same interests.	J'adore ma petite amie puisque nous avons les mêmes centres d'intérêt.
27	I would like to get married at the age of 30.	Je voudrais me marier à l'âge de 30 ans.
28	My ideal partner would be kind and funny.	Mon/ma partenaire idéal(e) serait gentil(le) et amusant(e).
29	In the future I would like to have 3 children.	À l'avenir j'aimerais avoir trois enfants.
30	I am not going to get married. I want to stay single.	Je ne vais pas me marier. Je veux rester célibataire.
31	For me, marriage is not important but I would like to live with my partner.	Pour moi, le mariage n'est pas important mais je voudrais habiter avec mon/ma partenaire.
32	I am quite traditional so I am going to get married in a church.	Je suis assez traditionnel(le) donc je vais me marier dans une église.

33	My parents are divorced and in my opinion, separation is difficult for everyone.		Mes parents sont divorcés et à mon avis, la séparation est difficile pour tout le monde.			
34	In the future, I think that I am going to live together without being married.		A l'avenir, je pense que je vais vivre en concubinage.			
35	I want you to know that I will commit to my partner.		Je veux que tu saches que je m'engagerai à mon partenaire.			
36	According to me, marriage is not necessary but you have to have a romantic relationship.		Selon moi, le mariage n'est pas nécessaire mais on doit avoir une relation amoureuse.			
37	I intend to raise my children myself.		J'ai l'intention d'élever mes enfants moi-même.			
38	My friend is happy to be one his own. I think that he will stay single.		Mon copain est heureux d'être seul. Je crois qu'il restera célibataire.			
39	If only there were more time to find an ideal partner.		Si seulement il y avait plus de temps pour trouver un(e) partenaire idéal(e).			
40		avoir (to have)	être (to be)	aller (to go)	faire (to do)	habiter (to live)
	I you he/she/it we you (plural) they	j'ai tu as il/elle/on a nous avons vous avez ils/elles ont	je suis tu es il/elle/on est nous sommes vous êtes ils/elles sont	je vais tu vas il/elle/on va nous allons vous allez ils/elles vont	je fais tu fais il/elle/on fait nous faisons vous faites ils/elles font	j'habite tu habites il/elle/on habite nous habitons vous habitez ils/elles habitent
	<i>What do you think about technology?</i>		<i>Qu'est-ce que tu penses de la technologie?</i>			
41	I prefer my new smartphone because it is a lot lighter.		Je préfère mon nouveau smartphone car il est beaucoup plus léger.			
42	I don't like old phones given that they are too slow.		Je n'aime pas les anciens portables étant donné qu'ils sont trop lents.			
43	I can't live without my smartphone.		Je ne peux pas vivre sans mon smartphone.			
44	In my opinion, computers with a mouse are very old-fashioned.		A mon avis, les ordinateurs avec une souris sont très démodés.			
45	I like to watch programmes on streaming because it's entertaining.		J'aime regarder des émissions en streaming car c'est divertissant.			
46	I am hooked on technology because I use the Internet all the time.		Je suis accro à la technologie car j'utilise Internet tout le temps.			
47	It is important to protect yourself online.		Il est important de se protéger en ligne.			
48	I think that one must not send photos to strangers.		Je pense qu'il ne faut pas envoyer des photos aux étrangers.			
49	Cyber-bullying can be a problem. You must about it talk to an adult.		La cyberintimidation peut être un problème. Il faut en parler avec un adulte.			
50	I have a lot of friends online but they are not real friends.		J'ai beaucoup d'amis virtuels mais ils ne sont pas des vrais amis.			
51	My mum says that I am hooked on social networks.		Ma mère dit que je suis accro aux réseaux sociaux.			
52	Thanks to the technology, I can share my photos with my family who live abroad.		Grâce à la technologie, je peux partager mes photos avec ma famille qui habite à l'étranger.			
53	I use the Internet every day but it is not always reliable.		J'utilise l'Internet tous les jours mais ce n'est pas toujours fiable.			
54	The Internet discourages the activity physical and you can become addicted.		Internet décourage l'activité physique et on peut devenir dépendants.			
55	It is true to say that new technologies make the life modern more simple.		À vrai dire que les nouvelles technologies rendent la vie modern plus simple.			

Spanish

Mis vacaciones		
	English:	Spanish:
Present Tense		
1	I usually* go on holidays with my parents and my siblings to Spain/France/Germany/Turkey.	Suelo* ir de vacaciones con mis padres y mis hermanos a España/Francia/Alemania/Turquía.
2	I go by plane direct from Manchester. We fly by plane given that it is super fast.	Voy en avión directo desde Manchester. Volamos en avión dado que es súper rápido.
3	When I am on holiday, almost always I go to Tenerife to spend some holidays on the beach since it is hot and it is pretty.	Cuando estoy de vacaciones casi siempre voy a Tenerife para pasar unas vacaciones en la playa ya que hace calor y es bonito.
4	From my point of view, swimming in the sea in Spain is marvellous – much better than here where the water is always cold.	Desde mi punto de vista, nadar en el mar en España es maravilloso – mucho mejor que aquí donde el agua es siempre fría.
5	In my judgement, I love taking photos and taking selfies. It's cool to send photos to my friends in England. How funny!	A mi juicio, me flipa sacar fotos y sacar selfies. Me mola mandar las fotos a mis amigos en Inglaterra. ¡Qué risa!
6	Generally, I love to go to the beach because it is very relaxing. Always I read a book or I swim in the sea.	Por lo general, me encanta ir a la playa porque es muy relajante. Siempre leo un libro o nado en la mar.
7	What I don't like is the sand – it sticks on all of my clothes and between my toes – how uncomfortable!	Lo que no me gusta es la arena – pega en toda mi ropa y entre mis dedos de pie – ¡qué incómodo!
8	Without doubt, I prefer to go on holiday in the city – I'm interested by the different cultures and I'm fascinated by monuments etc.	Sin duda, prefiero ir de vacaciones en la ciudad – me interesa las culturas diferentes y me fascina los monumentos y tal.
Past Tense		
9	Last year, I went to Scotland with my auntie. I travelled by car. The journey lasted four hours in total. I didn't get bored since I played on my mobile.	El año pasado, fui a Escocia con mi tía. Viajé en coche. El viaje duró cuatro horas en total. No me aburrí puesto que jugué con mi móvil.
10	Not only I visited the monuments but also I sunbathed .	No solo visité los monumentos sino también tomé el sol.
Future and Conditional Tense		
11	This July, after finishing my exams I'm going to go to Spain on holiday. I'm really excited.	Este julio, después de terminar mis exámenes, voy a ir a España de vacaciones. Tengo muchas ganas.
12	I'm going to relax – not only I'm going to read a good book but also I'm going to listen to music.	Voy a descansar – no solo voy a leer un buen libro sino también voy a escuchar música.
13	My dad is going to go to a museum – he wants that I go but museums bore me .	Mi padre va a ir a un museo – quiere que vaya pero los museos me aburren .
14	When I am older, I would love to go to Mexico because it is very good weather and they speak Spanish there.	Cuando sea mayor, me encantaría ir a Mexico porque hace muy buen tiempo y hablan español ahí.
15	If I won the lottery, I would do a safari in Africa given that I love animals, especially elephants.	Si me tocara la lotería, haría un safari en Africa dado que me encantan los animales, especialmente los elefantes.
16	If only I had more money – I want to go	Ojala que tuviera mucho dinero – quiero ir

	now.				ahora.
17	If only I had finished my exams – unfortunately, I have to study .				Ojala que hubiera terminado mis exámenes – desafortunadamente, tengo que estudiar .
Grammar					
18	Time Phrases: always sometimes often rarely never from time to time/occasionally				siempre a veces a menudo raras veces nunca de vez en cuando
19	I have we have you have you have (plural) he/she has they have			tengo tenemos tienes tenéis tiene tienen	
20	I am we are you are you are (plural) he/she is they are			soy somos eres sois es son	
21	I play we play you play you play (plural) he/she plays they play			juego jugamos juegas jugáis juega juegan	
22	I do we do you do you do (plural) he/she do they do			hago hacemos haces hacéis hace hacen	
23	I go we go you go you go (plural) he/she goes they go			voy vamos vas vais va van	
Present Tense					
24		-ar	-er	-ir	
	I you he/she/it we you (plural) they	-o -as -a -amos -áis -an	-o -es -e -emos -éis -en	-o -es -e -imos -ís -en	<i>To form the present tense, take off the –ar, -er or –ir and add the following ending on the verb.</i>
Future Tense					
25	I you he/she/it we you (plural) they	voy vas va vamos vais van	+ a + infinitive		
<i>To form the future tense, you need a part of the verb 'ir' to go plus 'a' plus your infinitive.</i>					
Past Tense					
26		-ar	-er	-ir	
	I you he/she/it we you (plural) they	-é -aste -ó -amos -asteis -aron	-í -iste -ió -imos -isteis -ieron	-í -iste -ió -imos -isteis -ieron	<i>To form the preterite tense, take off the –ar, -er or –ir and add the following ending on the verb.</i>

Business Studies (Enterprise)

Component 2 – Planning for and pitching an enterprise activity	
LAA: Explore ideas and plan for a micro enterprise activity	
COMPLETING A SKILLS AUDIT	
1 Skills Audit	The process of assessing your own skills in relation to what is required for the task
2 Skills	When an individual is able to do something well
3 Skills audit components	Leadership, personal and communication skills. Technical and practical skills
	List skills required → list the skills you have → Ask: What gaps exist? → Ask: How can these gaps be addressed?
ROLE OF KEY SKILLS IN AN ENTERPRISE	
4 Leadership	Leadership is the ability to motivate others to achieve goals Leaders must have the ability to encourage and inspire all members of the team to achieve the goals and do their best
5 Personal	Personal skills enable an individual to succeed in the workplace
6 Communication	Ability to share information with others Communication is a two way process – the ability to listen is vital. It can be internal (inside the enterprise) and external (outside) the enterprise
7 Technical	This includes specific knowledge of tools or software For example, Use of social media
8 Practical	These skills are the ability to perform specific tasks e.g. provide customer service
SELECTING AN IDEA	
9 Choosing from a list of ideas	Is achievable if the resources are available. Has a potential market
10 Gap in the market	Potential opportunity with little direct competition
ISSUES TO CONSIDER WHEN SELECTING AN ENTERPRISE IDEA	
11 Competitors	Who are your competitors? Where is their location in relation to your enterprise? How much do they charge for similar products to yours?
12 Resources available	HUMAN RESOURCES – What job roles will be needed? How many staff will be needed and how many hours will they work? FINANCIAL RESOURCES – Where will start up finance (money) come from? How will day to day activities be paid for? PHYSICAL RESOURCES – What equipment will be needed? What facilities will be needed?
13 Costing and Pricing	What will it cost to set up the enterprise? To rent premises and buy equipment. How much will it cost to provide the goods or service? How much will customers be willing to pay?
14 Financial Forecasts	Will there be sufficient cash to cover day to day expenses? Does the enterprise have the ability to break even? Will the enterprise make a profit or loss?
15 Methods of communication and promotion	How will the enterprise be launched? How will the enterprise be promoted so that customers are aware of its existence?
16 Potential customers	Who is the target market? Age, gender, income etc

Construction

1	Bevel edged chisels	Chisels that are slightly undercut making them easy to push into corners. Can be used for dovetail joints.
2	Mortise chisels	Narrow chisels with straight sides used to make mortises in timber frames.
3	Mallet	Used to knock wooden pieces together or to drive dowels or chisels.
4	Marking knife	A woodworking layout tool which is used to scribe lines in timber.
5	G cramp	Used to secure pieces of timber to work surfaces. Come in different sizes and throat depths. Shaped like a G.
6	F cramp	Used to secure pieces of timber to work surfaces. Come in different sizes and throat depths. Shaped like a F
7	Sash cramp	Use to cramp work together when it's glued.
8	Bench vice	Holds objects so that they can be worked on more easily.
9	Try square	For marking and checking right angles on work pieces.
10	Marking gauge	Use to scribe markings in timber parallel to a reference edge.
11	Mortise gauge	Used to scribe mortise and tenon joints on wood prior to cutting.
12	Tenon saw	Use to cut straight lines in timber. Can be used to cut tenons in timber.
13	Small hand router planer	Used to cut wood in small recesses such as in a t halving
14	Steel tape measure	A retractable steel tape that is used to measure lengths of timber.
15	Carpenter's pencil	Used to mark timber. Ideally 2H as this does not blunt quickly and provides more accurate markings.
16	Steel rule	A simple but accurate measuring device. The "0" starts at the very end of the ruler unlike acrylic rulers.
17	Wood joints	Corner halving T halving Bridle joint Mortise and tenon joint

Food & Catering

1	Describe personal safety responsibilities in the workplace	<p>The Health and Safety at Work Act is to protect the health, safety and welfare of employees, customers, delivery people. It states that you must:</p> <ul style="list-style-type: none"> • work in co-operation on health and safety issues • follow instructions • take care of the health and safety of yourself and of other people • not misuse equipment • report any hazards <p>RIDDOR (reporting of injuries, diseases and dangerous occurrences regulations) is to ensure serious accidents, diseases and incidents are reported and that a record is kept.</p>
2	Identify risks to safety in hospitality & catering. What are the potential hazards and risks to personal health and safety?	<p>Safety risks are:</p> <ul style="list-style-type: none"> • slips, trips and falls • cuts • burns and scalds • electric shocks <p>Health risks are:</p> <ul style="list-style-type: none"> • exposure to cleaning chemicals • muscle strain and back problems from lifting and carrying • exposure to extreme heat and cold • wrist strain from chopping and kneading
3	Recommend personal safety control measures for hospitality and catering provision.	<p>(Employees) You should:</p> <ul style="list-style-type: none"> • wear non slip shoes • wear personal protective equipment and clothing • wipe up spills when they happen • pick up any food that has fallen on the floor • carry and use knives safely • use oven gloves • keep drawers closed • handle electrical equipment with dry hands • report any problems
4	Describe food related causes of ill health	<p>There are 3 main causes – MICROBES (bacteria, mould and yeast) CHEMICALS. FOOD ALLERGIES AND INTOLERANCES. The word microbe is short for micro-organism, which means a tiny living plant that you can only see under a microscope. Pathogenic microbes are harmful to humans and cause food poisoning. They can easily</p>

		be transferred from one place to another where they will contaminate it . This is Cross Contamination. Examples of cross contamination are not washing your hands after handling raw meat, sneezing into your hand or going to the toilet, not using the correct chopping boards
5	Describe the role of the environmental health officer	<p>EHO check:</p> <ul style="list-style-type: none"> • food stored, handled and cooked hygienically • food is not being contaminated and is safe to eat • food handlers are aware of importance of personal hygiene • premises in good condition and clean <p>EHO can:</p> <ul style="list-style-type: none"> • take photographs for evidence • take samples away for testing • enter without an appointment • look at records e.g. fridge temperatures <p>If there is a problem, EHO can:</p> <ul style="list-style-type: none"> • tell the owners to make improvements • close the premises • give evidence in court
6	Describe common types of food poisoning	<p>Campylobacter – milk, raw chicken Salmonella – milk, chicken, raw eggs E-Coli – milk, raw meat Clostridium Perfringens – raw meat Listeria - soft cheese = feels like flu, can cause miscarriage of unborn baby Bacillus Cereus – cereals, cream cakes Staphylococcus Aureus – cuts, mouth, nose</p>
7	Describe the symptoms of food induced ill health	<p>Food poisoning is a common and unpleasant illness that can lead to serious health problems. Non-visible symptoms are headache, stomach ache, feeling sick (nausea), aching muscles, weakness. Visible symptoms are diarrhoea, sick (vomiting), dizziness, high temperature.</p>

Health & Social Care

1	<p>A life stage is a phase, or period that every person passes through and is usually linked to certain characteristics for that life stage. In Health and social Care there are 6:</p> <p>Infancy (0–2) Early childhood (3–8) Adolescence (9–18) Early adulthood (19–45) Middle adulthood (46-65) Later adulthood (65+)</p>
2	<p>Human growth is broken into four different areas of development. Growth generally relates to how a body changes over time such as an increase in height and weight, it relates to the physical changes. Development is about how people learn new skills and abilities, such as catching a ball or learning to read, this relates to the intellectual, emotional and social development. Areas of development are organised into PIES. P- Physical I-Intellectual E- Emotional and S-Social.</p>
3	<p>Physical Development- Describes growth patterns and physical changes across the different life stages, in adolescence people will grow in height and weight. Some of the changes are often linked to movement and the development of muscles and their use. Gross motor skills are about the large muscles, so an infant learning to walk shows how they develop. Fine motor skills show the development of small muscles so a child learning to hold a pencil and write would be an example of their development.</p>
4	<p>Intellectual Development – Development of intellectual skills is all about how people think and learn and how this develops over time. This is linked to thinking, memory and language and how this is used across each of the different life stages. Looking at how people remember and recall information and develop skills such as problem solving.</p>
5	<p>Emotional Development – Emotional development is about how people develop their identity and how they cope with feelings. It is very closely linked to how people develop as they should be loved, accepted and safe as this then links to how they deal with different situations and adapt to change.</p>
6	<p>Social Development – Social Development is linked to belonging and community. It is about how people develop relationships and friendships and links to people having the confidence to join in different activities and the different situations people experience.</p>
7	<p>Infancy – (0-2)- Across this life stage an infant develops a range of skills very rapidly. They grow in height and weight and by 2 can walk and run. They also learn how to talk and communicate from making sounds at 6 months to using simple words at 12 to 18 months. Infants are very closely bonded with their carer's and this is important for their emotional development as they show love and affection. Socialisation occurs at this life stage and is how infants learn to connect to others. In this life stage they will play in a solitary way, they will be aware of other children but will still play alone.</p>
8	<p>Early childhood – (3-8) Children will still be developing physically with growth spurts happening alongside the development of fine and gross motor skills. They can now write and hop skip and jump as these skills develop. Children are very inquisitive so will explore and ask questions, in this life stage they will start school which helps their intellectual skills to develop. Their language will also develop so they can organise thoughts and hold conversations and by the time they are 8 they can use and build more complex sentences. In early childhood children become more independent as they experience different things, like starting primary school. They will also start to play in a parallel way were they will play near other children but not socialise with them at 3. This then starts to develop into playing in a co-operative, or social, way were they will play together.</p>
9	<p>Adolescence - (9-18) – The physical changes that happen during adolescence are linked to the process of puberty. There will be physical changes that happen to males and</p>

	<p>females at this time such as males becoming more muscular and females will have a widening of the hips. Intellectually adolescents begin to think in a more abstract way and can think through complex issues and come up with solutions. This is linked to high school and studying a range of qualifications. Emotional intelligence starts to develop and as people are changing during this life stage, adolescents can find themselves distancing themselves from their parents. People begin to be aware of their self-image and this can affect emotional development in adolescence and can also affect someone's self-esteem. Adolescents will experience a larger range of different relationships during this life stage and can be greatly influenced by their peers, this can have both a positive or negative effect.</p>
10	<p>Early Adulthood – (19-45) This life stage covers a large period of life and there are many physical changes and developments, in the early stages of adulthood then people are at the peak of physical fitness. Towards the end of this life stage changes start to happen appearance such as greying hair or wrinkles. Intellectually many new skills are learnt due to being in work and training, and then skills are developed with owning a home and having a family. Relationships develop such as, intimate relationships change as people move in together and choose to have a family. The development of these relationships links to emotional development in this life stage, being content in a relationship means that a person feels loved and this affects their self-esteem in a positive way. Socially people feel more connected and chose to become involved in their community and activities where they live.</p>
11	<p>Middle Adulthood – (46-64) During middle adulthood there are many changes physically, from loss of muscle tone, greying hair and middle aged spread as the metabolism slows down. If people remain active the effects of these changes can be lessened. Intellectually skills are still developing and at this stage many people will return to studying as learning is now classed as 'lifelong learning'. Emotionally many changes happen with families changing as children leave home so often people can have a 'mid-life crisis' trying to deal with the change. Socially people are involved in community and with work but as changes start to happen towards the end of the life stage and people think about retirement this can affect their involvement.</p>
12	<p>Later Adulthood – (65+) Physically as long as people are active and fit this can delay the aging process that happens during this life stage. People's bodies age and there is a loss of hearing, poor eye sight as well as loss of elasticity of the skin. Intellectually people need to keep active as they often retire in this life stage. What is important to note is they do not loose intelligence but reaction times are slower. Emotionally this life stage is associated with loss due to people dying as they get older. Socially due to retirement and people passing away this can be a life stage were social isolation can be a particular issue and can be when people need support.</p>
13	<p>Types of relationships- Informal relationships are formed between family members and are based around love and acceptance. Social relationships are based around friendships and relationships with peer groups (people of a similar age). There are formal relationships that are based in formal settings such as work so student-teacher relationship is a formal relationship. Finally, there are intimate relationships and these tend to develop around adolescence and should be based on trust and respect.</p>

Sports Studies

1	What is Orienteering Orienteering is an exciting outdoor adventure sport which involves walking or running whilst navigating around a course using a detailed map and sometimes a compass. The aim is to navigate in sequence between a set of control points and decide the best route to complete the course in the quickest time. It does not matter how young, old or fit you are, as you can run, walk or jog the course and progress at your own pace.
2	Where can orienteering take place? Orienteering can take place anywhere from remote forest and countryside to urban parks and school playgrounds. It's a great sport for runners, joggers and walkers who want to improve their navigation skills or for anyone who loves the outdoors.
3	Orienteering Maps Orienteering maps are drawn to a large scale, most commonly 1:15000 (1cm=150m) or 1:10000 (1cm=100m) but for orienteering in parks you use a map drawn in a scale of 1:5000. All maps use an internationally agreed set of symbols and these are logical and easy to learn. You should absorb much of the information simply by attending your first few events. Most orienteering maps will also provide a detailed legend to help you understand the map.
4	Control Descriptions To help you navigate to each control you will be provided with a control description sheet. The control description sheet tells you what you are looking for, e.g. a path junction, a large boulder etc. When you find the control there will be some letters or numbers which should correspond to those on your control description sheet. If they do match, you have found the right place. If they don't, it isn't your control!
5	Starting the Course The course is represented on your map by; the triangle indicates the start, the numbered circles indicate the control locations and the double circle indicates the finish. You must visit the controls in the order they are numbered. At the 'start' you will need to 'punch' the control, which involves placing your electronic card (see equipment) into a unit which starts the timer. At the finish you are required to 'download' the information which is on your electronic card. This shows whether you have completed the course in the correct order. You must download whether you have completed the course or not.
6	Equipment To start orienteering very little equipment is required. You will need to wear comfortable clothes for walking or running in (full leg cover is recommended) that you don't mind getting dirty, trainers and a waterproof if the forecast is bad! All other equipment that you may need will be available to hire.
7	Top Tips for Beginners Below are five basic skills that you need to practice to help you progress with orienteering 1. Fold your map - Always make sure that you fold your map so that you can easily see the part of the map where you are. 2. Orientate your map - Always make sure that your map is the correct way round or orientated. This means that the features which are in front of you on the ground are in front of you on the map. You can also orientate your map using a compass by making sure that the north lines on the map point the same way as the north or red end of the compass needle. Each time you change direction you should change your grip on the map so that the map is still orientated to north. 3. Thumb your Map - To help you know where you are on the map it helps if you mark your position on the map with your thumb. As you move along the ground you should move your

thumb to your new position on the map. It is usual to move your thumb to the new position at a 'checkpoint' such as a path junction or some other obvious feature where you will stop or slow down and check where you are.

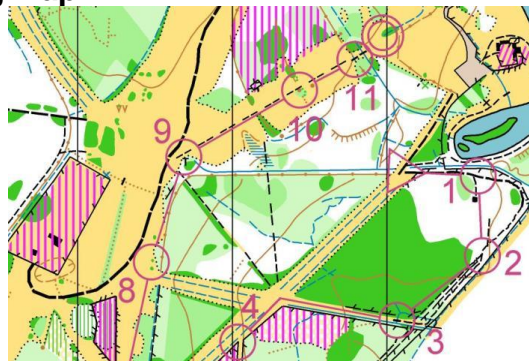
4. Check your control card - Once you have found a control you always need to check that the code on your control description sheet matches the code on the control. You should also check that the control is situated on the correct feature on your map. You will then know for sure that you have reached the correct control.

5. Have fun and enjoy yourself - This is the most important skill to remember. Orienteering should always be fun and enjoyable!

8 **Orienteering Courses near Blackpool - Region North West**
 Blackpool Stanley Park
 Beacon Fell 14 miles / **Club** SROC / **Nearest town** Preston/Garstang / **Postcode** PR3 2NL
 Formby (NT) 16 miles / **Club** DEE / **Nearest town** Formby, Merseyside/ **Postcode** L37 1LJ
 Williamson Park 20 miles / **Club** SROC / **Nearest town** Lancaster / **Postcode** LA1
 Halton Village 24 miles / **Club** SROC / **Nearest town** Lancaster / **Postcode** LA2 6NB
 Tockholes 24 miles / **Club** PFO / **Nearest town** Darwen / **Postcode** BB3 0PB
 Lever Park 24 miles / **Club** SELOC / **Nearest town** Rivington, Horwich / **Postcode** BL6
 Amberswood 25 miles / **Club** GMOA / **Nearest town** Wigan / **Postcode** WN2 3BU


- 9 **Basic Orienteering Skills**
- Folding the map.
 - Thumbing the map.
 - Orientating the map to north (with ground or compass)
 - Reading features on the map.
 - Taking a compass bearing.
 - Following a compass bearing.
 - Pacing.
 - Judging Distance.

10 **Example of Orienteering Map**



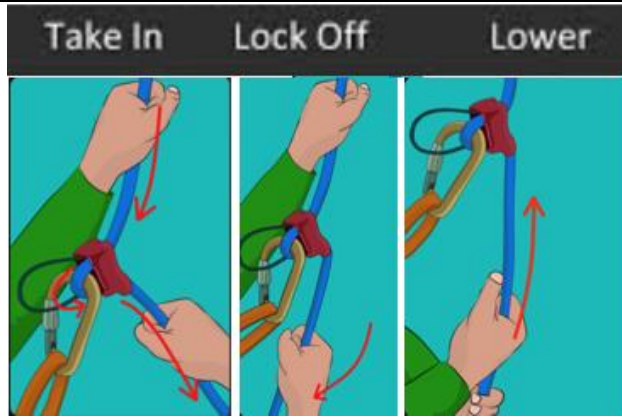
11 *Rock climbing* is an activity in which participants *climb* up, down or across natural *rock* formations or artificial *rock* walls. ... *Rock climbing* is a physically and mentally demanding sport, one that often tests a climber's strength, endurance, agility and balance along with mental control.

12 **The Difference Between Indoor and Outdoor Rock Climbing**
 The biggest difference is that when you're outside, you have so many other factors playing a part. These factors include falling rocks, weather, unfamiliarity with the route, and not knowing where the holds are

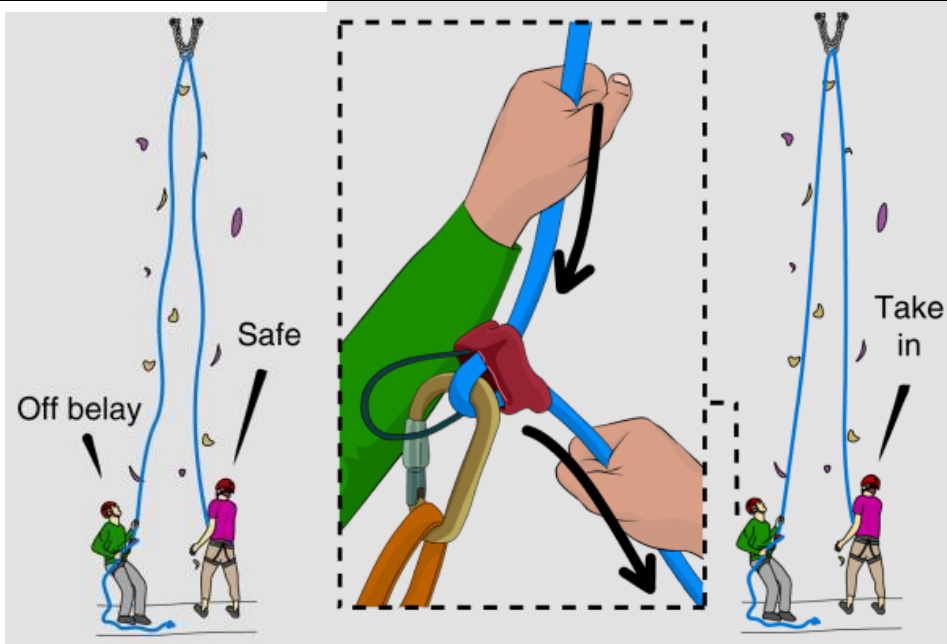
13	<ul style="list-style-type: none"> • Key Equipment List • Harness • Rope(s) • Belay System • Helmet • Chalk • Climbing Shoes
14	 <p>helmet</p> <p>harness</p> <p>rock shoes</p> <p>chalk bag + chalk</p> <p>single rope (9, 9.8 or 10.2mm diameter)</p> <p>belay device</p> <p>HMS screwgate carabiner</p> <p>set of (at least) 10 quickdraws</p>
15	<p>Smearing Finding foothold can be obvious outside but you also may have to do a lot more smearing. This is when you are pasting your climbing shoes directly against the rock and move up using friction to gain vertical ground. You have to master this skill to maintain your balance. The steeper the terrain, the more pressure you'll need to apply to your toes.</p>
16	<p>Edging Footholds vary in size and shape. You are guaranteed to come across tiny ones that don't perfectly fit your foot. What then? You have to know how to edge. You have to work with the big toe area of your shoe. By holding your inside edge, where you should rest your body weight, onto a foothold, you can move up the rock until you find a handhold to stay steady until your next move.</p>
17	<p>Gripping Remember to make the most of the area connecting your hands to the holds. Think "maximize." Apply as much pressure as you can because that makes it easier to bring your body up using the hold. Weight imbalance is an injury risk factor. All fingers should take the same amount of weight.</p>
18	<p>Abseiling Abseiling involves descending rope using a friction device (e.g. belay device) attached to your harness. It's used to tackle terrain that would be too dangerous or time-consuming to descend on foot. The take-off is often the hardest part of abseiling as you are leaving the horizontal cliff top for the vertical cliff face. If you find it awkward consider sitting on the edge and slowly sliding off. This lowers your centre of gravity making you more stable.</p>
19	<p>Rock Climbing Indoor Locations Blackpool Sports Centre Clip 'n' Climb Blackpool Preston Climbing Centre Kendal Climbing Wall</p> <div style="border: 1px solid black; padding: 5px; display: inline-block;"> <p>Outdoor Climbing Locations Pinfold Quarry Beacon Fell Flyshed Quarry Baby Denham Ruff Wood</p> </div>

20

Belaying



21



22

Application tasks

1. Create an orienteering map of your own using the school site as your course.
2. Select another outdoor activity and create your own knowledge organiser(skiing, canoeing, hill walking, caving or mountain biking)

How to create a knowledge organiser of your own:
 Explain the activity?
 What equipment do you need to participate?
 Can you gain qualifications in the activity?
 What are the key skills for the activity?
 Where can you take part in this activity?

23

Test of Knowledge

1. Describe orienteering?
2. What is orientating the map?
3. What do contours show you on the map?
4. Explain two skills used when participating in orienteering?
5. Make an equipment list to take part in orienteering?
6. Suggest two locations where you can participate in Orienteering
7. What is rock climbing?
8. Make a list of five key equipment items required for climbing?
9. Explain two climbing skills?
10. Where can you climb indoor locally?
11. Describe the activity of abseiling?
12. Explain how to belay safely?

Weekly Spellings

Week 1

Focus : **able** and **ible** endings

-ible	-able
credible	adorable
edible	agreeable
forcible	breakable
horrible	disposable
indestructible	enjoyable
invincible	enviable
legible	identifiable
possible	manageable
responsible	miserable
reversible	probable
susceptible	reliable
tangible	respectable
terrible	valuable

Notes: **able** endings are more common than **ible** ones.

Challenge: If there is a word you do not understand, look it up in the dictionary.

Weekly Spellings

Week 2

Focus : **ful** suffixes

Typical ful words		-y	
boast	boastful	beauty	beautiful
care	careful	bounty	bountiful
colour	colourful	fancy	fanciful
doubt	doubtful	mercy	merciful
faith	faithful	pity	pitiful
fear	fearful	plenty	plentiful
hand	handful		
harm	harmful		
hope	hopeful		
mouth	mouthful		
play	playful		
scorn	scornful		
shame	shameful		
thank	thankful		
wake	wakeful		

Notes:

- Drop the **l** when adding **ful**
- Change **y** to **i** when adding **ful** to words which end in the consonant +y
- **Full, all** and **till** usually drop the second **l** when they are suffixes.

Weekly Spellings

Week 3

Focus : cian, sion and tion endings

cian	sion	ssion	tion
dietician	collision	discussion	attention
electrician	confusion	mission	diction
magician	corrosion	oppression	direction
musician	exclusion	passion	faction
optician	explosion	percussion	fiction
physician	extension	possession	fraction
politician	infusion	profession	reduction

Notes:

- **cian** – where words end in **c** they are usually related to people: common for occupations and identity.
- **tion** – the most common ending.
- **sion** - where the base word ends in **d/de** or **s/se**.
- **ssion** – clear soft 'sh' sound.

Weekly Spellings

Week 4

Focus : **cian**, **sion** and **tion** endings

ation	etion	ition	otion	ution
demonstration	completion	competition	devotion	constitution
education	deletion	intuition	emotion	contribution
foundation	depletion	opposition	lotion	distribution
nation	secretion	petition	motion	pollution
station		position	notion	revolution
translation		repetition	promotion	

Notes:

- **ation** – long **a** is usually followed by **tion**.
- **otion/ution/etion** – the base word usually contains the vowel, clearly pronounced.
- **ution** words are usually longer than three syllables; **usion** words tend to be shorter.

Weekly Spellings

Week 5

Focus : antonym prefixes

in	im	ir	il
inaccurate	immature	irrational	illegal
inactive	immobile	irregular	illegible
inattentive	impatient	irresistible	illiterate
incapable	impolite	irresponsible	
inconvenient	impossible		
incredible	impractical		
indecent	improbable		

Notes:

- **in, im, ir** and **il** all mean 'not' or 'opposite of'.
- **im** precedes words starting with **p** as well as words beginning with **m**

Weekly Spellings

Week 6

Focus : antonym prefixes

mis	non	un	anti
misbehave	non-drip	unfortunate	antibiotic
miscalculate	non-fiction	unfounded	antibody
miscount	nonsense	unhelpful	anticlockwise
Misfire	non-smoker	unlikely	antifreeze
misfortune	non-starter	unrealistic	antihero
mishear	non-stick	unreasonable	antiseptic
misinform	non-stop		
misplace	non-violent		
misread			
mistake			

Notes:

- **mis** means 'wrong' or 'false'.
- **non** means 'not' or 'opposite of'
- **anti** means 'against'

Weekly Spellings

Week 7

Focus : classical prefixes

auto	circ	bi	tele
autobiography	circle	biceps	telegraph
autograph	circular	bicycle	telepathy
automatic	circulate	bifocals	telephone
automobile	circumference	bilingual	telescope
autopsy	circumnavigate	biplane	television
	circumstance		

Notes:

- **auto** means 'self'
- **circum** means 'round'
- **bi** means 'two' or 'twice'
- **tele** mean 'distant'

Weekly Spellings

Week 8

Focus : classical prefixes

trans	micro	aqua	aero
transatlantic	microcosm	aquaplane	aerodrome
transfer	microfilm	aquarium	aerodynamics
translate	microphone	Aquarius	aeroplane
transmit	microscopic	aquatic	
transparent			
transplant			
transport			

Notes:

- **trans** means 'across'
- **micro** means 'small'
- **aqua** means 'water'
- **aero** means 'air'

Weekly Spellings

Week 9

Focus : classical prefixes

audi	re	prim	super
audible	reconsider	primary	superman
audience	repeat	primate	supernatural
audition	replay	prime	supernova
auditorium	reply		supersede

Notes:

- **audi** means 'hear'
- **re** means 'again'
- **prim** means 'first'
- **super** means 'greater'

Weekly Spellings

Week 10

Focus : common letter clusters

our	ough	ear
armour	cough	bear
flour	drought	dear
hour	enough	dreary
journey	plough	earn
mourn	rough	fear
ourselves	slough	gear
pour	thorough	hear
sour	though	hearth
tour	through	learn
your	tough	wear

Weekly Spellings

Week 11

Focus : common letter clusters

ight	ice	aus
bright	apprentice	Australia
eight	dice	Austria
fight	mice	because
height	nice	cause
light	notice	claustrophobia
might	police	pause
night	rice	sausage
right	spice	
sight	twice	
tight		

Weekly Spellings

Week 12 and Week 13

Revision and Retrieval

Week 12: You are going to revise all the spellings from week 1 to week 5 and you will be tested on your knowledge of the prefixes, suffixes and general common letter clusters.

Week 13: You are going to revise all the spellings from week 6 to week 11 and you will be tested on your spellings of these key words.

St. George's School Prayer

Loving God,

Thank you for St. George's School and everyone in it.

By the power of your Holy Spirit

Help us to BELIEVE you are with us;

Inspire us to ACHIEVE the best we can;

And lead us to CARE for everyone around us.

We ask this in the name of Jesus Christ, your Son.

Amen