# KEYWORD GLOSSARY

AUTUMN TERM



YEAR 8



## English: Animal Farm

Key Word	Definition
Equality	The state of being equal.
Proletariat	Working class people regarded collectively.
Communism	A theory of social organisation all property is owned by the community as a whole.
Dictator	A ruler with absolute power.
Dictatorship	Governed by a dictator.
Revolution	A forcible overthrow of a government or social order in favour of a new one.
Propaganda	Information, especially of a biased or misleading nature, used to promote a political cause or point of view.
Tyrant	A ruler who uses their power unjustly and unfairly.
Authoritarian	A system of politics which demands total obedience from the power and total power for the rulers.
Utopia	An ideal, perfect place.
Credulous	Gullible, too easily fooled.
Inference	A conclusion reached on the basis of evidence and reasoning.
Characterisation	The way characters are created and developed.
Allegory	A story which has deeper meaning.
Authorial intention	An author's intention is their reason for or motivation for writing.
Social context	What was influencing the writer when the novel was written.
Historical context	What was happening at the time the novel was set.



#### Maths: Properties of number, calculations and algebra

Key Word	Definition
Prime number	A number that is only divisible by 1 and itself and must have two factors.
Prime factor	The factors of a number that are prime
Product	The result of multiplying values together
Venn diagram	The method for sorting items into similar attributes
Highest common	The greatest value that is divisible by two or more values
factor	
Lowest common	The smallest value that is in 2 or more times tables.
multiple	
Standard form	An alternative way of writing very large or very small numbers using powers of 10
Significant figure	The digits within a number. The first significant figure is the first non-zero
Negative number	A value that is less than zero
Operation	The action within a calculation (+ - x /)
Indices	The power of a value
Variable	The letter used to represent a value within an expression or equation
Expand	The removal of brackets in expressions by multiplying
Factorise	Removing the HCF of an expression in introducing brackets



Science: <u>8B1 Biology Topic 1 – Respiration, Gas Exchange and Biomechanics</u>

	A chemical reaction that releases energy from the breakdown of
RESPIRATION	food molecules.
AEROBIC	Respiration with oxygen.
ANAEROBIC	Respiration without oxygen, also known as fermentation in plants and yeast.
BREATHING	A physical process that uses muscular contraction to move air in and out of the lungs, also known as ventilation.
RIBCAGE	Rounded pairs of bones that protect the lungs and heart.
DIAPHRAGM	A muscular dome-shaped sheet of tissue separating the thorax from the abdomen.
TRACHEA	An organ allowing air to pass from our mouth or nose towards our lungs, also known as the windpipe.
ALVEOLI	Microscopic air sacs found at the end of the bronchioles where gas exchange takes place.
ASTHMA	A common lung condition affecting the bronchioles, including muscle constriction and airway inflammation.
NICOTINE	An addictive drug that increases blood pressure and makes red blood cells more sticky, so the risk of blood clots and heart attacks is higher.
TAR	A sticky brown substance containing chemicals that cause cancer (carcinogens) and damage lung cilia.
CARBON MONOXIDE	A colourless, odourless gas that binds to red blood cells and stops them carrying oxygen.
joints	Where two or more bones meet.
SKELETAL MUSCLES	Tissues that contract and relax to pull on bones through tendons to cause movement.
OXYGEN	A colourless, odourless gas that is required as a reactant during aerobic respiration.
CARBON DIOXIDE	A colourless, odourless gas that is produced as a waste product during aerobic respiration.



Science: 8P1 Physics Topic 1 – Electricity and Magnetism

CHARGE	The physical property of matter that causes it to experience a force when placed in an electric and magnetic field.
ATTRACTION	A non-contact force between two or more objects surrounded by electric fields of opposing charge.
REPULSION	A non-contact force between two or more objects surrounded by electric fields of the same charge.
CONDUCTORS	Materials that allow heat/electricity to flow through easily as they have electrons that are free to move.
INSULATORS	Materials that do not allow heat/electricity to flow through easily as their electrons are not free to move.
ELECTRIC CURRENT	The rate of flow of electrical charge (how much charge is flowing every second). Measured in Amperes / Amps (A) using an ammeter.
POTENTIAL DIFFERENCE	The difference in energy of electrical charge between two points (how much "push" the charges have).  Measured in Volts (V) using a voltmeter.
SERIES CIRCUIT	A circuit that contains a single loop with no breaks.  The current is the same at all points in the circuit.
PARALLEL CIRCUIT	A circuit where components are connected on separate branches. The current is shared between different branches of the circuit. The more components in one branch, the slower the current.
AMMETER	Measures electrical current in a circuit. Always connected in series.
VOLTMETER	Measures potential difference across a circuit component. Always connected in parallel.
CELL	Component used to power a circuit, providing energy for the current to flow.  Many cells make a battery.



# Science: 8C1 Chemistry Topic 1 - Energetics, The Periodic Table and Materials

T
A chemical reaction that releases energy, warming the surroundings.
A substance made up of only one type of atom.
Two or more elements chemically bonded together.
The number of protons in an atom of a particular element.
The horizontal rows in the periodic table of elements.
The vertical columns in the periodic table of elements.
The physical condition of matter.
A measure of how much mass there is in a certain volume (how closely packed the particles are).
Can be bent or shaped without breaking.
Allows electricity / heat to flow through it.
A compound of oxygen and a metal element. Normally solids at room temperature, and alkaline (ph 8-14) when dissolved in water.
When a more reactive element replaces a less reactive element in a compound.
A material made by baking a starting material (e.g. Moulded clay) in a very hot oven called a kiln. Typically hard, durable, strong, waterproof and heat-resistant, but brittle.
Very long chain molecules made from joining together many small repeating units called monomers. Typically solids, chemically unreactive, easily mouldable, strong, hard-wearing and electrical insulators.
Synthetic material made by joining two or more different types of material together.
Chemical destruction of living tissue.



## Geography: My Place in Europe

Key Word	Definition
Trade Bloc	A group of countries that agree to trade with each other.
Migrant	Someone who moves from 1 country to another on a permanent basis
Common Currency	A shared money, that is used by many different countries.
Schengen Agreement	An agreement from countries in Europe, that anyone can move freely between nations without restriction.
Brexit	The name given to the UK's withdrawal from the European Union
Life Expectancy	How long (on average) people should live
Continent	A large land mass, usually divided into smaller areas (countries)
Climate	The overall average conditions of the weather
Weather	The conditions found outside on a certain day of the year
Union	When people agree to work together
Choropleth Map	A type of map that uses colour to show information
GIS – Geographical Information System	A digital map, that can have many layers of information added to it – for example, Google Earth can have traffic information, weather information, street labels, photographs added.



#### History: The Stuarts

Key Word	Definition
terrorism	The use of violence or threats by individuals or groups to create fear and achieve political, religious, or ideological goals
Divine Right of	The belief that kings and queens have the right to rule because they
Kings	are chosen by God
government	A group of people who make decisions and rules for a country or community to keep things running smoothly
Royalist	Someone who supports the king or queen and believes in their authority
Parliamentarian	Someone who supports the parliament, a group of representatives who make laws and decisions
Roundhead	A supporter of the parliament during the English Civil War, named after their short haircuts
Cavalier	A supporter of the king during the English Civil War, known for their fancy clothing and long hair
republic	A type of government where the people elect leaders to represent them and make decisions
Puritan	A person who followed strict religious beliefs and wanted to purify the Church of England from what they saw as corruption
plague	A serious infectious disease that spreads quickly and can cause widespread illness or death



Religious Education: Were Jesus' teachings radical? How do they inspire and guide people to fight injustice?

Key Word	Definition
Agape	Selfless love. Love as action. Love as helping others.
Beatitude	A blessing. The 8 Beatitudes are found in the Bible. 8 actions/ traits which would be 'blessed' by God.
Bible	The Christian holy book (scripture)
Euangelion	Good News. Another term for the Gospels.
Hunger and thirst	To want something really badly.
Injustice	Unfairness.
Pacifist/ Pacifism	A person who doesn't believe in violence/ the belief in non violence.
Parable	A simple story that carries a moral or spiritual message.
Persecute	To pick treat someone badly possibly due to something like their ethnicity, religion or beliefs.
Righteousness	Justice/ fairness.
Saviour	One who saves.
Sermon	A talk on a religious or moral theme.
Upside Down	A kingdom brought about by Jesus where the givers receive, the poor
Kingdom	(financially) can be rich (in spirit) where the poor are powerful, where the 'king' is not a military ruler.



#### Art: Baseline - Natural Forms

ACCURATE	Correct in all details and fairly exact.
ANALYSIS	Looking deeper into a piece of art, beyond the surface, and making judgements about what you find out.
ARTS & CRAFTS MOVEMENT	Initially, a British movement of the nineteenth century which advocated skilled craftsmanship and the 'honest' use of traditional materials and techniques.
ART MOVEMENT	A group of artists with a common idea and working in a similar style are grouped together in movements. Sometimes called an'-ism', where the style of art is given a name and the ending '-ism' added to it, such as impressionism and surrealism.
BATIK	A method (originally used in Java) of producing coloured designs on textiles by dyeing them, having first applied wax to the parts to be left undyed.
BURNISHING	A coloured pencil technique used to create a smooth and opaque look similar to oils, acrylics or airbrush. Also refers to polishing something, especially metal, by rubbing.
CONTEXT	Aspects of an artwork that might have influenced the artwork or the maker (artist) but which are not actually part of the artwork. E.g. where or when it was made and what may have happened politically or socially at the time.
CONTOUR	An outline representing or bounding the shape or form of something.
CRAFT	A form of making which generally produces an object that has a function: such as something you can wear or eat or drink from.
DECORATIVE ARTS	A term used to describe the design and aesthetics of functional objects with an emphasis on unique and hand-crafted forms often available in limited quantity.
DEPTH	The perceived distance between the background and the foreground of a composition.
INDUSTRIAL REVOLUTION	The process that transformed manufacturing from handmade to machine-made, mass-produced goods using water, steam and coal power transported by canal, rail and steamship. Britain was the first country to have an Industrial Revolution.
OBSERVATIONAL DRAWING	Simply drawing what you see. This is usually done directly from a real subject in front of you, as realistically and as true to life as possible.
RESIST	Something that is added to parts of an object to protect these parts from being affected by a subsequent stage in the process. Often the resist is then removed. Stencilling and batik are forms of resist.
SCUMBLING	Slightly less controlled drawing technique using lots of random, squiggly marks to build up areas of shadow.
STIPPLING	The technique of drawing, painting, or engraving using numerous small dots or dashes.
SYMBOL	A thing that represents or stands for something else, especially a material object representing something abstract.
TJANTING	A Javanese pen-like instrument for applying hot wax in batik work usually consisting of a small thin copper cup with a spout and a handle of reed or bamboo.



TRADE ROUTES	A long-distance route along which commercial goods are transported.
WOODBLOCK	The oldest form of printmaking, woodcut is a relief process in which knives and other tools are used to carve a design into the surface of a wooden block. The remaining raised areas are inked and printed, while the recessed areas that are cut away do not retain ink.

## Design Technology: Ceramics – Ugly Fruit

An object that has height, width and depth, like any object in the real world. For example, a sphere is a three-dimensional circle. Tone is used to create form and give two-dimensional shapes volume.
In ceramics and textiles an appliqué is a separate piece of clay or fabric added to the primary work, generally for the purpose of decoration.
Pottery that has been fired, but not glazed.
A person who works with clay to produce ceramics; ceramic artist.
Coiling involves the rolling out of clay into a long thin sausage-like forms that is wound round like a spring. Building a vessel with coils is accomplished by placing them around the circumference and gradually increasing the height.
A form of making which generally produces an object that has a function: such as something you can wear or eat or drink from.
Trim or clean the rough edges of a metal casting or a piece of pottery before firing.
The process of bringing clay and glazes up to a high temperature.
Refers to objects that are three-dimensional, or have length, width, and height. Geometric forms have specific names associated with them and are typically man-made.
A liquid that comes in nearly any colour and it's used to waterproof, decorate and give pottery a smooth, glass-like surface once it has been fired once.
The term given to clay objects when they have been shaped but have not yet been fired. Firing greenware converts the clay to ceramic.
To engrave a design by cutting or scraping into the clay surface at any stage of drying, from soft to bone dry.
The initial sketch or basic model a sculptor makes before beginning a three-dimensional final piece.
Pierced decoration refers to holes cut into jars and plates as a decoration. Once the clay is leather-hard it can be pierced. Strong, sharp bladed tools and hole boring implements are needed for pierced decoration.
Simple technique of making pots by crudely shaping a ball of clay and then, by forcing the thumb into the centre, gradually pinching out the walls to an even thickness and the desired shape.



PLASTICITY	The quality of clay which allows it to be manipulated into different shapes without cracking or breaking.
POTTERY	Pots, dishes, and other articles made of fired clay. Pottery can be broadly divided into earthenware, porcelain, and stoneware.
SHRINKAGE	Clays used in ceramics shrink when they dry because of particle packing that occurs as inter-particle water evaporates. Excessive or uneven shrinkage causes cracks.
VESSELL	A hollow container, especially one used to hold liquid, such as a bowl or cask.
WEDGING	Clays used in ceramics shrink when they dry because of particle packing that occurs as inter-particle water evaporates. Excessive or uneven shrinkage causes cracks.

#### Design Technology: Textiles – Felt Food

APPLIQUE	In textiles an appliqué is a separate piece of fabric added to the primary work, generally for the purpose of decoration.
BACKSTITCH	A sewing technique where stitches are made in reverse to secure the beginning and end of a seam, preventing unraveling.
BLANKET STITCH	A strong, can be used as decorative stitch, used to finish and reinforce the edges of blankets etc
BOBBIN	A small spool that holds the lower thread in a sewing machine.
CIRCUMFERENCE	The distance the edge of a circle.
EMBELLISH	To make (something) more attractive by the addition of decorative stitches
EMBROIDERY	Using a needle and thread to hand sew patterns, pictures or words with decorative stitch
FELT	Fabric made by rolling and pressing wool and applying moisture or heat, which causes the fibres to mat together to create a smooth surface.
KNITTED	The process of creating fabric by interlocking loops of yarn with needles.
NET	Is a term used to describe what a 3D shape would like like if it was opened out and laid flat.
PATTERN	Refers to a template or guide used for cutting and assembling fabric pieces.
PINNING	Securing fabric pieces together with pins before sewing.
PRESSER FOOT	The attachment on a sewing machine that holds the fabric in place while sewing.
PRESSING	Using an iron to flatten seams and creases in fabric.
SEAM	A line of stitching that joins two pieces of fabric together.
SEAM ALLOWANCE	The area between the fabric edge and the stitched line on two (or more) pieces of material being sewn together.



UNPICKER	Used to undo sewing mistakes. It has a sharp point and a small blade . Run it along the stitches to cut the. Also called a seam ripper.
WADDING	Used as a layer of insulation between fabrics – typically used in quilt making.
WHIP STITCH	A simple stitch used in sewing. Usually used to sew together two separate pieces of material with flat edges. Whip stitching creates a nice edge and prevents the fabric from unravelling
WOVEN	Woven fabric is any textile formed by weaving. Woven fabrics are often created on a loom, and made of many threads woven on a warp and a weft.

## Design Technology: Product Design - Pinball

AESTHETICS	A set of principles concerned with the nature and appreciation of beauty.  The way something looks or appears.
ANALYSE	To look closely at the problem. To break down into basic parts so that the problem can be understood. Analysis is used in the early stages of the design process.
ANNOTATION	Adding words, phrases and detailed notes to your work that explain your thoughts, ideas and intentions.
BELT SANDER	a Belt Sander that uses a moving abrasive belt to smooth surfaces.
CHISEL	Used to remove waste wood when cutting joints. Generally used across the grain.
CONSUMER	A person who buys or uses products and services.
COPING SAW	A framed saw with a narrow blade. The blade makes it possible to saw around curves. Used to cut irregular shapes in acrylic, also used to remove most of the waste wood when cutting dovetails or comb joints.
COST	How much does the product cost to buy and make?
DESIGN	A creative process. Producing a final solution through a problem solving creative process of developing ideas within set constraints.
DEVELOPMENT	Refining ideas to produce a final solution; taking into account all the constraints of costs, materials, function, manufacturing, aesthetics etc.
DIMENSION	The size of the object. Adding dimensions to a drawing means to add the measurements.
DOWEL	A wooden peg used for holding together components of a structure or joint.
EVALUATE	Critically consider how effective or successful a design is.
LASER	Stands for Light Amplification by Stimulated Emission of Radiation - Lasers are used in drilling, cutting, alignment, guidance and even in surgery. The optical properties can be used for reading barcodes or playing CDs.



MANUFACTURED BOARDS	Man-made material comprises of a range of sheet materials produced by pressing and bonding together wood particles, fibres or veneers to achieve a particular characteristic
PILLAR DRILL	Pillar drills are free standing machine tools used by engineers that use high powered motors to rotate drill bits at varying speed. These bits are then used to accurately machine, drill or tap holes in a variety of materials such as metal and wood
SANDING	To make something smooth by rubbing it with something rough, especially sandpaper.
TARGET MARKET	A group of potential customers that you identify to sell products or services to
TENON SAW	A Tenon Saw is a large backsaw used for making deep, accurate cuts in furniture joinery. It should make straight, fast cuts without binding.
THEME	A topic selected for artistic representation. Themes are open to different interpretations and relate to what the piece is about rather than the specific things it shows.

### Design Technology: Product Design – Chocolate Bar

ACCURATE	Correct in all details and fairly exact.
AESTHETICS	A set of principles concerned with the nature and appreciation of beauty. The way something looks or appears.
ANALYSE	To look closely at the problem. To break down into basic parts so that the problem can be understood. Analysis is used in the early stages of the design process.
ANNOTATION	Adding words, phrases and detailed notes to your work that explain your thoughts, ideas and intentions.
BARCODE	A barcode is the small image of lines (bars) and spaces that is affixed to retail store items, identification cards and postal mail to identify a particular product number.
CAD	Computer-Aided Design is the use of computer-based software to aid in design processes. CAD software can be used to create two-dimensional (2-D) drawings or three-dimensional (3-D) models. CorelDraw is an example of CAD software.
CAM	Computer-Aided Manufacturing usually works together with CAD (computer-aided design) to enable machines to create objects directly from computer designs and software. The CNC router is an example of CAD.
3D PRINTING	Three-dimensional (3D) printing is an additive manufacturing process that creates a physical object from a digital design. The process works by laying down thin layers of material in the form of liquid or powdered plastic, metal or cement, and then fusing the layers together.
CONSUMER	A person who buys or uses products and services.



CRITERIA	A list of requirements that the design must meet.
DESIGN	A creative process. Producing a final solution through a problem-solving creative process of developing ideas within set constraints.
EVALUATE	Critically consider how effective or successful a design is.
FAIRTRADE	A partnership between producers and consumers; selling on Fairtrade terms provides farmers with a better deal and more income. This allows them the opportunity to improve their lives and plan for their future.
LOGO	A logo is a symbol or design used to identify a company or organisation, as well as its products, services, employees, etc. In its simplest definition, a logo identifies. It's how your company is recognised and remembered, among others.
MOULD	A hollow container used to give shape to molten or hot liquid material when it cools and hardens.
PLYWOOD	Plywood is a <u>composite material</u> manufactured from thin layers, or "plies", of <u>wood veneer</u> that are glued together with adjacent layers, having both glued with each other at right angle or at 90 degrees angle.
TARGET MARKET	A group of potential customers that you identify to sell products or services to
THEME	A topic selected for artistic representation. Themes are open to different interpretations and relate to what the piece is about rather than the specific things it shows.
VACUUM FORMING	Vacuum forming is a manufacturing method used to shape plastic materials.  During the vacuum forming process, a sheet of plastic is heated and then pulled around a single mould using suction.

## $Design\ Technology:\ Food-Understanding\ Nutrition$

ALLERGEN	Substances that causes an allergic reaction, e.g. nuts and eggs
CONDUCTION	Heat is transferred between two surfaces by direct contact, and molecules in each surface pass heat to each other.
CONVECTION	Heat is transferred by the circulation of either a heated liquid or gas, e.g. boiling or in the oven.
CREAMING METHOD	When sugar is combined with a solid fat, typically butter, margarine or shortening. A method for making cakes such as Victoria sponge
DAIRY FOODS	Foods made from animal milk, such as yoghurt, cheese and cream.
DANGER ZONE	The temperature range ( 5°C to 63°C) within which bacteria multiply rapidly.
DRVs	Dietary Reference Values are an estimate of the nutritional requirements of a healthy population.
GELATINISATION	The thickening of a mixture, in the presence of heat, due to swelling of starch grains.



HEAT TRANSFER	The way heat moves from one area to another through conduction, convection and radiation.
HIGH RISK FOOD	Foods that are high in moisture and nutrients, especially protein (perishable foods: meat, shellfish, cooked rice, eggs, milk, cream). They support the growth of pathogenic microorganisms, such as bacteria.
LACTOSE INTOLERANCE	When a person is unable to digest lactose, a sugar found in milk and some other dairy foods. This condition can cause bloating, cramps and nausea etc.
MARINADING	A process of soaking foods in a liquid mixture, e.g. wine, vinegar or lemon juice with various herbs and spices, prior to cooking
NUTRIENTS	The properties found in food and drinks that give nourishment – vital for growth and the maintenance of life. The main nutrients are carbohydrates, proteins, fats (known as MACRONUTIRENTS), vitamins and minerals (known as MICRONUTRIENTS).
PULSES	Including beans, lentils, and the seeds of legume plants.
RADIATION	The transfer of heat energy by particles or waves, e.g. using the microwave or toaster
SHORTENING	Butter, lard or other fat that remain solid at room temperature, used for making pastry or bread. Also, the ability for fat to shorten the length of the gluten molecules in pastry or shortbread.
SPECIAL DIET	Is one that cannot be selected freely from the main choices available. This could be due to an allergy, intolerance or other medical need, religious or cultural diet or for ethical or moral reasons, e.g. halal
STAPLE FOODS	Food that forms a large part of the diet, usually from starchy foods.
TOFU	A high protein food made by coagulating soya milk and pressing the resulting curds into a soft white block.
VEGANS	People who do not use or eat any animal products, such as leather, meat or dairy. They can eat plant protein soya, TVP, tofu.



#### Music: Musical Elements

Key Word	Definition
Rhythm	Patterns of sounds in time
Tempo	The speed of music
Percussion	Instruments that are struck
Notation	How we read and write music on paper
Crotchet (J)	A note lasting for 1 beat or count
Texture	How many parts / layers there are in a piece of music
Unison	More than one person playing together, all playing the same thing
Polyrhythm	More than one person playing together, but all playing different rhythms
Structure	The different sections in a piece of music
Dynamics	How loudly or quietly an instrument is playing
Bar	A very small section of music, usually 4 beats long
Composition	A piece of music that you make



#### Drama: Ensemble & movement

Key Word	Definition
Naturalism	The presentation of real life on stage in a realistic way
Non-naturalism	An experimental and creative style of Drama that does NOT present real life realistically (should not be confused with sci-fi and aliens!)
Breaking the	Crossing the imaginary boundary between audience and actor to immerse
fourth wall	the actors in what is going on
Ensemble	A group of actors working together with equal responsibility
Non-linear	Not in order
Physical theatre	Using movement instead of words to tell a story