Knowledge Organiser Booklet Year 2

Autumn 1

Name		Class	

Contents

Page 3	Using Your Knowledge Organiser Guide
Page 4	Computing Knowledge Organiser
Page 5	Design Technology Knowledge Organiser
Page 6	Geography Knowledge Organiser
Page 7	Personal, Social, Health and Economic Education Knowledge Organiser
Page 8	Physical Education Knowledge Organiser 1
Page 9	Physical Education Knowledge Organiser 2
Page 10	Science Knowledge Organiser
Page 11	School Values

Use your knowledge organisers to help you remember more.

	Check it!	Link it!	Test it!
1	Write down the key words and definitions.	Create a mind map with all the information you can remember from your knowledge organiser.	Use your knowledge organiser to write down key facts or information onto cards.
2	Try doing this without the help of your knowledge organiser.	Check your knowledge organiser to see if there are any mistakes on your mind map.	Add pictures to help support you to remember things. Use the cards to make up questions.
3	Check your work and make any corrections using your green pen.	Try to make connections, linking the information together.	Ask a friend or a member of your family to quiz you on what you remember!

This is your Year 2 Computing Knowledge Organiser for Autumn 1 - IT Around Us

Tier 2 Vocabulary	Key Vocabulary				
analyse	**computer**	**technology**	**device**	**tablet**	**digital**
To study closely	Electronic equipment that holds information	A collection of tools used to help people	A piece of equipment that has a purpose	A handheld **computer**	Information that is stored on a computer
In computing, we can **analyse** equipment to find out how it works.	A **computer** can hold things like words, numbers, pictures, movies and sounds.	Laptops, iPads and televisions are all types of **technology.**	An electronic **device** can be used to store the things that we create.	A **tablet** also holds information and we use it by touching the screen.	**Digital** technology helps us to communicate, learn and play.
I can **analyse** a text I am reading to find out what it is telling me.	We will use a **computer** to create, write and open a file.	We will explore different types of **technology** and say how they help us.	A **device** like a computer or an iPad will help us to create our work.	We can also use a **tablet** to create, write and open files.	We will create and save our learning **digitally** on to a computer.
We will **analyse** different objects and say if they are **technology** or not.					

How this connects with previous learning			How this connects with future learning		
In Reception, you explored different types of technology, such as iPads and Bee-Bots.	In Year 1, you explored how technology helps us in different ways.	In Year 1, you used technology to create digital writing and painting.	Later in Year 2, you will use technology to create digital photographs and music.	Later in Year 2, you will use devices to program quizzes.	In Year 3, you will use a range of devices to create programs.

This is your Year 2 Design Technology Knowledge Organiser for Autumn 1 - Freestanding Structures

DT Themes

structure	fix	product
Something that is made up of a number of parts connected together in an ordered way.	To attach firmly.	Something that is made by humans or machines.
A house is a **structure** that people live in.	It is important to **fix** materials together so that the structure doesn't fall apart.	All structures are a type of **product**.
We can build a simple **structure** by stacking blocks on top of each other.	We will explore a range of techniques to **fix** materials together.	A finished **product** is the final outcome.
Structures can be built for a range of purposes.	Masking tape and glue are two ways we can **fix** materials together.	Every **product** has a specific purpose.

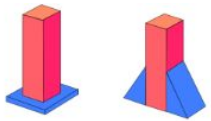
Tier 2

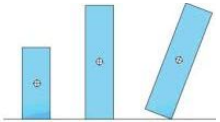
Key Vocabulary

freestanding	surface	base	tower
An objects that stands up on its own.	The outside of an object.	The lowest surface of an object.	A tall narrow structure that rises high above the ground.
A **freestanding** object isn't attached to anything else.	The **surface** of an object can be flat or curved.	The **base** of the climbing frame touches the ground.	We can build a tall **tower** out of blocks.
We will use a variety of materials to make **freestanding** structures.	A slide has a **smooth** surface.	A wider base helps keep a structure stable.	A **tower** has a small base. This can make it tricky to stabilise.









How this connects with previous learning

In Reception you planned and created a model.	In Year 1, you made a poster using sliders and levers, fixing materials together.	In Year 1, you designed, made and evaluated a fabric doll, fixing materials together.

How this connects with future learning

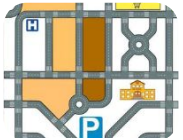
In Year 2, you will sew fabric together, ensuring it is attached firmly.	In Year 3, you will make a shell structure.	In Year 5, you will make a frame structure from wood.

This is your Year 2 Geography Knowledge Organiser for Autumn 1 - Map It

Tier 2 Vocabulary

collect	record
To bring or gather together.	To keep information by writing or typing it.
In Year 1, you **collected** information on people's favourite place in the local area.	In Year 1, you **recorded** your results in a pictogram.
We can **collect** information about **traffic** near our school.	We will **record** the findings from our **traffic** survey,
I **collected** all the books.	I kept a **record** of all the books I read.

Key Vocabulary

continent	ocean	map	symbol	traffic
A very large area of land that is made up of several countries.	A very large area of water.	A diagram that shows where places are located.	An image used to represent something on a **map**.	All the vehicles moving along roads in a particular area.
We live in the **continent** of Europe.	There are five **oceans**.	I used the **map** to help me find my way to the shop.	The key showed me what each **symbol** means on the **map**.	There was lots of **traffic** on the Seven Sisters Road.
There are seven **continents** .	The five **oceans** are all connected.	The **map** showed me what was in the local area.	I used the **symbols** to help me locate the swimming pool.	I was surprised that there was no **traffic** this morning.
				

How this connects with previous learning

In Year 1 you learned that we live in Hackney which is in England. You learned that England is in the United Kingdom.	In Year 1, you learned about the physical and human geography of the local area.	In Year 1, you learned about the water surrounding the United Kingdom.



How this connects with future learning

In spring 1, you will compare Hackney with a small area of Egypt in the continent of Africa.	In summer 2, you will learn about the climate in different continents.	In Year 3, you will learn why we have different climates across the world. .

This is your Year 2 Personal, Social, Health & Economic Education Knowledge Organiser for Autumn 1 - My Healthy Self

Key Vocabulary

daily routine

To stay healthy it is important to build healthy habits into a **daily routine** .

Healthy habits are things you do often to keep your body and mind healthy.

Your daily routine should include physical activity, regular mealtimes, twice-daily teeth brushing, time for relaxation and a bedtime routine which helps you to get enough sleep to be rested and stay healthy.



exercise

Exercise is physical activity or the movement of the body for our health and fitness.

Physical activity helps keep our body and mind healthy. It is good for our heart, lungs, bones and muscles. It helps our brains to concentrate so that we can learn better. It is fun and can help to keep us happy!

We should try to be active for at least one hour a day.



five-a-day

Five-a-day means eating the recommended five portions of fruit and vegetables each day. These can be fresh, frozen, tinned or dried. A portion is the amount that fits in the palm of your hand.

By eating fruit and vegetables every day our minds and bodies will stay strong and healthy. It is good to eat lots of different coloured fruits and vegetables to help our bodies get different vitamins to stay healthy.

healthy

If you are **healthy** , you are well both physically and mentally.

We need to be physically active and sleep well. We need to eat a variety of foods to be healthy. We should only eat foods which are high in fat, sugar or salt occasionally.

We need to stay hydrated by drinking enough water each day to help our body work properly.



relaxation

Relaxation means resting or taking a break. Relaxation helps our bodies but also helps us deal with difficult situations.

Getting the right amount of sleep every night helps us rest and stay healthy and well.

We can use relaxation techniques such as muscle relaxation, breathing exercises and laughter to relax. Activities such as having a bath, walking, swimming, reading and yoga can help us relax.

teeth

Teeth are the hard, white parts in the mouth used for biting and chewing. They are held in place by our gums.

We can keep our teeth and gums healthy by eating a balanced diet and avoiding too much sugary food. We should brush our teeth for two minutes, twice a day using a pea-sized amount of toothpaste that contains fluoride. We might floss or use an interdental brush too. We should visit the dentist for check ups.



How this connects with previous learning

In Reception, we learnt how to make good food choices throughout the day and keep hydrated. We learnt about positive and negative feelings and how to express them.

In Year 1, we described different feelings and how to identify them. We learnt about the importance of relaxation. We explored different ways to stay safe including sun safety and handwashing, what an emergency is and what to do.



How this connects with future learning

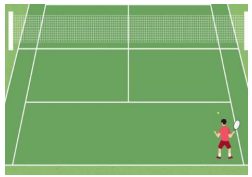
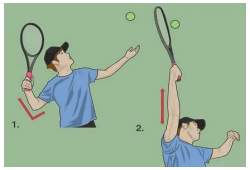
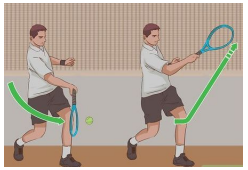
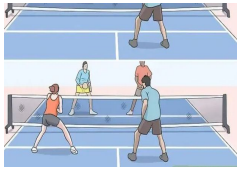
In Year 3, we will explore body language, feelings, mood and strategies to help with big feelings. We will understand the importance of sleep.

In Year 4, we will understand the difference between fixed and growth mindsets and understand how to deal with failure positively. We will identify how to take responsibility for our own happiness.

In Year 5, we will understand the importance of nutrients and a balanced diet. We will explore the benefits of different types of activities. We will learn about self-regulation and appropriate responses.

This is your Year 2 Physical Education Knowledge Organiser for Autumn 1 - Send and Return

Key Vocabulary

court	net	serve	strike	opponent	tactics
An area designed for specific sports such as tennis.	A net is used to separate two sides of the court.	the act or action of putting the ball or shuttlecock in play in various games	The action of hitting an object using a bat or racket.	Someone who is on the opposite team.	A way of thinking which can help you to achieve something.
I enjoy playing on the tennis **court.** 	In tennis the net is in the middle of the court, the aim is to strike the ball over the net. 	In order to begin the game we must serve the ball into the court 	In tennis, you strike the ball over the net to try and score points. 	You need to hit the ball away from your opponent to score points 	The tactic for today is to hit the ball over my opponents head 

How this connects with previous learning

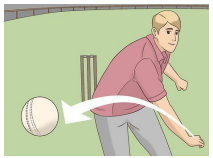
In reception we learned how to hold a tennis racket.	In year one we learned how to hit a moving ball using a racket.

How this connects with future learning

In year 3 we will learn how to serve to begin a tennis game.	In year 4 we will explore different types of tennis shots.	In year 5 we will learn how to apply different types of shots to game situations.

This is your Year 2 Physical Education Knowledge Organiser for Autumn 1 - Hit, Catch, Run

Key Vocabulary

stumps	underarm	overarm	bowler	strike	umpire
The **stumps** are the three wooden sticks that are placed upright in the ground to make the **wicket.**	When you throw a ball **underarm** , you do not raise your arm above your shoulder.	Throwing a ball **overarm** is when you stretch your arm over your shoulder and release.	The **bowler** is the player who throws the ball to the hitter/batter.	**Strike** is another word for hit. The batter tries to **strike** the ball to score points.	An **umpire** makes sure the game is being played fairly and that the rules are not broken.
The batter tries to hit the ball before it touches **stumps** .	When throwing **underarm** you should face the direction you are throwing and release the ball at waist height.	When throwing **overarm** you should stand side-on to the direction you are throwing and release when your arm is in line with your head.	The **bowler** is aiming to hit the **stumps** with the ball to get the batter out.	In cricket, rounders and baseball, the aim is to **strike** the ball as far as you can. The harder you **strike** , the further the ball will go.	Cricket, rounders and baseball all have an **umpire.** In football the **umpire** is called the referee.
					

How this connects with previous learning

In Reception you learnt to send and receive objects with more accuracy and work with teammates.	In Year 1 you learnt about the roles of batters and fielders.



How this connects with future learning

In Year 3 you will learn how to play a simple game of rounders.	In Year 3 you will also develop and use simple rounders skills linked to hitting and catching.	In Year 4 you will learn a range of tactics and how to apply them in a competitive way.

This is your Year 2 Science Knowledge Organiser for Autumn 1 – Living Things and Their Habitats

Scientific Enquiry

identifying & classifying

Identifying means knowing what something is and naming it. We will **identify** and name a variety of plants and animals in each habitat or microhabitat.
Classifying means grouping things together if they have something in common. We will **classify** things that are living, dead and have never been alive.

researching

We will find out about habitats outside our local area by **researching** using secondary sources such as non-fiction books.

Working Scientifically

Asking scientific questions
Planning an enquiry
Observing closely
Measuring (taking measurements)
Gathering and **recording** results
Presenting results
Interpreting results

Subject Specific Vocabulary

living things

All objects are either living, dead or have never been alive. **Living things** are plants (including seeds) and animals.




Dead things include dead animals and plants and parts of plants and animals that are no longer attached such as leaves, twigs, shells, fur, hair and feathers. Objects made of rock and metal have never been alive.

habitat

A **habitat** is a place where a plant or animal makes its home. Animals and plants live in a habitat to which they are suited.



A **habitat** provides the basic needs of the animals and plants – shelter, food and water. Examples of **habitats** are: **woodland, urban, desert, rainforest, ocean, polar, pond**.

microhabitat

Microhabitats are small parts of a habitat that have their own conditions like temperature which suit its plants and animals.

A **rotting log** in a woodland habitat is a **microhabitat** .



A **rockpool** in a coastal habitat is a **microhabitat** .



shelter

A **shelter** is a place or structure giving protection against weather or danger.

The woodpecker is **sheltering** in the tree.



The vole is **sheltering** inside the log.



food chain

All plants and animals need food to live. Plants make their own food. Animals cannot make their own food. They eat plants and/or other animals.

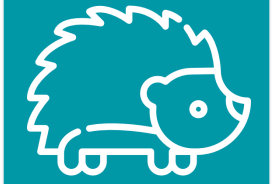
Food chains show the animals and/or plants eaten by other animals.



This **food chain** shows grass is eaten by a rabbit and the rabbit is eaten by a fox.

Things you learnt in previous topics

In Year 1, you identified and named plants and trees in your local area and learnt what the main parts of common flowering plants, including trees were: stem, petal, branch, leaf. You also learnt about different animal types: fish, amphibians, reptiles, birds and mammals and described and compared their structures. You identified and named some common animals within each group. You learnt the words carnivore, herbivore and omnivore and could name animals in each group. You observed, recorded and discussed changes across the four seasons: autumn, spring, summer, winter.



How this connects with future learning

Later this year, you will observe and describe how seeds and bulbs grow into mature plants. You will find out about and describe how plants need water, light and a suitable temperature to grow and stay healthy.
In Year 4, you will learn that living things can be grouped in different ways. You will use and create classification keys. You will recognise that environments can change and that this can sometimes pose dangers to living things. You will construct and interpret a variety of food chains, identifying producers, predators and prey.

At New Wave Federation, we demonstrate...



Collaboration

Creativity

Focus

Kindness

Responsibility