

Knowledge Organiser

Year 5

St Mary's Swanage



Autumn Term 2022



Art Y5 Autumn Term

Portraits and WW2

National Curriculum Aims

- Produce creative work
- Become proficient in drawing and painting
- Evaluate and analyse
- Know about great artists.

Prior Knowledge:

Drawing

- Know how to draw whole sketches with detail of surrounds
- Know how to confidently work from imagination.
- Know how to solidify infill shapes with coloured pencils and can produce a range of tones with each.
- Know how to use cross hatching
- Know how to express different feelings through drawing.
- Know how to use appropriate language.

Painting:

- Know how to use paint and equipment correctly and with increasing confidence.
- Know how to use the colour wheel to mix different shades of the same colour.
- Know how to use tints and tones
- Know how to work with different consistencies of paint.
- Know how to use language appropriate to skill.

Drawing:

- Know how to use a range of pencils
- Know how to create depth in a composition through the use of very simple perspective.
- Know how to experiment with shading techniques
- Know how to use language appropriate to skill and techniques

Painting:

- Know how to use tints in their work
- Know how to apply paint to large flat areas of colour and use appropriate brushwork to the method of painting.
- Know how to use of colours and their relationships
- Know how to work from direct observation.
- Know how to use language appropriate to skill and technique.



Vocabulary

depth, intention, pointillism, surrealism, focal points, Complementary, replicate, tonal contrast, acrylic, tessellation, element, influential, Annotate, Sepia, impressionism

Computing Y5 Autumn Term

Computing Systems - Sharing Information

Prior Knowledge:

The internet: Recognising the internet as a network of networks including the WWW, and why we should evaluate online content.

Key Knowledge

Sharing information:

- I know that computers can be part of a system in an electronic device.
- I know that computers can communicate with other devices.
- I know how information is transferred across the internet.
- I know that data is transferred in packets.
- I know that connections between computers allow us to work together.

National Curriculum Aims

- Understand computer science.
- Analyse problems and write computer programs to solve them.
- Evaluate information technology.
- Will be a responsible, competent and creative user of ICT.

Vocabulary

Systems
Devices
Processes
Search engine
Searches
Address bar
Web crawler
Content

Computing Y5 Autumn Term

Creating Media - Vector Drawings

Prior Knowledge:

Photo editing:
Manipulating digital images,
and reflecting on the impact
of changes and whether the
required purpose is fulfilled.

Key Knowledge

Vector drawing:

- Know that a vector drawing comprises separate objects.
- Know how to add object to a vector drawing.
- Know how to work in layers.
- Know how to use alignment and size guides.
- Know that vector images can be scaled without loss of quality.

National Curriculum Aims

- Understand computer science.
- Analyse problems and write computer programs to solve them.
- Evaluate information technology.
- Will be a responsible, competent and creative user of ICT.

Vocabulary

Vector drawing
Object
Moving
Resizing
Rotating
Changing
Duplicate
zoom

DT Y5 Autumn Term

Mechanical systems : CAMS

Prior Knowledge:

Experience of axles, axle holders and wheels that are fixed or free moving.

- Basic understanding of different types of movement.
- Experience of cutting and joining techniques with a range of materials including card, plastic and wood.
- An understanding of how to strengthen and stiffen structures.

Key Knowledge

- Understand that mechanical systems have an input, process and an output.
- Understand how cams can be used to produce different types of movement and change the direction of movement.
- Know and use technical vocabulary relevant to the project.

Vocabulary

cam, snail cam, off-centre cam, peg cam, pear shaped cam
follower, axle, shaft, crank, handle, housing, framework
rotation, rotary motion, oscillating motion, reciprocating motion
annotated sketches, exploded diagrams
mechanical system, input movement, process, output movement
design decisions, functionality, innovation, authentic, user, purpose, design
specification, design brief

National Curriculum Aims

- Develop creative, technical and practical expertise.
- Design and make products for a range of users.
- Evaluate my designs.
- Understand and apply the principles of nutrition and learn how to cook.

English Y5 Summer Term

National Curriculum Aim

Promote high standards of language and literacy by equipping pupils with a strong command of the spoken and written word, and to develop their love of literature through widespread reading for enjoyment.

Reading

- Take part in play readings and perform, showing understanding through intonation, tone and volume and an appreciation of the impact on an audience
- Predict what might happen in a text using details from the text and information that is implied.
- Check that the book makes sense and discuss new and unfamiliar vocabulary.
- Drawing inferences about characters' feelings, thoughts and motives from their actions, using the text to support ideas.

Spoken Word

Speak clearly and audibly showing an increasing awareness of the listener.
In discussions justify arguments and opinions.
Challenge other's views courteously.
Maintain the attention of an audience.
Keep to the topic/ discussion/ theme.

Writing

- Write for a range of audiences and purposes: diary/ letter/ narratives/ play scripts/ newspaper articles.
- Select interesting and adventurous vocabulary and identify how choices might change and improve meaning.
- In narrative writing use texts as a model.
- Proof-read for spelling and punctuation errors
- Edit writing for improvements.

Grammar and Punctuation

- Revise word classes.
- Use commas to clarify meaning or avoid ambiguity.
- Use apostrophes correctly.
- Use a wide range of conjunctions to create compound and complex sentences.

History Y5 Autumn Term

Tyneham / Studland and WW2

National Curriculum Aims	
Know chronology of topic studied.	
Understand significant events.	
Understand historical terms.	
Understand historical concepts and use the terminology to make connections.	
Understand and take part in historical enquiry.	

Prior Knowledge:

Used primary sources to support historical enquiry.

Key Knowledge

- Know that D-Day was the Allies' plan to invade France and basic details about what the plan consisted of and when it took place.
- Know some of the measures Britain had to take on the Home Front to protect Britain and prepare the armed forces for the D-Day invasion and how these were implemented in the local area.
- Know how and why the Studland peninsula was used for D-Day preparation (Exercise Smash).
- Identify evidence of the D-Day landings preparation that is still on the Studland peninsula today.
- Know when Tyneham was requisitioned by the M.O.D. and why.
- Know what the impact was on the people of Tyneham.
- Make comparisons between Tyneham before and after the requisition.
- Know about the campaign the villagers mounted to regain the village, and why their campaign was not successful.
- Use primary sources to support judgements and investigations.

Vocabulary

D-Day
 War Office / Ministry of Defence
 Tyneham
 requisitioned
 shelling
 compulsory purchase order
 Studland
 Fort Henry
 observation post
 dragon's teeth
 pill box
 Exercise Smash
 General Eisenhower (Supreme Commander of Allied Forces)
 bunker
 amphibious craft
 semi-submersible tank

History Y5 Autumn Term

Battle of Britain - a Turning Point

National Curriculum Aims
Know chronology of topic studied.
Understand significant events.
Understand historical terms.
Understand historical concepts and use them to make connections.
Understand and take part in historical enquiry.

Vocabulary
 Winston Churchill
 Air Marshall Chief Sir Hugh Dowding
 R.A.F (Royal Air Force)
 Fighter Command
 Spitfire
 Hurricane
 radar
 siren
 Sortie
 scramble
 The Few
 English Channel
 Hermann Göring
 Luftwaffe
 Eagle Attack
 (*Adlerangriff*) - main offensive
 Operation Sealion
 (*Unternehmen Seelöwe*)
invasion
 Heinkel He 111
 Junkers Ju 88
 Messerschmitt
 Junker Ju 87 “Stuka”
 dive-bomber
 propaganda
 morale
 The Blitz

Prior Knowledge:
 used primary sources to support historical enquiry.

Key Knowledge

- Know when World War Two started and basic reasons why; its duration; countries involved.
- Know what led up to the Battle of Britain (basic background - Blitzkrieg / fall of France / Dunkirk).
- Know when the Battle of Britain took place and its duration.
- Know what airplanes and technological advances (radar link to Leeson House) were in use in the battle.
- Know the factors that contributed to the Luftwaffe losing the Battle of Britain (strengths and weaknesses of the RAF and Luftwaffe).
- Know why the Battle of Britain was a turning point in the war.
- Know why it was so important that Britain won the Battle of Britain.
- Know the part propaganda played during and after the Battle of Britain to lift morale.
- Identify and use sources of evidence to support judgements.



Maths Y5 Autumn Term

Power Maths Termly Overview

National Curriculum Aims
Become fluent in the fundamentals of mathematics
Reason mathematically
Solve Problems

Termly Overview		
1	Number - Number and Place Value	Number to 1,000,000
2	Number - Addition and Subtraction	Additional and Subtraction
3	Number - Multiplication and Division	Multiplication and Division
4	Data Handling	Graphs
5	Number - Number and Place Value	Fractions

MFL Y5 Autumn Term

Me presento (Presenting myself)

National Curriculum Aims
Understand spoken and written language.
Speak with accurate pronunciation and intonation.
Write for different audiences.
Discover and develop and. Appreciateion of. The language studied.

Vocabulary

¿Cómo te llamas? - What's your name (informal)
 (Yo) me llamo... - My name is...
 ¡Hola! - hello
 ¡Adiós! - goodbye
 ¿Cómo estás? - How are you?
 Estoy bien - I'm fine
 Estoy mal - I'm not good
 Más o menos / así, así - So, so
 ¿Cuántos años tienes? - How old are you?
 Tengo... años - I am ...years old
 ¿Dónde vives? - Where do you live?
 Vivo en... - I live in...
 Soy español - I'm Spanish (male)
 Soy española - I'm Spanish (female)
 Soy inglés- I'm English (male)
 Soy inglesa- I'm English (female)
 once - 11
 doce - 12
 trece - 13
 catorce - 14
 quince - 15
 dieciséis - 16
 diecisiete - 17
 dieciocho - 18
 diecinueve - 19
 veinte - 20

Prior Knowledge:

- Know how to say “hello” and “goodbye”
- Know numbers 1 – 10
- Know how to ask and respond to questions about how you or another is feeling and their name
- Know that “¿Dónde vives?” means “Where do you live?” and that “Vivo en...” means “I live in...”
- Know that “Soy” means “I am”
- Understand that all nouns in Spanish are either masculine or feminine

Key Knowledge

- Phonetics Review: ch, j, ñ, ll, rr, ca, ce, ci, co, cu
- New Phonetics: ga, ge, gi, go, gu
- Review numbers 1 – 10; learn numbers 11 – 20; count to 20
- Ask somebody their name and age, and say my name and age in reply
- Recall and say “hello” and “goodbye” and ask how somebody is feeling and answer in reply how I am feeling
- Ask someone where they live and answer back where I live
- Say what my nationality is, an understand what gender and agreement is in Spanish

MFL Y5 Autumn Term

La familia (The Family)

Prior Knowledge:

- Know numbers 1 – 20
- Read, write and say the masculine and feminine forms of the indefinite article: “a” (un/una)
- Understand that all nouns in Spanish are either masculine or feminine
- Read, write and say the masculine and feminine forms of the singular definite article: “the” (el/la)
- Know how to ask what someone’s name is and how to say what my name is
- Know that “tengo” means “I have”



National Curriculum Aims

Understand spoken and written language.

Speak with accurate pronunciation and intonation.

Write for different audiences.

Discover and develop and. Appreciateion of. The language studied.

Key Knowledge

- Recognise, say and write the nouns for family members
- Tell somebody the members in my family (real or fictitious, historical, television) and their names and ages
- Listen to, read, recognise, say and write numbers 1 – 100
- Use, say and write the possessive adjective: “my”

Vocabulary

la mamá - the mother

la abuela – the grandmother

la tía - the auntie

la hija – the daughter

una hermana / la hermana – a sister/the sister

el hijo – the son

un hermano / el hermano – a brother /the brother

el tío - uncle

el papá - the father

el abuelo – the grandather

los padres – the parents

los abuelos – the grandparents

¿Cómo se llama? - What is he/she called?

él se llama... - he is called...

ella se llama... - she is called...

Mi... - my (masculine and feminine singular)

Mis... - my (masculine and feminine plural)

¿Tienes un hermano? - Do you have a brother?

¿Tienes una hermana? - Do you have a sister?

Sí, tengo un hermano – Yes, I have a brother

Sí, tengo una hermana – Yes, I have a sister

Sí, tengo dos hermanos / hermanas – Yes, I have 2 brothers / sisters

No, soy hijo único - No, I’m an only child (male)

No, soy hija única - No, I’m an only child (female)

diez – 10

veinte – 20

treinta – 30

cuarenta – 40

cincuenta – 50

sesenta – 60

setenta – 70

ochenta – 80

noventa – 90

cien - 100

Music Y5 Autumn Term

Livin' on a Prayer

Classroom Jazz 1

National Curriculum Aims

Perform, listen to and evaluate a range of music.

Learn to sing, create and compose music and play an instrument.

Understand how music is created and use appropriate notation.

Prior Knowledge:

Performing

- Know how to perform a simple part including rests.
- Know how to improvise using repeated patterns.
- Know how to maintain a part in a group showing awareness of others.
- Memorise songs and perform with accuracy.

Composing

- Know how to use basic rhythmic notation to transcribe ideas.
- Know how to notate a composition using basic notation and use to record performance.
- Explore and compose a short song (lyrics and melody) and perform

Listening and appraising

- Know and identify the different purposes of music, using musical vocabulary.
- Develop their understanding of a musical timeline, recognising there are different eras of music and being able to recognise their differences.
- Know how silence can affect the overall effect of a musical piece or idea.

Key Knowledge

Performing

- Know how to sing or play using correct phrasing and demonstrate understanding of how to add expression.
- Know how to hold a part in a group
- Know how to perform music using a variety of structural forms
- Know how to perform by ear and using simple notations

Composing

- Know how to use basic rhythmic notation to transcribe ideas.
- Know how to notate a composition using basic notation and use to record a performance.
- Know how to compose a short song (lyrics and melody) and perform.

Listening and appraising

- Know how to refine and improve compositions and performances; and suggest improvements to the work of others.
- Know how to evaluate work using appropriate musical vocabulary
- Know how to use standard musical notation to record ideas.



Vocabulary

Rock, structure, pulse, rhythm, pitch, bridge, backbeat, amplifier, tempo, texture, dynamics, chorus, bridge, riff, hook, improvise, compose

Appraising, Bossa Nova, syncopation, structure, Swing, tune/head, note values, note names, Big bands, improvise, solo

PE Y5 Autumn Term

Gymnastics – Counter Balance Football

National Curriculum Aims

Develop competence in a broad range of physical activities.

Be physically active for sustained periods of time.

Engage in competitive sports and activities.

Lead healthy, active lives.

Prior Knowledge:

Gymnastics

- Pupils will execute ‘excellent’ balances and movements within the ‘bridges’ theme. Applying flow, pupils will link these movements and balances together.

Football

- Pupils will be able to apply a secure understanding of passing, moving and dribbling in order to shoot and score goals against another team.

Key Knowledge

Gymnastics

- Pupils will execute ‘excellent’ balances and movements within the Counter Balance and Tension theme, accurately applying flow as they link their balances with movement.

Football

- Pupils will pass, move, dribble and shoot accurately and consistently, switching fluidly between attack and defence as possession changes

Vocabulary

Gymnastics

Interesting, flow , levels,

Football

Tactics, pressure, marking, tackle

PHSE/RSE Y5 Autumn Term

Being My Best

Prior Knowledge:

- Know each person is unique and makes unique choices.
- Know that the body gets energy from food, water and oxygen and that exercise and sleep are important to our health.
- Knows some examples of how people can look after their mental health.
- Knows a variety of ways in which they can contribute to the care of the environment.

Key Knowledge

- Knows the common misconceptions of smoking and understands the norm.
- Knows skills and qualities that makes themselves successful.
- Knows that the way people are portrayed in the media isn't always an accurate reflection of them in real life
- Knows the different responsibilities that they and others have for their own health and wellbeing.
- Knows how to help with burns and choking incidents.

Vocabulary

Drugs, smoking, commitment, perseverance, media, responsibility, independence, determination



PHSE/RSE Y5 Autumn Term

Keeping Myself Safe

Prior Knowledge:

- I know how risks and dangers change as I become more independent.
- I know the consequences of not keeping personal information private and some risks of social media.
- I know the features of online and offline bullying and some strategies to deal with it.
- I know the types of abuse.

Key Knowledge

- I know how risks and dangers change as I become more independent.
- I know the consequences of not keeping personal information private and some risks of social media.
- I know the features of online and offline bullying and some strategies to deal with it.
- I know the types of abuse.

Vocabulary

Pros/cons, cyberbullying, dare, pressure, addiction, habit, norms, perception, abuse, sexual, neglect, physical, emotional.



RE Y5 Autumn Term

Come and See

Themes	Topic	Title	Content
Loving	Family	Ourselves	Created in the image and likeness of God
Vocation and commitment	Belonging	Life Choices	Marriage commitment and service
Advent/Christmas	Loving	Hope	Advent; waiting in joyful hope for Jesus; the promised one

Science Y5 Autumn

Properties and Changes of Materials

As a Scientist I will be:
Develop scientific knowledge conceptual understanding
Making Observations
Engaging in Practical Activities
Recording and Presenting Evidence
Evaluating and raising questions
Communicating Findings

Prior Knowledge:

- Identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for particular uses. (Y2 - Uses of everyday materials)
- Find out how the shapes of solid objects made from some materials can be changed by squashing, bending, twisting and stretching. (Y2 - Uses of everyday materials)
- Compare and group together a variety of everyday materials on the basis of whether they are attracted to a magnet, and identify some magnetic materials. (Y3 - Forces and magnets)
- Compare and group materials together, according to whether they are solids, liquids or gases. (Y4 - States of matter)
- Observe that some materials change state when they are heated or cooled, and measure or research the temperature at which this happens in degrees Celsius (°C). (Y4 - States of matter)
- Identify the part played by evaporation and condensation in the water cycle and associate the rate of evaporation with temperature. (Y4 - States of matter)

Key Knowledge

- Compare and group together everyday materials on the basis of their properties, including their hardness, solubility, transparency, conductivity (electrical and thermal), and response to magnets.
- Know that some materials will dissolve in liquid to form a solution and describe how to recover a substance from a solution.
- Use knowledge of solids, liquids and gases to decide how mixtures might be separated, including through filtering, sieving and evaporating.
- Give reasons, based on evidence from comparative and fair tests, for the particular uses of everyday materials, including metals, wood and plastic.
- Demonstrate that dissolving, mixing and changes of state are reversible changes.
- Explain that some changes result in the formation of new materials, and that this kind of change is not usually reversible, including changes associated with burning and the action of acid on bicarbonate of soda.



Vocabulary

Thermal/electrical insulator/conductor, change of state, mixture, dissolve, solution, soluble, insoluble, filter, sieve, reversible/non-reversible change, burning, rusting, new material