West Norfolk Academies Trust

Knowledge Organisers
1st Autumn Term

Science
History
Geography
Art
PSHE
Latin
Computing
R.E.
Music
P.E.
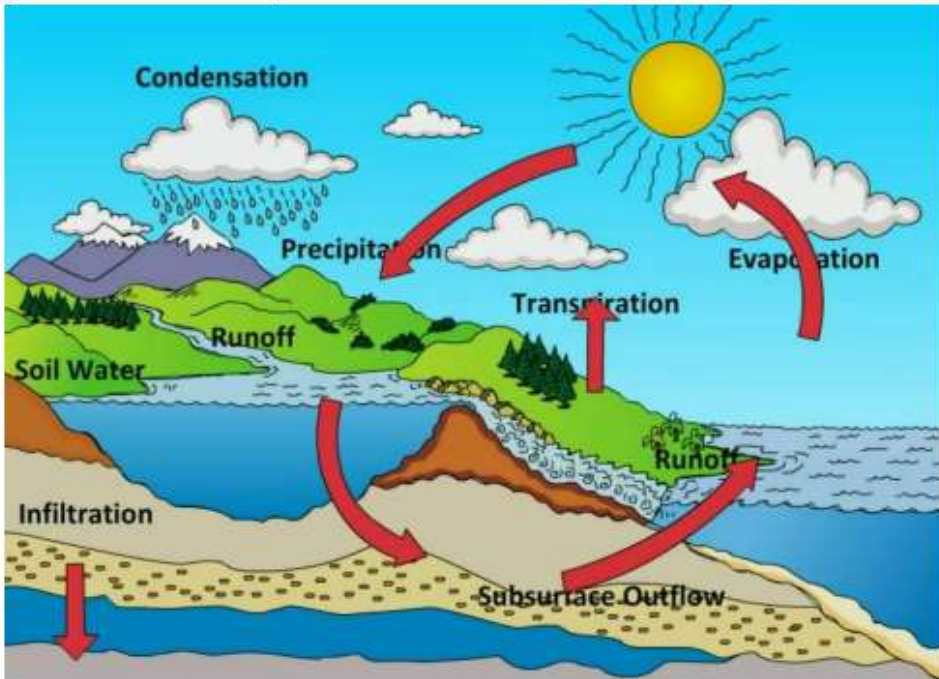
Class 3 - Year 4

Knowledge Organiser – Science – Year 4 – States of Matter

Vocabulary	
State	states of matter are solids, liquids and gases
Particle	a small portion of matter
Melt	when something becomes a liquid through heating
Cool	bring to a lower temperature
Thermometer	instrument for measuring temperature
Evaporation	process of turning liquid into vapour
Condensation	vapour or gas turns into a liquid
Reversible	When materials can be changed back to how they were before the reaction took place.
Irreversible	This is when materials cannot be changed back to how they were before.

Key Knowledge

I know the properties and behavior of particles in solids and liquids.

I understand that gas is all around us.

I know how heating a substance can change its state.

I understand which changes are reversible and irreversible.

I know that melting means turning a solid into a liquid and cooling it will reverse this.

I understand that puddles disappear when they evaporate and the water vapour condenses into clouds.

I know that water vapour turns into clouds.

I know that water cools and condenses into rain and falls (precipitation).
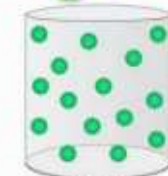
Knowledge Organiser - Anglo Saxons, Scots and Vikings - History- Year 4

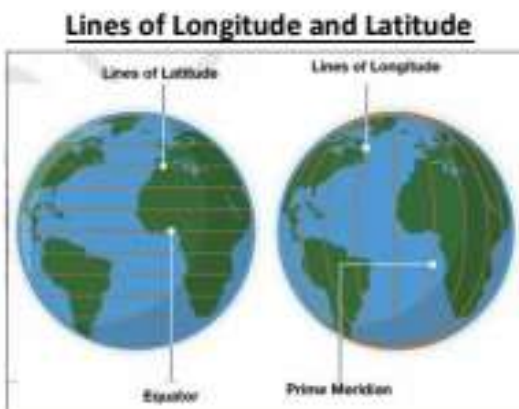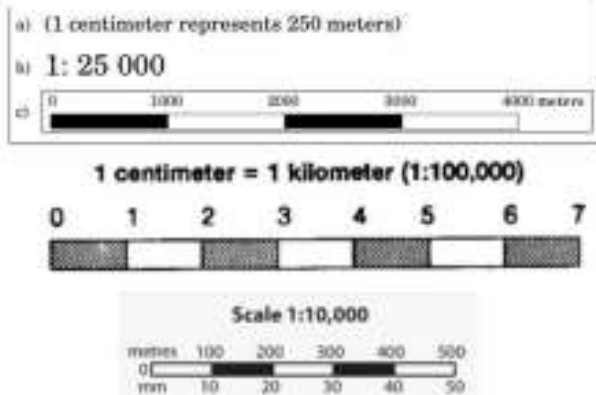| Key Vocabulary:	
Anglo-Saxon	A mix of people from Germany, Denmark and the Netherlands who came to live in England during the 5th Century. The three biggest tribes were the Angles, the Saxons and the Jutes
Viking	People of Scandinavian origin who travelled by sea and raided, invaded and settled in Europe from the 8th century
Kingdom	A country or place ruled by a King or Queen
Scots	People who lived in Scotland (previously thought to have migrated from Ireland)
Picts	Early settlers in Scotland who fought with the Romans
Settlement	A place where people live, and sometimes work
Raid	An unexpected attack where an enemy comes to steal and/or destroy
Invasion	To enter a country or place by force with the intent of taking over
Pagan	A word used to describe people who believe in many Gods and Goddesses
Trade	Exchange of goods
Oath	A serious promise
Heir	Someone who inherits a title, land or a position after someone else has died

KEY PEOPLE	
King Cnut (Canute)	A Viking king who ruled Denmark, England and Norway
Edward the Confessor	An English king who built the original Westminster Abbey
Alfred the Great	Ruled the kingdom of Wessex and fought back against the Vikings in Britain
Kenneth MacAlpin	King of the Picts who, according to national myth, was the first king of Scots
Bede (Bede the Venerable)	A monk who wrote about life in Anglo Saxon England
Ethelred the Unready	English king who paid the Vikings to stop them attacking
William the Conqueror	Defeated Harold Godwinson at the Battle of Hastings, 1066 and became King of England

Key Knowledge:
To know that the Anglo Saxons arrived after the Romans and the Picts and the Scots were early settlers in Scotland.
To know what the Anglo Saxons did for fun and their beliefs.
To know how shipbuilding skills helped the Vikings to explore.
To know that King Alfred defeated the Vikings.
To know that King Canute understood the limits of his power

Timeline

The Romans leave Britain	Angles, Saxons and Jutes begin to settle in England	St. Augustine brings Christianity to England from Rome	First recorded Viking attack in England	Vikings raided the monastery of St Cuthbert on Lindisfarne	Alfred the Great rules Wessex	King Cnut rules England	Edward the Confessor died. William of Normandy (The Conqueror) wins at the battle of Hastings
410 CE	449-450 CE	597 CE	789 CE	793 CE	871-899 CE	1016-1035 CE	1066 CE

Knowledge Organiser - Spatial Sense - Geography - Year 4

Key Vocabulary	Definition
Lines of Latitude	Imaginary lines that help us identify how far north or south of the equator a location is.
Lines of Longitude	Imaginary lines that help us identify how far east or west of the Prime Meridian a location is.
Equator	An imaginary line that shows us the locations that are half way between the north and south pole. The Equator divides the earth into the Northern Hemisphere and the Southern Hemisphere.
Prime Meridian	The line of longitude that measures 0º and runs through Greenwich in London.
Tropic of Cancer	The most northern line of latitude where the sun can be directly overhead. Named after the constellation of Cancer.
Tropic of Capricorn	The most southern line of latitude where the sun can be directly overhead. Named after the constellation of Capricorn.
Scale	The representation of distance on a map.

Key Knowledge

I know the difference between latitude and longtitude
I understand that a scale allows me to measure between two points on a map
I can use eastings and northings to find places on a map
I know that I can find key places using a map in my area
I understand that changes to the local area have happened over time and that I can see these on a map

Tropics of Cancer and Capricorn

a) (1 centimeter represents 250 meters)

b) 1: 25 000

c)

Lines of Longitude and Latitude

1 centimeter = 1 kilometer (1:100,000)

Scale 1:10,000

Latin Knowledge Organiser - Unit 1: Meet the Family

Key Vocabulary

Latin	English
quis es?	Who are you? singular
quī estis?	Who are you? plural
māter	Mother
pater	Father
fīlia	Daughter
fīlius	Son
īnfāns	Little child
servī	Slaves
sum	I am
salvē	Hello singular
salvēte	Hello plural
omnēs	Everyone
quis?	Who?
quid?	What?
Fēlīx diēs tibi sit	Happy birthday (may you have a happy day)
grātiās tibi agō	I thank you
fāmōsa	Famous
euge!	Hurrah!
sedāte!	Sit down! (imperative/bossy verb)

Meet the Family who live in Vindolanda

Lepidina is the mother

Flavius is the father. He is the fort commander of Vindolanda

Iulius is the son

Flavia is the daughter

Rufus is the young child

Corinthus and Candidus are slaves

Pandora is a slave

Vibrissa is the cat

Minimus is the mouse

Greek Myth
Perseus and Medusa

Unit Motto
carpe diem = seize the day

Key Knowledge

To understand the relevance of learning Latin.
To learn to say hello and goodbye.
To write simple sentences using the verb esse (to be).
To understand the difference between singular and plural.
To translate the description of a character from a Greek myth.

Grammar and Phonics

No capital letters are used in Latin apart from when you are writing someone's name. Don't translate names.
The letter v in Latin makes the sae sound as the letter w in English.
Male names end in –us, female names end in –a.

Knowledge Organiser- Design - Visual Arts - Year Four

Key Vocabulary	Definition
design	We use the word 'design' to refer to the way the artist made the elements of a piece of art work together
space	The distance within, around and between things in art.
value	The lightness or darkness of a colour
Two-dimensional	An object with just height and width dimensions
Three-dimensional	An object with three dimensions – height, width and depth
texture	How something feels or how something looks like it feels
collage	Collage is an artwork made up of assorted materials glued to a paper, board, or canvas
form	Elements of shape that make up an artwork

Key Knowledge
I know what collage is.
I can describe 3D sculptures by looking at the shape and form.
I understand how line drawings are created.
I know the difference between 2D and 3D art.

The 7 Elements of Art

Line Shape Form Space

Texture Value Color

Oval circle
by Barbara Hepworth

Tawny Owl
by Alice Lee

Foxy and Frankie
by Ben Nicholson

Bird and Children
By Paul Klee

The fall of Icarus
by Henri Matisse

The Three Musicians
by Pablo Picasso

Knowledge Organiser – PSHE – Being Me in My World - Year Six

Vocabulary

Maslow's hierarchy of human needs	The most fundamental needs at the bottom and the need for self-actualization and self-transcendence at the top.
Empathy	The ability to understand and share the feelings of another.
Collaboration	The action of working with someone to produce something.
Legal	Relating to the law. 'A legal requirement'.
Illegal	Contrary to or forbidden by law, especially criminal law.
Lawful	Conforming to, permitted by, or recognised by law or rules.
Democracy	Rule by the people.

Before you make a choice, think about the outcome and how it will affect others

Bad ↔ Good

Key Knowledge

I know that there are universal rights for all children but for many children these rights are not met.

I can make choices about my own behaviour because I understand how rewards and consequences feel and I understand how these relate to my rights and responsibilities.

I can understand how democracy and having a voice benefits the school community.

Being Me in My World
Maslow's Triangle - PowerPoint Slide 1 - Ages 10-11 - Piece 3

Self-actualisation:
Personal fulilment
Developing talents
Gaining recognition and respect

Self-esteem:
Self-respect
Self-confidence

Love & Belonging:
Friendships/relationships
Group identity Being understood
Caring

Safety Needs:
Security Predictability
Safety against danger or threat

Physiological Needs
Food Shelter Warmth Sleep

Reflective Questions
Ask me this…

What is your ambition for when you leave school?

How do you feel about some of your needs being met and some of them not yet being met? Do you have a choice in how you respond to this?

Which are the six most important rights you would like us to all share at our school?

Knowledge Organiser- Repetition in Shapes – Computing – Year 4

Key Vocabulary	Definition
Program	the entire solution to the task, and an implementation of the algorithm as code
Turtle	an arrow or turtle image on screen that draws a line as it is programmed
Command	an instruction given to control a program
Code Snippet	this could be the same as a program; it can have several sets of commands in one program
Algorithm	the part of the design of the program that is precise instructions to be implemented as code
Debug	the process of finding and correcting errors in your code
Decompose	break something down into smaller parts
Procedure	a named code snippet that can be run multiple times.

Key Knowledge:

To identify that accuracy in programming is important

To create a program in a text-based language.

To be able to explain what 'repeat' means

To modify a count-controlled loop to produce a given outcome.

To decompose a task into small steps

To create a program that uses count-controlled loops to produce a given outcome.

Sequencing and Algorithms

-A **sequence** is a pattern or process in which one thing follows another.

-We design **algorithms** (sets of instructions for performing a task) to help us program the sequence that we require to achieve our desired outcomes.

-**Programming** is the process of keying in the code recognized by the computer (using your algorithm).

Trialling and Debugging

-Programmers do not put their computer programs straight to work. They **trial** them first to find any errors:

-Sequence errors: An instruction in the sequence is wrong or in the wrong place.

-Keying errors: Typing in the wrong code.

-Logical errors: Mistakes in plan/thinking.

-If your algorithm does not work correctly the first time, remember to **debug** it.

The Basics of FMS Logo

-**What is FMS Logo?** Logo is a text-based programming language, where we can type commands which are then drawn on the screen.

-Logo helps us to learn how to use programming language, whilst also being creative and using problem-solving skills.

### The Display:

Basic Commands:

-FD: Forwards. Always followed by a space and the number of steps, e.g. FD 50

-BK: Backwards. As above, e.g. BK 50

-LT: Left turn. Always followed by a space and then the degrees to turn, e.g. LT 90

-RT: Right turn. As above, e.g. RT 90

-CS: Clears any pen marks on your screen and gets the turtle back to the centre.

-PU: Stops turtle from leaving a pen trail.

-PD: Makes turtle leave a pen trail again.

Programming Patterns

-**Patterns:** Patterns are things that repeat in a logical way. In everyday life, patterns are everywhere!

-**Patterns in Logo:** Instead of typing in the code to create each individual shape, we can save time by repeating a sequence of instructions. We use the 'repeat' function.
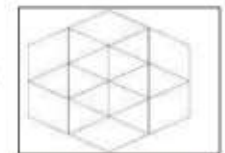
-**Repeat:** Type the command 'repeat' — this repeats commands a set number of times. The number following repeat is the number of times to repeat the code, and the code to be repeated is in square brackets, e.g. repeat 4 [FD 100 LT 90]

The above code will repeat FD 100 LT 90 four times.

-**Creating Shapes and Loops:** To make shapes, we need to know the angles of corners of different shapes (see right). Using the repeat function with shapes can help us to make spirals.
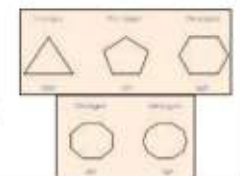
R.E. Year 4 Autumn 1 Knowledge Organiser
Enquiry: Buddhism - Is it possible for everyone to be happy?

Key vocabulary	Definition
Buddhism	A religion about the need to get rid of suffering
Buddhist	A person who follows Buddhism
Prince Siddhattha Gautama	The prince who founded Buddhism. The first Buddha.
Enlightenment	The understanding of how to be happy and free from suffering.
8 fold path	Buddhists rules to help them live good lives

Key Knowledge
I can say the sort of things that make me happy.
I can explain whether being rich would make me happy.
I know some key facts about the first Buddha, Prince Siddhattha.
I know that Prince Siddhattha was rich but he was not happy - then he found Enlightenment.
I can explain how living by the rules of the 8 Fold Path may help a Buddhist to be happy.
I can give examples of how helping other people can make me happy.

Siddharta Gautama is known as the Buddha.
He was born in 580 BCE in the village of Lumbini in Nepal.
He discovered true happiness called "Enlightenment" though meditation.
An important rule for Buddhists is to lead a good life which helps others and does not hurt people or animals.
Buddhists believe they will be happy if they help others.

Buddhism started in Nepal near India in about 4 or 5 BC

Key Vocabulary	Definition
Minim	
Crotchet	
Dotted crotchet	
Quaver	
Tempo	The speed at which music is played
Dynamics	Levels of sound in music (soft to loud)
20th century orchestral	A group of instruments including brass, strings and woodwind
Soul ballad	Traditional blues and gospel music
R&B	Rhythm and blues originating in African American communities in 1940s
Structure	The structure of a song, e.g. intro, verse, chorus outro
Pattern	Same sequence of notes repeated.

Key Signature: F major — there is one flat in the key signature

F G A Bb C D E

Key Signature: C major — there are no sharps or flats in the key signature

C D E F G A B

How many beats per measure

What note gets one beat

Key Signature: B♭ major — there are two flats in the key signature

Bb C D Eb F G A

Time Signature: 4/4 — there are four crotchet beats in a bar

Songs covered

- Hoedown
- I'm always there
- Martin Luther King

R&B

Key Vocabulary	Definition
Cooperate	To work together towards the same goal.
Map	A pictorial representation of an area.
Route	A way of getting from one point to another.
Orienteering	A sport in which people run through a series of waypoints (controls) to guide then

Skills	
Legend	Open land, Out of bounds, Forest, light trees/bushes: slow running, Forest, thick trees/bushes: walk, Hedge, Flowerbed, Wall
Problem solving	
Map reading	

Skill Development

Keep the map set (or orientated) so that you know where you are on the map and which direction you need to travel. When turning, make sure the map does not turn, and stays 'set'.

To communicate and co-operate effectively with others

To follow a set route on a map

To record clues and decipher a code.