

## West Norfolk Academies Trust (Primary) – Curriculum Map – Computing

	Autumn 1 <sup>st</sup>	Autumn 2 <sup>nd</sup>	Spring 1 <sup>st</sup>	Spring 2 <sup>nd</sup>	Summer 1 <sup>st</sup>	Summer 2 <sup>nd</sup>
	COMPUTING SYSTEMS AND NETWORKS		DATA AND INFORMATION		PROGRAMMING	
<b>EYFS Knowledge</b>	<b>Marvellous Me</b> Using google maps to locate school.  Role play area – home with IT included (eg. microwave, <b>laptop with keyboard</b> ). Taking photos of faces/emotions on iPads. CD player to sing songs. Charanga – music.	<b>Light &amp; Celebrations</b> Light box to create patterns linked to stained glass windows. iPads to take photos of our visit to local church. Shadow puppets using torches to retell Rama & Sita story. Battery powered tealights for diva lamps. Using internet to look at pictures of Christmas trees from the past. CD player to sing songs. Charanga - music	<b>King, Queen &amp; Country</b> Video images of London landmarks online.  Virtual tour of Sandringham.  <b>Program beebots to visit landmarks on a map.</b>  CD player to sing songs.  Charanga - music	<b>Air, Land &amp; Sea</b>  Online clips of planes, Barnaby Bear, lifeboat rescue. Use laptops to create a word document about a vehicle. Using a phone to dial 999 in an emergency.  CD player to sing songs. Charanga - music	<b>Living &amp; Growing</b>  Photos of living things to compare as they grow. Photos on iPads to record the changes in caterpillars.  <b>Use ipad to make a drawing of a plant</b>  CD player to sing songs. Charanga - music	<b>The Ocean</b>  <b>Program beebots on sea themed mat.</b> Digital sea themed pictures using laptops.  CD player to sing songs. Charanga - music
<b>EYFS Vocabulary</b>	Internet, google maps, search, zoom, photo, image, delete	Light box, switch, on & off, internet, search, photo, image	Record, film, program, instructions, algorithm,	Internet, online, film, phone call, press	Record, image, photo, playback, delete	Program, instructions, algorithm, mouse, cursor, keys, move, select
<b>Year 1 Knowledge</b>	<b>TECHNOLOGY AROUND US</b>  <b>E- safety- privacy and security</b> Technology around us Using Technology Developing mouse skills Using a computer keyboard Developing keyboard skills Using a computer responsibly	<b>Digital media- Digital writing *</b>  Explore keyboard Adding and removing text Exploring tool bar Making changes to text	<b>GROUPING DATA</b>  Label and match Group and count Describe an object Making different groups Comparing groups Answering questions	<b>Digital media- Digital writing *</b>  Explore keyboard Adding and removing text Exploring tool bar Making changes to text	<b>MOVING A ROBOT</b>  Buttons Directions Forwards and backwards Four directions Getting there Routes	<b>Digital media- Digital writing *</b>  Explore keyboard Adding and removing text Exploring tool bar Making changes to text

	<p><b>Creating Media-Digital painting (Art lesson)</b> Selecting shape tools and colours</p>					
<p><b>Year 1 Vocabulary</b></p>	<p>Technology, electronic, manufactured, computer, mouse, keyboard, screen, click, safely, responsibly.</p> <p>paint program, tool, paintbrush, erase, fill, undo, Piet Mondrian, primary colours, shape tools, line tool, Henri Matisse, Wassily Kandinsky, feelings, colour, brush style Georges Seurat, Pointillism, brush size Pictures, painting, computers, like, prefer, dislike</p>	<p>Word processor, keyboard, keys, letters, Microsoft Word, Google Docs, numbers, space, backspace, text cursor, capital letters, toolbar, bold, italic, underline, mouse, select, font, undo</p>	<p>Object, label, group, search, image, property, sort, colour, size, shape</p>	<p>Word processor, keyboard, keys, letters, Microsoft Word, Google Docs, numbers, space, backspace, text cursor, capital letters, toolbar, bold, italic, underline, mouse, select, font, undo</p>	<p>Forwards, backwards, turn, clear, go, commands Instructions, directions Left, right, Plan, algorithm, program, route</p>	<p>Word processor, keyboard, keys, letters, Microsoft Word, Google Docs, numbers, space, backspace, text cursor, capital letters, toolbar, bold, italic, underline, mouse, select, font, undo</p>
<p><b>Year 2 Knowledge</b></p>	<p><b>INFORMATION TECHNOLOGY AROUND US</b></p> <p>What is information technology? Where have we seen technology in the home? Where have we seen information technology in beyond the school? How does information technology improve our world? Demonstrate safe use of information technology To recognise that choices are made when using information technology</p> <p><b>Creating Media- digital photography (Geography)</b></p>		<p><b>PICTOGRAMS</b></p> <p>Counting &amp; Comparing Entering Data Creating pictograms What is an Attribute Comparing people Presenting Information</p>		<p><b>ROBOT ALGORITHMS</b></p> <p>Giving instructions Same but different, Making predictions Mats and routes Algorithm design Debugging</p>	<p><b>Creating Media- Creating Music (Music lesson)</b> Creating a piece of music using chrome music lab</p>

	Take a photography and use effects					
<b>Year 2 Vocabulary</b>	Information technology, computer, mouse, file, resize, image, drag drop, barcode, scanner, internet safety		Attribute, block diagram, common, data, entre, pictogram, tally chart		Instruction, sequence, clear, unambiguous, algorithm, program, order, commands prediction, artwork, design, route, mat debugging.	Music, planets, Mars, Venus, war, peace, quiet, loud, feelings, emotions, pattern, rhythm, pulse, pitch, tempo, notes, instrument, Create, emotion, pitch, beat, open, edit
<b>Year 3 Knowledge</b>	<p><b>CONNECTING COMPUTERS</b></p> <p>How does a digital device work?            What parts make up a digital device?            How do digital devices help us?            How am I connected?            How are computers connected?            What does our school computing network look like?</p>	<p><b>Digital media- Desktop publishing *</b></p> <p>Words and pictures            Can you edit it            Create a template            Can you add content            Lay it out</p>	<p><b>BRANCHING DATABASES</b></p> <p>Yes or no questions            Making groups            Creating a branching database            Structuring a branching database            Using a branching database            Presenting information</p>	<p><b>Digital media- Desktop publishing *</b></p> <p>Words and pictures            Can you edit it            Create a template            Can you add content            Lay it out</p>	<p><b>SEQUENCE IN MUSIC</b></p> <p>Introducing scratch            Programming Sprites            Sequencing            Ordering commands            Looking Good</p>	<p><b>Digital media- Desktop publishing *</b></p> <p>Words and pictures            Can you edit it            Create a template            Can you add content            Lay it out</p>
<b>Year 3 Vocabulary</b>	Digital devise, input, output, process, program, connection, network, network switch, server, wireless access point (WAP).	Text, images, animation, message, font, paint palette, slider, return, backspace, shift, chevron, character	Attribute, value, table, object, branching database, database, equal, structure, selecting, decision tree, question.	Text, images, animation, message, font, paint palette, slider, return, backspace, shift, chevron, character	Scratch, programming, blocks, motion, code, Commands, sprite, costume, stage, backdrop, motion, turn, point in direction, go to, glide, sequence, event, task, design, run the code, order, note, chord, design, algorithm, bug, debug	Text, images, animation, message, font, paint palette, slider, return, backspace, shift, chevron, character
<b>Year 4 Knowledge</b>	<p><b>THE INTERNET</b></p> <p>Connecting Networks            What is the internet made</p>	<p><b>Creating media- Audio editing*</b></p> <p>Digital recording            Creating a podcast</p>	<p><b>DATA LOGGING</b></p> <p>Answering questions            Data Collection            Logging</p>	<p><b>Creating media- Audio editing*</b></p> <p>Digital recording            Creating a podcast</p>	<p><b>REPETITION IN SHAPES</b></p> <p>Programming a screen</p>	<p><b>Creating media- Audio editing*</b></p> <p>Digital recording            Creating a podcast</p>

	<p>of? Sharing information What is a website? Who owns the web? Can I believe what I read?</p>	<p>Editing <b>Creating media- Photo editing*</b> Changes digital images Retouching images Making a publication</p>	<p>Analysing Data Data for answers Answering my question</p>	<p>Editing <b>Creating media- Photo editing*</b> Changes digital images Retouching images Making a publication</p>	<p>turtle Programming letters Patterns &amp; repeats, Using loops to create shapes Creating a program</p>	<p>Editing <b>Creating media- Photo editing*</b> Changes digital images Retouching images Making a publication</p>
<p><b>Year 4 Vocabulary</b></p>	<p>Search engine, internet, internet browser, website, network switch, server, wireless access point (WAP), router.</p>	<p>Audio, record, playback, microphone, speaker, input, output,  Composition, digital image, edit, retouch, publication, elements</p>	<p>Data, input devise, sensor, data pint, interval, import, export, analyse.</p>	<p>Audio, record, playback, microphone, speaker, input, output,  Composition, digital image, edit, retouch, publication, elements</p>	<p>Program, turtle, commands code snippet, algorithm, design, debug, pattern, repeat, repetition, count-controlled loop, algorithm, value, trace, decompose, procedure</p>	<p>Audio, record, playback, microphone, speaker, input, output,  Composition, digital image, edit, retouch, publication, elements</p>
<p><b>Year 5 Knowledge</b></p>	<p><b>Systems and Searching</b>  Systems Computer systems and us. Searching the web. Selecting search results. How search results are ranked. How are searches influence.</p>	<p><b>Creating media- Video editing*</b> Create a storyboard Use a devise to record their video Import and edit video</p>	<p><b>FLAT-FILE DATABASES</b>  Creating a paper-based database Computer databases Using a database Using search tools Comparing data visually</p>	<p><b>Creating media- Video editing*</b> Create a storyboard Use a devise to record their video Import and edit video</p>	<p><b>SELECTION IN PHYSICAL COMPUTING</b>  Connecting crumbles Combining output devices Controlling &amp; conditions Drawing designs Writing &amp; testing algorithms</p>	<p><b>Creating media- Video editing*</b> Create a storyboard Use a devise to record their video Import and edit video</p>
<p><b>Year 5 Vocabulary</b></p>	<p>System, connection, digital, input, process, output, search engine, refine, index, crawler, bot, server, wireless, access point, network cables, network sockets</p>	<p>Video, audio, recording, storyboard, script, soundtrack, dialogue, capture, zoom, storage, digital, tape, AV (audio-visual), save, videographer, video techniques: pan, tilt, angle, Video, lighting, setting, YouTuber, content, light, audio/sound, camera, colour, export, computer, Microsoft Movie Maker, split, trim/clip, edit, titles, end credits, timeline, transitions, audio, soundtrack, content, retake/reshoot</p>	<p>Information, data, database, criteria ,record, field, compare, filter.</p>	<p>Video, audio, recording, storyboard, script, soundtrack, dialogue, capture, zoom, storage, digital, tape, AV (audio-visual), save, videographer, video techniques: pan, tilt, angle, Video, lighting, setting, YouTuber, content, light, audio/sound, camera, colour, export, computer, Microsoft Movie Maker, split, trim/clip, edit, titles, end credits, timeline, transitions, audio, soundtrack, content, retake/reshoot</p>	<p>Microcontroller, Crumble controller, components, LED, sparkle, crocodile clips, connect, battery box, program, repetition, infinite loop, output devices, motor, count-controlled loop, switch, condition, true, false, input, selection, condition, action, task, design, selection, algorithm, debug, evaluate</p>	<p>Video, audio, recording, storyboard, script, soundtrack, dialogue, capture, zoom, storage, digital, tape, AV (audio-visual), save, videographer, video techniques: pan, tilt, angle, Video, lighting, setting, YouTuber, content, light, audio/sound, camera, colour, export, computer, Microsoft Movie Maker, split, trim/clip, edit, titles, end credits, timeline, transitions, audio, soundtrack, content, retake/reshoot</p>

		special effects, screen, constructive feedback		special effects, screen, constructive feedback		special effects, screen, constructive feedback
<b>Year 6 Knowledge</b>	<b>COMMUNICATION AND COLLABORATION</b> Internet addresses Data packets Working together Shared working How we communicate Communicating responsibly		<b>SPREADSHEETS</b> What is a spreadsheet Modifying spreadsheets What's the formula? Calculate and Duplicate Event planning Presenting data		<b>VARIABLES IN GAMES</b>  Introducing variables Variable programming Designing a games Designing a code Improving & sharing	<b>Creating Media- 3d modelling (DT Lesson)</b> Create the 3d model using Tinkercad
<b>Year 6 Vocabulary</b>	Digital device, input, process, output, program, digital, non-digital, connection, network, network switch, server, wireless access point, network cables, network sockets.		Cell, row, column, spreadsheet, tab, formula, function, manual input, output		Variable, change, name, value, set, design, event, algorithm, code, task, artwork, program, project, test, debug, improve, evaluate, share.	2D, 3D, 3D object, 3D space, view, resize, colour, lift, rotate, position, select, duplicate, dimensions, placeholder, hole, group, ungroup, resize, design, modify, evaluate, improve.