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| **Year 2 Overview** |
| **Unit Name** | **Lesson** | **Learning Objectives** | **Success Criteria** | **Cross Curricular Links** |
| **Autumn 1** |
| Computing systems and networks – IT around us | 1 | Can I recognise the uses and features of information technology? |  -I can describe some uses of computers- I can identify examples of computers- I can identify that a computer is a part of IT |   |
| Computing systems and networks – IT around us | 2 | Can I identify the uses of information technology in the school? |  -I can identify examples of IT- I can identify that some IT can be used in more than one way- I can sort school IT by what it’s used for |   |
| Computing systems and networks – IT around us | 3 | Can I identify information technology beyond school? |  -I can find examples of information technology- I can sort IT by where it is found- I can talk about uses of information technology |   |
| Computing systems and networks – IT around us | 4 | Can I explain how information technology helps us? |  -I can demonstrate how IT devices work together- I can recognise common types of technology- I can say why we use IT |   |
| Computing systems and networks – IT around us | 5 | Can I explain how to use information technology safely? |  -I can list different uses of information technology- I can say how rules can help keep me safe- I can talk about different rules for using IT |   |
| Computing systems and networks – IT around us | 6 | Can I recognise that choices are made when using information technology? |  -I can explain the need to use IT in different ways- I can identify the choices that I make when using IT- I can use IT for different types of activities |   |
| **Autumn 2** |
| Creating media – Digital photography | 1 | Can I use a digital device to take a photograph? |  -I can explain what I did to capture a digital photo- I can recognise what devices can be used to take photographs- I can talk about how to take a photograph | Art and design |
| Creating media – Digital photography | 2 | Can I make choices when taking a photograph? |  -I can explain the process of taking a good photograph- I can explain why a photo looks better in portrait or landscape format- I can take photos in both landscape and portrait format | Art and design |
| Creating media – Digital photography | 3 | Can I describe what makes a good photograph? |  -I can discuss how to take a good photograph- I can identify what is wrong with a photograph- I can improve a photograph by retaking it | Art and design |
| Creating media – Digital photography | 4 | Can I decide how photographs can be improved? |  -I can experiment with different light sources- I can explain why a picture may be unclear- I can explore the effect that light has on a photo | Art and design |
| Creating media – Digital photography | 5 | Can I use tools to change an image? |  -I can explain my choices- I can recognise that images can be changed- I can use a tool to achieve a desired effect | Art and design |
| Creating media – Digital photography | 6 | Can I recognise that photos can be changed? |  -I can apply a range of photography skills to capture a photo- I can identify which photos are real and which have been changed- I can recognise which photos have been changed | Art and design |
| **Spring 1** |
| Programming A – Robot algorithms | 1 | Can I describe a series of instructions as a sequence? |  -I can choose a series of words that can be enacted as a sequence- I can follow instructions given by someone else- I can give clear instructions | Music |
| Programming A – Robot algorithms | 2 | Can I explain what happens when we change the order of instructions? |  -I can show the difference in outcomes between two sequences that consist of the same commands- I can use an algorithm to program a sequence on a floor robot- I can use the same instructions to create different algorithms | Music |
| Programming A – Robot algorithms | 3 | Can I use logical reasoning to predict the outcome of a program? |  -I can compare my prediction to the program outcome- I can follow a sequence- I can predict the outcome of a sequence | Music |
| Programming A – Robot algorithms | 4 | Can I explain that programming projects can have code and artwork? |  -I can explain the choices I made for my mat design- I can identify different routes around my mat- I can test my mat to make sure that it is usable | Music |
| Programming A – Robot algorithms | 5 | Can I design an algorithm? |  -I can create an algorithm to meet my goal- I can explain what my algorithm should achieve- I can use my algorithm to create a program | Music |
| Programming A – Robot algorithms | 6 | Can I create and debug a program that I have written? |  -I can plan algorithms for different parts of a task- I can put together the different parts of my program- I can test and debug each part of the program | Music |
| **Spring 2** |
| Data and information – Pictograms | 1 | Can I recognise that we can count and compare objects using tally charts? |  -I can compare totals in a tally chart- I can record data in a tally chart- I can represent a tally count as a total | Maths |
| Data and information – Pictograms | 2 | Can I recognise that objects can be represented as pictures? |  -I can enter data onto a computer- I can use a computer to view data in a different format- I can use pictograms to answer simple questions about objects | Maths |
| Data and information – Pictograms | 3 | Can I create a pictogram? |  -I can explain what the pictogram shows- I can organise data in a tally chart- I can use a tally chart to create a pictogram | Maths |
| Data and information – Pictograms | 4 | Can I select objects by attribute and make comparisons? |  -I can answer ‘more than’/’less than’ and ’most/least’ questions about an attribute- I can create a pictogram to arrange objects by an attribute- I can tally objects using a common attribute | Maths |
| Data and information – Pictograms | 5 | Can I recognise that people can be described by attributes? |  -I can choose a suitable attribute to compare people- I can collect the data I need- I can create a pictogram and draw conclusions from it | Maths |
| Data and information – Pictograms | 6 | Can I explain that we can present information using a computer? |  -I can give simple examples of why information should not be shared- I can share what I have found out using a computer- I can use a computer program to present information in different ways | Maths |
| **Summer 1** |
| Creating media - Digital music | 1 | Can I say how music can make us feel? |  -I can describe music using adjectives- I can identify simple differences in pieces of music- I can say what I do and don’t like about a piece of music |   |
| Creating media - Digital music | 2 | Can I identify that there are patterns in music? |  -I can create a rhythm pattern- I can explain that music is created and played by humans- I can play an instrument following a rhythm pattern |   |
| Creating media - Digital music | 3 | Can I experiment with sound using a computer? |  -I can connect images with sounds- I can relate an idea to a piece of music- I can use a computer to experiment with pitch |   |
| Creating media - Digital music | 4 | Can I use a computer to create a musical pattern? |  -I can explain how my music can be played in different ways- I can identify that music is a sequence of notes- I can refine my musical pattern on a computer |   |
| Creating media - Digital music | 5 | Can I create music for a purpose? |  -I can add a sequence of notes to my rhythm- I can create a rhythm which represents an animal I’ve chosen- I can create my animal’s rhythm on a computer |   |
| Creating media - Digital music | 6 | Can I review and refine our computer work? |  -I can explain how I changed my work- I can listen to music and describe how it makes me feel- I can review my work |   |
| **Summer 2** |
| Programming B - Programming quizzes | 1 | Can I explain that a sequence of commands has a start? |  -I can identify that a program needs to be started- I can identify the start of a sequence- I can show how to run my program |   |
| Programming B - Programming quizzes | 2 | Can I explain that a sequence of commands has an outcome? |  -I can change the outcome of a sequence of commands- I can match two sequences with the same outcome- I can predict the outcome of a sequence of commands |   |
| Programming B - Programming quizzes | 3 | Can I create a program using a given design? |  -I can build the sequences of blocks I need- I can decide which blocks to use to meet the design- I can work out the actions of a sprite in an algorithm |   |
| Programming B - Programming quizzes | 4 | Can I change a given design? |  -I can choose backgrounds for the design- I can choose characters for the design- I can create a program based on the new design |   |
| Programming B - Programming quizzes | 5 | Can I create a program using my own design? |  -I can build sequences of blocks to match my design- I can choose the images for my own design- I can create an algorithm |   |
| Programming B - Programming quizzes | 6 | Can I decide how my project can be improved? |  -I can compare my project to my design- I can debug my program- I can improve my project by adding features |   |