













Computing Teaching and Learning Map





The Beacon Federation











Year 1	Beacon Curriculum Theme	Teach Computing Strand	Teach Computing Theme Name	NC Links in Teach Computing
 Communication	Happily, Ever After	Networking and computer systems	Technology around us <i>(This could be linked to stories, making pictures, writing text.)</i>	<ul style="list-style-type: none"> - Recognise common uses of information technology beyond school - Use technology purposefully to create, organise, store, manipulate, and retrieve digital content - Use technology safely and respectfully, keeping personal information private; identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies.
Competency/NC essentials	Royal Patrons			
 Conflict	Land Ahoy	Creating media	Digital painting	<ul style="list-style-type: none"> - Use technology purposefully to create, organise, store, manipulate, and retrieve digital content
Christmas				
Competency/NC essentials	Never Eat Shredded Wheat	Data and Information	Grouping data	<ul style="list-style-type: none"> - Use technology purposefully to create, organise, store, manipulate, and retrieve digital content - Use technology safely and respectfully
 Culture	Come Fly with me - Arctic Circle			
 Conservation	Light Up The World	Programming	Programming B - Introduction to animation	<ul style="list-style-type: none"> - Understand what algorithms are, how they are implemented as programs on digital devices, and that programs execute by following precise and unambiguous instructions - Create and debug simple programs - Use logical reasoning to predict the behaviour of simple programs
Competency/NC essentials	Children's Champion			

Year 2	Beacon Curriculum Theme	Teach Computing Strand	Teach Computing Theme Name	NC Links in Teach Computing
 Communication	Inter-Nation Media Station	Networking and computer systems	IT around us	<ul style="list-style-type: none"> - Use technology purposefully to create, organise, store, manipulate, and retrieve digital content - Recognise common uses of information technology beyond school - Use technology safely and respectfully, keeping personal information private; identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies
Competency/NC essentials	Medicine Woman			
 Conflict	Unity in the Community	Creating media	Digital photography	<ul style="list-style-type: none"> - Use technology purposefully to create, organise, store, manipulate, and retrieve digital content - Recognise common uses of information technology beyond school - Use technology safely and respectfully, keeping personal information private; identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies
Christmas				
Competency/NC essentials	Paddington's Passport	Data and Information	Pictograms	<ul style="list-style-type: none"> - use technology purposefully to create, organise, store, manipulate and retrieve digital content - use technology safely and respectfully, keeping personal information private; identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies
 Culture	Zero to UK Hero			
 Conservation	Going Wild	Programming	Programming B - An introduction to quizzes	<ul style="list-style-type: none"> - Understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions - Create and debug simple programs - Use logical reasoning to predict the behaviour of simple programs - Use technology purposefully to create, organise, store, manipulate and retrieve digital content
Competency/NC essentials	The Wordsmith			

Year 3	Beacon Curriculum Theme	Teach Computing Strand	Teach Computing Theme Name	NC Links in Teach Computing
 Communication	Making Connections	Networking and computer systems	Connecting Computers	<ul style="list-style-type: none"> - use sequence, selection, and repetition in programs; work with variables and various forms of input and output - understand computer networks including the internet; how they can provide multiple services, such as the World Wide Web; and the opportunities they offer for communication and collaboration - select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information
Competency/NC essentials	Science: May the Force be with you			
 Conflict	Athens v Sparta - Ancient Greece	Creating media	Animation <i>(this could be linked to Ancient Greece in some way?)</i>	<ul style="list-style-type: none"> - Select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information - use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.
Christmas				
Competency/NC essentials	Out and about - Geography	Data and Information	Branching databases	<ul style="list-style-type: none"> - select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information - use technology safely, respectfully and responsibly
 Culture	Come Fly with me - Africa			
 Conservation	Picture our planet	Programming	Programming A – Sequence in music	<ul style="list-style-type: none"> - Design, write, and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts - Use sequence, selection, and repetition in programs; work with variables and various forms of input and output - Use logical reasoning to explain how some simple algorithms work, and to detect and correct errors in algorithms and programs - Select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information
Competency/NC essentials	Lindow Man - the story of prehistoric man			

Year 4	Beacon Curriculum Theme	Teach Computing Strand	Teach Computing Theme Name	NC Links in Teach Computing
 Communication	The World Wide Web	Networking and computer systems	The internet	<ul style="list-style-type: none"> - Understand computer networks including the internet; how they can provide multiple services, such as the World Wide Web, and the opportunities they offer for communication and collaboration - Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information - Use technology safely, respectfully, and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.
Competency/NC essentials	Three Giant Steps - geography			
 Conflict	Anglo Saxons vs Vikings	Creating media	Audio editing	<ul style="list-style-type: none"> - Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information - Use technology safely, respectfully, and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact
Christmas				
Competency/NC essentials				
 Culture	Cry Freedom - the story of slavery	Data and Information	Data logging	<ul style="list-style-type: none"> - Use sequence, selection, and repetition in programs; work with variables and various forms of input and output - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information
 Conservation	Under the canopy	Programming	Programming B – Repetition in games <i>(Link to Beacon Curriculum theme - making a Rainforest-themed game)</i>	<ul style="list-style-type: none"> - Design, write, and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts - Use sequence, selection, and repetition in programs; work with variables and various forms of input and output - Use logical reasoning to explain how some simple algorithms work, and to detect and correct errors in algorithms and programs - Select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information
Competency/NC essentials	Rocky the Findosaur			

Year 5	Beacon Curriculum Theme	Teach Computing Strand	Teach Computing Theme Name	NC Links in Teach Computing
 Communication	Mission Control	Networking and computer systems	Sharing information	<ul style="list-style-type: none"> - Understand computer networks, including the internet; how they can provide multiple services, such as the World Wide Web, and the opportunities they offer for communication and collaboration - Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content
Competency/NC essentials	The Rescuers			
 Conflict	You're Not Invited	Creating media	Vector drawing	<ul style="list-style-type: none"> - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information.
Christmas				
Competency/NC essentials	In Your Element	Data and Information	Flat-file databases	<ul style="list-style-type: none"> - Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information
 Culture	Come Fly With Me! America			
 Conservation	Global Warning	Programming	Programming A - Selection in physical computing <i>(using Crumble Controllers - depends on whether they will work with Chromebooks and availability of kit. Otherwise do Programming B – Selection in quizzes)</i> <i>This unit is also available at the Oak Academy</i>	<ul style="list-style-type: none"> - Design, write, and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts - Use sequence, selection, and repetition in programs; work with variables and various forms of input and output - Use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information
Competency/NC essentials	Pharaoh Queen			

Year 6	Beacon Curriculum Theme	Teach Computing Strand	Teach Computing Theme Name	NC Links in Teach Computing
 Communication	A World of Bright Ideas	Networking and computer systems	Communication	<ul style="list-style-type: none"> - Understand computer networks, including the internet; how they can provide multiple services, such as the World Wide Web, and the opportunities they offer for communication and collaboration - Select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information - Use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact
Competency/NC essentials	Window on the World			
 Conflict	Wars of the World	Creating media	Webpage creation	<ul style="list-style-type: none"> - Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information. - use technology safely, respectfully, and responsibly; recognise acceptable/unacceptable behaviour.
Christmas				
Competency/NC essentials	Time Team	Data and Information	Spreadsheets	<ul style="list-style-type: none"> - Select, use, and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems, and content that accomplish given goals, including collecting, analysing, evaluating, and presenting data and information
 Culture	I Have a Dream...			
 Conservation	Full of Beans	Programming	Programming A - Variables in games	<ul style="list-style-type: none"> - Design, write and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts - Use sequence, selection, and repetition in programs; work with variables and various forms of input and output - Use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs - Select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information
Competency/NC essentials	Go With the Flow			