

# Wren's Nest Primary School

## Science Progression

SCIENCE Progression of Skills	EYFS	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Observing and Measuring Changes	Discuss the similarities and differences. e.g. Do the leaves change on trees?	Begin to observe closely, using senses and simple equipment. e.g. Are the leaves different in Spring? Use simple observations and ideas to suggest answers to questions. To observe simple changes over time and, with guidance,	Observing closely, using simple equipment. Observe closely, using simple equipment. e.g. Through making simple observations, I can identify everyday materials and discuss their properties. Use observations and ideas to	Begin to make systematic and careful observations and, where appropriate, take accurate measurements using standard units, using a range of equipment. e.g. To know that magnetism is a force which can act without direct contact. Help to make decisions about what observations to	Making systematic and careful observations and, where appropriate, taking accurate measurements using standard units, using a range of equipment, including thermometers and data loggers. e.g. To plan, set up and carry out	Begin to take measurements, using a range of scientific equipment, with increasing accuracy and precision, taking repeat readings where appropriate. e.g. To use scientific data to study early childhood growth and make comparisons between weight and height.	Taking measurements, using a range of scientific equipment, with increasing accuracy and precision, taking repeat readings when appropriate. e.g. To plan and develop a fair test that gives me information about the impact of exercise on my body (pulse rate).

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begin to notice	suggest answers	make, how long to	comparative	Begin to identify	Identify patterns
patterns and	to questions.	make them for and	and fair tests,	patterns that	that might be
relationships.		the type of simple	including	might be found in	found in the
e.g. Seasonal	To observe	equipment that	controlling	the natural	natural
Changes.	changes over time	might be used.	variables to	environment.	environment.
	and, with		observe the		
To say what I	guidance, begin to	Begin to look for	impact of a	Begin to make	Make their own
am looking for	notice patterns	naturally occurring	power source	their own decisions	decisions about
and what I am	and relationships.	patterns and	on a component.	about what	what observations
measuring with		relationships and		observations to	to make, what
adult support.	To begin say what	decide what data	Begin to look	make, what	measurements to
	I am looking for	to collect to identify	for naturally	measurements to	use and how long
To know how to	and what I am	them.	occurring	use and how long	to make them for
use simple	measuring.		patterns and	to make them for	and whether to
equipment	5	Learn to use some	relationships	and whether to	repeat them.
safely with	To know how to	new equipment	and decide what	repeat them.	
adult support.	use simple	appropriately.	data		Choose the most
	equipment safely.		to collect to	Choose the most	appropriate
Begin to use		Begin to see a	identify them.	appropriate	equipment and
simple	Use simple	pattern in my		equipment and	explain how to use
measurements	measurements and	results.	Help to make	explain how to use	it accurately.
and equipment	equipment with		decisions about	it accurately.	
with adult	increasing	Begin to choose from	what		Can interpret
support.	independence.	a selection of	observations to	Begin to interpret	data and find
Support.		equipment.	make, how long	data and find	patterns.
		equipment.	to make them	patterns.	purrentis.
		Begin to observe and	for and the	purrents.	Select equipment
		measure accurately	type of simple	Select equipment	on my own.
		using standard units.	equipment that	on my own. Can	on my own.
		using standard units.	might be used.	make a set of	Can make a set of
			might be used.	observations and	observations and
			Learn to use	say what the	say what the
			new equipment	interval and range	interval and range
				5	-
			appropriately,	are.	are.
			Can soo a	Deain to take	A councto and
			Can see a	Begin to take	Accurate and
			pattern in my	accurate and	precise
			results.	precise	measurements.
				measurements.	

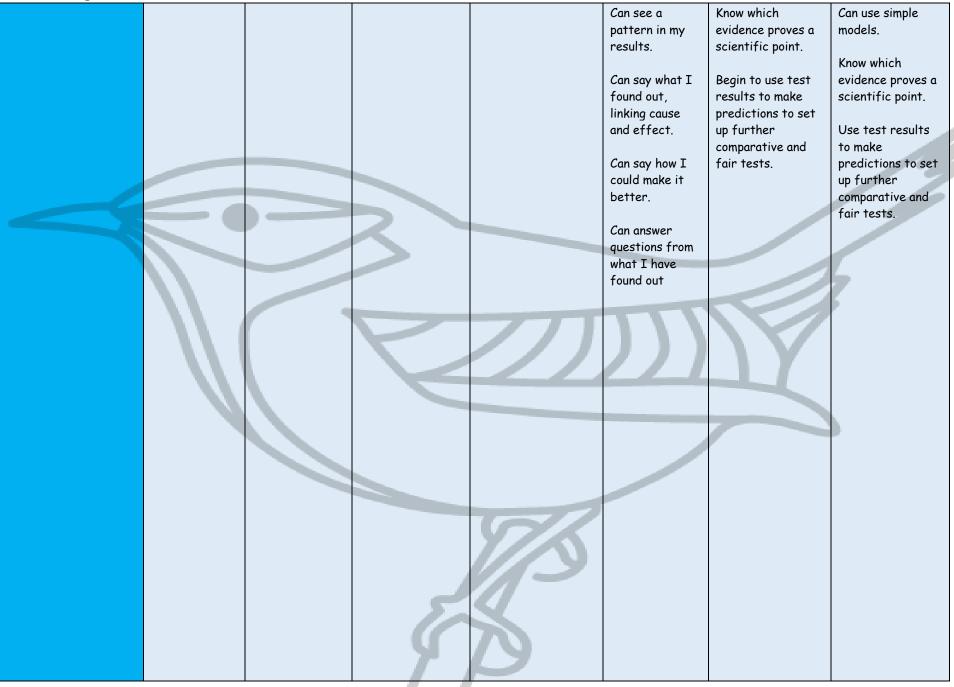
Identifying, Classifying, Recording and persenting DataIdentify and support, e.g. to consesting the support, e.g. to consesting the conserved milling and exterpillar and antarials and living things and anythibings, bicks, reptiles and amphibins.Identifying and to identify exterpillar and exterpillar and identify, classify differences, animatic and living things and materials and living things and and anyth help, decide how to sent and group them. e.g. I con nome and sort the expression and anyth the groups of animats including fishin, mammals, birds, reptiles and amphibins.Identify the function and and the groups of the functions of target to the functions of target to the functions of target to the functions of target to the functions of target	 -						
Classifying, Recording and Presenting Dataidentify a caterpillar and 	Identifying,	•	• •		from a selection of equipment. Can observe and measure accurately using standard units. Gathering,		
Recording and parts of it's life cycle.e.g. To key it's differences, and with help, describe living thing and materials.discription and presenting data in a variety of ways to help in answering questions.discription and presenting data in a variety of ways to help in answering questions.discription and presenting data in a variety of ways to help in answering questions.discription and 	Classifying,						
Presenting Dataparts of its life cycle.what animals come from eggs.materials. come from eggs.variety of ways to help in answering questions.in a variety of ways to help in and labels, classification keys, tables, scatter graphs, bar and line graphs.scientific diagens, and labels, classification keys, tables, scatter graphs, bar and line graphs.scientific diagens, and labels, classification keys, tables, scatter graphs, bar and line graphs.scientific diagens, keys, bar charts, and tables, tables, scatter graphs, bar and line graphs.scientific diagens, keys, bar charts, and tables, tables, scatter graphs, bar and line graphs.scientific classification keys, and tables, scatter graphs, bar and line graphs.scientific diagens, tables, scatter graphs, bar and line graphs.scientific diagens, tables, scatter graphs, bar and line graphs.scientific classification keys, bar charts, and tables,scientific talgauge, and describe living things and materials. e.g. To compare the help, decide how to sort and group them.scientific talgauge, tags and materials and living things and animals including fish, mammals, birds, reptiles and amphibians.materials and amphibians.scientific talgauge, charges related to similarities or their differences, similarities or their differences, and similarities or their differences, and similarities or their differences, similarities or their differences, similarities or their differences, similarities or their differences, similarities or their differences, similarities							
Cycle.ContentionC					• •		
	Presenting Data	eggs. To begin to observe and identify, compare and describe. To begin to use simple features to compare objects, materials and living things and, with help, decide how to sort and group them. e.g. I can name and sort the groups of animals including fish, mammals, birds, reptiles	recording data to help in answering questions. Observe and identify, compare and describe. Use simple features to compare objects, materials and living things and, with help, decide how to sort and group	help in answering questions. Begin to recording findings using simple scientific language, drawings, labelled diagrams, keys, bar charts, and tables. Begin to identify differences, similarities or changes related to simple scientific ideas and processes. e.g. To compare the teeth of animals and humans to identify their differences and similarities. Begin to talk about criteria for grouping, sorting and	ways to help in answering questions. Recording findings using simple scientific language, drawings, labelled diagrams, keys, bar charts, and tables. Identify differences, similarities or changes related to simple scientific ideas and processes. e.g. To group and classify	and labels, classification keys, tables, scatter graphs, bar and line graphs. Begin to use and develop keys and other information records to identify, classify and describe living things and materials. e.g. I can investigate the thermal efficiency of different materials and use my results to	labels, classification keys, tables, scatter graphs, bar and line graphs. Use and develop keys and other information records to identify, classify and describe living things and materials. e.g. Through studying report writing, I am able to present information about the functions of the parts of the circulatory

		Begin to compare and group according to behaviour or properties, based on testing.	on given criteria. To use a range of scientific tests to		
		restring.	classify		
			materials.		
			Talk about criteria for		
			grouping,		
			sorting and		
			classifying and use	1	
			simple keys.		
				1	
	( )		Compare and		
			group according to behaviour or		
			properties,		
			based on		
			testing.		

Drawing	To begin to	Begin to use	Using their	Using results begin	Using results	Begin to report	Reporting and
-	record data	their	observations and	to draw simple	to draw simple	and present	presenting
Conclusions,	with adult	observations	ideas to suggest	conclusions, make	conclusions,	findings from	findings from
Noticing	support. e.g.	and ideas to	answers to	predictions for new	make	enquiries, including	enquiries,
Patterns and	Which ice cube	suggest answers	questions. e.g.	values, suggest	predictions for	conclusions, causal	including
	melted the	to questions.	Through exploring	improvements and	new values,	relationships and	conclusions,
Presenting	quickest?	e.g. By	a variety of	raise further	suggest	explanations of	causal
Findings		observing	materials, I can	questions. e.g. To	improvements	and a degree of	relationships and
		changes through	identify and	design my own	and raise	trust in results, in	explanations of
		the year, I can	classify the	practical experiment	further	oral and written	and a degree of
		recognise	properties of	to explore the	questions. e.g.	forms such as	trust in results,
		deciduous or	them and make	effect of exercise	Using my	displays and other	in oral and
		evergreen	comparisons about	on my muscles.	knowledge of	presentations. e.g.	written forms
		trees.	their suitability.		electricity, I	To understand how	such as displays
				Reporting on findings	know that	sexual and asexual	and other
			Gather and	from enquiries,	electrical	reproduction	presentations.
		Gather and	record	including oral and	equipment can	occurs in plants. To	e.g. Through
		record data	data to help in	written explanations,	be dangerous	draw conclusions	studying report
		with some adult	answering	displays or	and the	based on my data	writing, I am able
		support, to help	questions.	presentations of	associated	and observations	to present
		in answering		results and	consequences.	and use my	information about
		questions.	Record simple	conclusions.		scientific	the functions of
			data.		Reporting on	knowledge and	the parts of the
		Begin to record		Gather, record, and	findings from	understanding to	circulatory
		simple data.	Record and	begin to classify and	enquiries,	explain my	system.
			communicate	present data in a	including oral	findings.	
		Begin to record	their findings in a	variety of ways to	and written		
		and	range of ways.	help in answering	explanations,		Record data and
		communicate		questions.	displays or	Begin to record	results of
		their findings in	Can show my		presentations	data and results of	increasing
		a range of ways.	results in a table	Begin to record	of results and	increasing	complexity using
			that my teacher	findings using simple	conclusions.	complexity using	scientific
		Can show my	has provided. 🛛 👘	scientific language,		scientific diagrams	diagrams and
		results in a	Talk about what	drawings, labelled	Gather, record,	and labels,	labels,
		simple table	they have found	diagrams, keys,	classify and	classification keys,	classification
		that my teacher	out and how they	bar charts and	present data in	tables and bar and	keys, tables and
		has provided	found it out.	tables.	a variety of	line graphs.	bar and line
		Begin to talk			ways to help in		graphs.
		about what they		Begin to report on	answering	Begin to report	
		,		findings from	questions.	and present	

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	have found out	To say what	enquiries, including		findings from	Report and	
	and how	happened in my	oral and written	Record findings	enquiries.	present findings	
	they found it	investigation.	explanations,	using simple		from enquiries.	
	out		displays or	scientific	Begin to decide		
		To begin to say	presentations of	language,	how to record data	Decide how to	
	To begin to say	whether I was	results and	drawings,	from a choice of	record data from	
	what happened	surprised at the	conclusions.	labelled	familiar	a choice of	
	in my	results or not.		diagrams, keys,	approaches.	familiar	
	investigation		Begin to use notes,	bar charts and		approaches.	
	with adult	To begin to say	simple tables and	tables.	Begin to choose		F. C.
	support.	what I would	standard units and	Report on	how best to	Can choose how	
		change about my	help to decide how	findings from	present data.	best to present	
	To begin to say	investigation.	to record and	enquiries,	Am beginning to	data	
	whether I was		analyse their data.	including oral	report and present	Reporting and	
	surprised at the			and written	findings from	presenting	
	results or not.		Begin to record	explanations,	enquiries, including	findings from	
			results in tables and	displays or	conclusions, causal	enquiries,	
	To begin to say		bar charts.	presentations	relationships and	including	
	what I would			of results and	explanations of	conclusions, causal	
	change about		Begin to use results	conclusions.	and degree of	relationships and	
	my investigation		to draw simple		trust in results, in	explanations of	
	with adult		conclusions, make	Use notes,	oral and written	and degree of	
	support.		predictions for new	simple tables	forms such as	trust in results, in	
			values, suggest	and standard	displays and other	oral and written	
			improvements and	units and help	presentations.	forms such as	
			raise further	to decide how		displays and other	
			questions.	to record and	Begin to identify	presentations.	
				analyse their	scientific evidence		
			Begin to use straight	data.	that has been used	Identify	
			forward scientific	_	to support or	scientific	
			evidence to answer	Can record	refute ideas or	evidence that has	
			questions or to	results in tables	arguments.	been used to	
			support their	and bar charts.		support or refute	
			findings.	Using results to	Begin to draw	ideas or	
				draw simple	conclusions based	arguments.	
			With help, begin to	conclusions,	on their data and		
			look for changes,	make	observations, use	Draw conclusions	
			patterns, similarities	predictions for	evidence to justify	based on their	
			and differences in	new values,	their ideas, use	data and	
			their data in order	suggest	scientific	observations, use	

	to draw simple conclusions and answer questions. With support, begin to identify new questions arising from the data, make new predictions and find ways of improving what they have already done. Begin to see a pattern in my results. Begin to say what I found out, linking cause and effect. Begin to say how I could make it better Begin to answer questions from what I have found out.	<ul> <li>improvements and raise further questions.</li> <li>Use straightforward scientific evidence to answer questions or to support their findings.</li> <li>With help, look for changes, patterns, similarities and differences in their data in order to draw simple conclusions and answer questions.</li> <li>With support, identify new questions arising from the data, make new predictions and find ways of improving what they have already done.</li> </ul>	knowledge and understanding to explain their findings. Begin to use test results to make predictions to set up further comparatives and fair tests. Begin to look for different causal relationships in their data and identify evidence that refutes or supports their ideas. Use their results to identify when further tests and observations are needed. Begin to separate opinion from fact. Begin to draw conclusions and identify scientific evidence. Can use simple models.	evidence to justify their ideas, use scientific knowledge and understanding to explain their findings. Use test results to make predictions to set up further comparatives and fair tests. Look for different causal relationships in their data and identify evidence that refutes or supports their ideas. Use their results to identify when further tests and observations are needed. Separate opinion from fact. Can draw conclusions and identify scientific evidence.	
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	Listen and	Listen and	Find information	Begin to identify	Identifying	Begin to select	Using
Using Scientific	begin to	respond to	using given	differences,	differences,	straightforward	straightforward
Evidence and	respond to	stories about	sources. e.g. To	similarities or	similarities or	scientific evidence	scientific
Secondary	stories about	scientific	compare a range	changes related to	changes	to answer	evidence to
•	scientific	processes/	of images and	simple scientific	related to	questions or to	answer questions
Sources of	processes/	events/ objects.	identify the	ideas and processes.	simple	support their	or to support
Information	events/	e.g. The Story	differences	e.g. To use	scientific ideas	findings. e.g. To	their findings.
	objects with	of the Mermaid	between a	secondary sources of	and processes.	use independent	
	adult support.	with the	herbivore,	information to	e.g. To compare	research to find	Identifying
	e.g. The Very	Damaged Scale.	carnivore and	categorise animals	the teeth of	out about the	scientific
	Hungry	Calling Callor	omnivore. Use	into specific groups	animals and	gestation period of	evidence that has
	Caterpillar.		simple secondary	dependent on their	humans to	different mammals	been used to
			sources to find	diet.	identify their	and present my	support or refute
			answers.		differences and	findings.	ideas or
				Using	similarities.		arguments. e.g.
			Can find	straightforward		Begin to identify	To understand
			information to	scientific evidence	Research using	scientific evidence	that practical
			help me from	to answer questions	given sources.	that has been used	investigations are
			books and	or to support their	e.g. research	to support or	not always
			computers with	findings.	different food	refute ideas or	possible for some
			help.		groups and how	arguments.	scientific
				Select information	they keep us		enquiries, such as
				from a range of	healthy.		examining the
				given sources.			inside of a human
				Begin to recognise	Begin to		body and
				when and how	recognise when		secondary sources
				secondary sources	and how		must be used.
				might help to answer	secondary		
				questions that	sources might		Select
				cannot be	help to answer		straightforward
			5.0	answered through	questions that		scientific
				practical	cannot be		evidence to
				investigations. e.g.	answered		answer questions
			- <b>7</b> /	Using secondary	through		or to support
				sources of	practical		their findings.
				information, I am	investigations.		
				beginning to learn			
				the scientific			
				vocabulary			

	associated with parts of the tooth.	
	To begin to use simple secondary sources to find answers. To begin to find information to help me from books and computers with hel	

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