

## FIRST® LEGO® League Explore Northern Ireland curriculum link grid

### Key Stage 1

#### Communication

Children should be given opportunities to engage with and demonstrate the skill of communication and to transfer their knowledge about communication concepts and skills to real-life meaningful contexts across the curriculum.

<b>Talking and Listening</b>	<ul style="list-style-type: none"> <li>– listen to and take part in discussions, explanations, role-plays and presentations.</li> <li>– contribute comments, ask questions and respond to others' points of view.</li> <li>– communicate information, ideas, opinions, and imaginings, using an expanding vocabulary.</li> <li>– structure their talk and speak clearly so that ideas can be understood by others.</li> <li>– adapt ways of speaking to audience and situation.</li> <li>– use non-verbal methods to express ideas and engage with the listener.</li> </ul>
<b>Reading</b>	<ul style="list-style-type: none"> <li>– read a range of texts for information, ideas and enjoyment.</li> <li>– use a range of strategies to read with increasing independence.</li> <li>– find, select and use information from a range of sources.</li> <li>– understand and explore ideas, event and features in texts.</li> <li>– use evidence from texts to explain opinions.</li> </ul>
<b>Writing</b>	<ul style="list-style-type: none"> <li>– talk about, plan and edit work.</li> <li>– communicate information, feelings, imaginings and ideas in a clear and organised way.</li> <li>– develop, express and present ideas in a variety of forms and formats, using traditional and digital resources, for different audiences and purposes.</li> <li>– write with increasing accuracy and proficiency.</li> </ul>

#### Language and Literacy

Focus	Approach	Pupils should be enabled to
<b>Talking and Listening</b>	<p>Children should be helped to speak clearly, with clear pronunciation and intonation, appropriate to the needs of their listeners.</p> <p>They need to learn to use language in imaginative ways. They should be helped to structure their talk, using it to develop and clarify their thinking.</p>	<ul style="list-style-type: none"> <li>– listen to, respond to and explore stories, poems, songs, drama, and media texts through the use of traditional and digital resources and recreate parts of them in a range of expressive activities, for example, <i>make models of some characters or places from a poem or story.</i></li> <li>– listen to and respond to guidance and instructions.</li> <li>– take turns at talking and listening in group and paired activities.</li> <li>– present ideas and information with some structure and sequence.</li> <li>– devise and ask questions to find information in social situations and across the curriculum.</li> </ul>
<b>Reading</b>	<p>Children should be helped to develop confidence in reading using a range of methods.</p>	<ul style="list-style-type: none"> <li>– read, explore, understand and make use of a range of traditional and digital texts.</li> <li>– begin to locate, select and use texts for specific purposes.</li> <li>– research and manage information relevant to specific purposes and present their findings in a variety of ways.</li> <li>– explore and begin to understand how texts are structured in a range of genres.</li> <li>– explore and interpret a range of visual texts.</li> <li>– express opinions and give reasons based on what they have read.</li> <li>– begin to use evidence from text to support their views, for example, <i>predicting, inferring and deducing.</i></li> </ul>
<b>Writing</b>	<p>Children should develop the ability to manage and communicate information effectively in their writing in order to produce more demanding, imaginative and factual texts.</p>	<ul style="list-style-type: none"> <li>– write without prompting and make decisions about how and what they will write.</li> <li>– write in a range of genres with teacher guidance.</li> <li>– begin to problem solve how to write using sound/symbol correspondence as the first strategy.</li> <li>– begin to show evidence of sequence in recount and instructions.</li> <li>– use a wide range of vocabulary in their writing.</li> </ul>

## Mathematics and Numeracy

Children should be given opportunities, on a regular basis, to develop their skills in mental mathematics, to estimate and approximate, and to investigate and make simple predictions in all areas of mathematics and in the wider curriculum. Use should be made of the immediate environment and the world around them to extend children's knowledge of mathematics.

Focus	Experiences	Progression
<b>Understanding Number</b>	Understanding Number and Number Notation	<ul style="list-style-type: none"> <li>– count, read, write and order whole numbers, initially to 10, progressing to at least 1000.</li> <li>– make a sensible estimate of a small number of objects and begin to approximate to the nearest 10 or 100.</li> <li>– recognise and use simple everyday fractions.</li> </ul>
	Patterns, Relationships and Sequences in Number	<ul style="list-style-type: none"> <li>– copy, continue and devise repeating patterns.</li> <li>– understand the commutative property of addition and the relationship between addition and subtraction.</li> </ul>
	Operations and their Applications	<ul style="list-style-type: none"> <li>– understand the operations of addition, subtraction, multiplication and division and use them to solve problems.</li> <li>– develop strategies for adding and subtracting mentally up to the addition of two two-digit numbers within 100.</li> </ul>
<b>Measures</b>		<ul style="list-style-type: none"> <li>– understand and use the language associated with length, area and time.</li> <li>– use non-standard units to measure and recognise the need for standard units.</li> <li>– choose and use simple measuring instruments, reading and interpreting them with reasonable accuracy.</li> </ul>
<b>Shape and space</b>	Exploration of Shape	<ul style="list-style-type: none"> <li>– sort 2-D and 3-D shapes in different ways.</li> <li>– make constructions, pictures and patterns using 2-D and 3-D shapes.</li> <li>– name and describe 2-D and 3-D shapes; recognise reflective symmetry.</li> <li>– explore simple tessellation through practical activities.</li> </ul>
	Position, Movement and Direction	<ul style="list-style-type: none"> <li>– use prepositions to state position.</li> <li>– understand angle as a measure of turn; understand and give instructions for turning through right angles.</li> <li>– know the four points of the compass.</li> <li>– use programmable devices to explore movement and direction.</li> </ul>

## The World Around Us

At Key Stages 1, The World Around Us is presented as four inter-related strands that connect learning across geography, history and science and technology.

Strand	Pupils should be enabled to explore	Possible key questions
<b>Interdependence</b>	<ul style="list-style-type: none"> <li>– interdependence of people and the environment.</li> </ul>	<ul style="list-style-type: none"> <li>– How do living things interact with each other in the environment?</li> </ul>
<b>Place</b>	<ul style="list-style-type: none"> <li>– features of the immediate world and comparisons between places.</li> </ul>	<ul style="list-style-type: none"> <li>– What is in my world?</li> <li>– Where is it in the universe?</li> <li>– How has this place changed?</li> </ul>
<b>Movement and Energy</b>	<ul style="list-style-type: none"> <li>– sources of energy in the world.</li> <li>– how and why people and animals move.</li> </ul>	<ul style="list-style-type: none"> <li>– Why do things move?</li> <li>– How do things work?</li> <li>– What sources of energy are in my world?</li> <li>– How and why are they used?</li> </ul>
<b>Change Over Time</b>	<ul style="list-style-type: none"> <li>– positive change and how we have a responsibility to make an active contribution.</li> </ul>	<ul style="list-style-type: none"> <li>– How do things change?</li> <li>– What kind of changes happen, have happened or might happen?</li> </ul>

The Arts		
Area	Pupils should be enabled to	Possible examples
<b>Art and Design</b>	<ul style="list-style-type: none"> <li>- Investigate and respond to direct sensory experience; including visual, verbal, spatial and tactile dimensions, memory and imagination.</li> <li>- Look at and talk about resource material to stimulate their own ideas.</li> <li>- Experiment with a range of media, materials, tools and processes such as: three-dimensional construction.</li> </ul>	<ul style="list-style-type: none"> <li>- look at a range of natural and man-made objects, exploring and getting to know the characteristics of what is seen by close observation.</li> <li>- produce individual and group visual work so as to develop responses over time; contributing to the development of ideas in the course of the work.</li> <li>- exploit the visual properties of a range of two and three-dimensional media.</li> <li>- use modelling and construction techniques to make three-dimensional work.</li> </ul>

Personal Development and Mutual Understanding		
Area	Pupils should be enabled to explore	Children should have opportunities to explore
<b>Personal Understanding and Health</b>	<ul style="list-style-type: none"> <li>- positive attitudes to learning and achievement.</li> </ul>	<ul style="list-style-type: none"> <li>- acknowledging that everyone makes mistakes, that attempts can fail or have disappointing outcomes but that this is a natural and helpful part of learning.</li> <li>- recognising how they can develop and improve their learning.</li> </ul>
<b>Mutual Understanding in the Local and Wider community</b>	<ul style="list-style-type: none"> <li>- knowing what is fair and unfair and what they believe to be right or wrong.</li> </ul>	<ul style="list-style-type: none"> <li>- beginning to understand why and how rules are made in class.</li> <li>- identifying ways in which conflict may arise at school and exploring ways in which it could be lessened, avoided or resolved.</li> </ul>