**Science Curriculum Progression Key Stage 1**

Scientific Enquiry – Observation over Time **OT** / Pattern Seeking **PS** / Identifying and Classifying **IC** / Fair Testing **FT** / Researching **R**

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|  | LCC Question | **How could you be the next Simone Biles?** | | **Which birds and plants would little Red Riding hood find in our park?** | | **ADDITIONAL A**  **Which materials should the 3 little pigs have used to build their house?** | |
| **CYCLE A** | Knowledge | **Year 1 Animals, including Humans**   * able to identify and name a variety of common animals including fish, amphibians, reptiles, birds and mammals. * able to identify and name a variety of common animals that are carnivores, herbivores and omnivores. * know the structure of a variety of common animals (fish, amphibians, reptiles, birds and mammals, including pets) * able to identify, name, draw and label the basic parts of the human body and say which part of the body is associated with each sense. | | **Year 1 Plants**   * able to identify and name a variety of common wild and garden plants, including deciduous and evergreen trees. * able to identify and describe the basic structure of a variety of common flowering plants, including trees.   **Year 1 Seasonal Changes**   * know the changes across the four seasons. * know the weather associated with the seasons and how day length varies. | | **Year 1 Everyday Materials**   * able to distinguish between the object and the material it is made from. * able to identify and name a variety of everyday materials. * know the physical properties of everyday materials. * able to use properties to compare, sort and group materials. | |
| **Year 2 Animals, including Humans**   * know that animals, including humans, have offspring which grow into adults. * know the basic needs of animals, including humans, for survival (water, food and air). * know the importance for humans of exercise, eating the right amounts of different types of food, and hygiene. | | **Year 2 Living things and their habitats**   * know the differences between things that are living, dead, and things that have never been alive. * know that most living things live in habitats to which they are suited and describe how different habitats provide for the basic needs of different kinds of animals and plants, and how they depend on each other. * able to identify and name a variety of plants and animals in their habitats, including micro-habitats. * know how animals obtain their food from plants and other animals, using the idea of a simple food chain, and identify and name different sources of food.   **Year 2 Plants**   * know how seeds and bulbs grow into mature plants. * know how plants need water, light and a suitable temperature to grow and stay healthy. | | **Year 2 Everyday materials**   * able to identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for particular uses * know how the shapes of solid objects made from some materials can be changed by squashing, bending, twisting and stretching. | |
| Skill | **Year 1**   * Explore the world around them. * Ask simple questions. * Use simple secondary sources to find answers. | | **Year 1**   * Explore the world around them. * Ask simple questions. * Observe changes over time. | | **Year 1**   * Explore the world around them. * Ask simple questions. * Carry out simple tests * Use simple features to compare objects, materials and living things * With help, decide how to sort and group them (identifying and classifying) | |
| Scientific Enquiry focus: **IC R** | | Scientific Enquiry focus: **OT PS R** | | Scientific Enquiry focus: **IC FT** | |
| **Year 2**   * Explore the world around them. * Ask simple questions. * Use simple secondary sources to find answers. * Use simple measurements and equipment to gather data. * Record simple data * Talk about what they found out and how they found it out. * Begin to use scientific language. | | **Year 2**   * Explore the world around them. * Ask simple questions. * Carry out simple tests. * Use simple secondary sources to find answers. * Observe closely using simple equipment. * Observe changes over time. * With help, begin to notice patterns and relationships. * Use their observations and ideas to suggest answers to questions. | | **Year 2**   * Explore the world around them. * Carry out simple tests. * Begin to recognise different ways in which they might answer scientific questions. * Use simple measurements and equipment to gather data. * Record simple data * Talk about what they found out and how they found it out. * With help, record and communicate their findings in a range of ways. * Begin to use scientific language | |
| Scientific Enquiry focus: **OT PS IC R** | | Scientific Enquiry focus: **OT FT R** | | Scientific Enquiry focus: **IC FT R** | |
|  | Vocabulary | **Year 1**  human body  leg  arm  elbow  head  ear  nose  back  mammals  fish  reptiles,  birds  amphibians  + examples of each  herbivore,  omnivore  carnivore | **Year 2**  human body  adult  baby  offspring  kitten  calf,  puppy  survival  air  water  food  balanced diet  exercise  hygiene  exercise  hygiene | **Year 1**  leaves  flowers  petals  stem  fruit  roots  trees  trunk  branches  deciduous  evergreen  summer  spring  autumn  winter  sun  day  moon  night  light  dark | **Year 2**  explore  compare  plants  growth  seeds  bulbs  water  light  temperature  identify  deciduous  evergreen  living  dead  habitat + examples  energy  food chain  predator  prey | **Year 1**  water  paper  cardboard  wood  plastic  glass  metal  rock  hard  soft  bendy  rough  smooth | **Year 2**  brick  paper  fabric  foil  stretchy  stiff  shiny  dull  waterproof  absorbent  opaque  transparent  elastic  squashing  bending  twisting  stretching |

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| **CYCLE B** | LCC Question | **What would an alien think about Earth?** | | **Why are humans not like tigers?** | | **ADDITIONAL B**  **How can we grow our own salad?** | |
| Knowledge | **Year 1 Everyday Materials**   * able to distinguish between the object and the material it is made from. * able to identify and name a variety of everyday materials. * the physical properties of everyday materials. * able to use properties to compare, sort and group materials. | | **Year 1 Animals, including Humans**   * able to identify and name a variety of common animals including fish, amphibians, reptiles, birds and mammals. * able to identify and name a variety of common animals that are carnivores, herbivores and omnivores. * the structure of a variety of common animals (fish, amphibians, reptiles, birds and mammals, including pets) * able to identify, name, draw and label the basic parts of the human body and say which part of the body is associated with each sense. | | **Year 1 Plants**   * able to identify and name a variety of common wild and garden plants, including deciduous and evergreen trees. * able to identify and describe the basic structure of a variety of common flowering plants, including trees.   **Year 1 Seasonal Changes**   * changes across the four seasons. * weather associated with the seasons and how day length varies. | |
| **Year 2 Everyday materials**   * able to identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for particular uses * how the shapes of solid objects made from some materials can be changed by squashing, bending, twisting and stretching. | | **Year 2 Animals, including Humans**   * that animals, including humans, have offspring which grow into adults. * the basic needs of animals, including humans, for survival (water, food and air). * the importance for humans of exercise, eating the right amounts of different types of food, and hygiene. * know how animals obtain their food from plants and other animals, using the idea of a simple food chain, and identify and name different sources of food. | | **Year 2 Living things and their habitats**   * the differences between things that are living, dead, and things that have never been alive. * that most living things live in habitats to which they are suited and describe how different habitats provide for the basic needs of different kinds of animals and plants, and how they depend on each other. * able to identify and name a variety of plants and animals in their habitats, including micro-habitats. * how animals obtain their food from plants and other animals, using the idea of a simple food chain, and identify and name different sources of food. | |
|  | |  | | **Year 2 Plants**   * know how seeds and bulbs grow into mature plants. * know how plants need water, light and a suitable temperature to grow and stay healthy. | |
| Skill | **Year 1**   * Explore the world around them. * Ask simple questions. * Carry out simple tests * Use simple features to compare objects, materials and living things * With help, decide how to sort and group them (identifying and classifying) | | **Year 1**   * Explore the world around them. * Ask simple questions. * Use simple secondary sources to find answers. | | **Year 1**   * Explore the world around them. * Ask simple questions. * Observe changes over time. | |
| Scientific Enquiry focus: **IC FT** | | Scientific Enquiry focus: **IC R** | | Scientific Enquiry focus: **OT PS R** | |
| **Year 2**   * Explore the world around them. * Carry out simple tests. * Begin to recognise different ways in which they might answer scientific questions. * Use simple measurements and equipment to gather data. * Record simple data * Talk about what they found out and how they found it out. * With help, record and communicate their findings in a range of ways. * Begin to use scientific language | | **Year 2**   * Explore the world around them. * Ask simple questions. * Use simple secondary sources to find answers. * Use simple measurements and equipment to gather data. * Record simple data * Talk about what they found out and how they found it out. * Begin to use scientific language. | | **Year 2**   * Explore the world around them. * Ask simple questions. * Carry out simple tests. * Use simple secondary sources to find answers. * Observe closely using simple equipment. * Observe changes over time. * With help, begin to notice patterns and relationships. * Use their observations and ideas to suggest answers to questions. | |
| Scientific Enquiry focus: **IC FT R** | | Scientific Enquiry focus: **OT PS IC R** | | Scientific Enquiry focus: **OT FT R** | |
|  | Vocabulary | **Year 1**  water  paper  cardboard  wood  plastic  glass  metal  rock  hard  soft  bendy  rough  smooth | **Year 2**  brick  paper  fabric  foil  stretchy  stiff  shiny  dull  waterproof  absorbent  opaque  transparent  elastic  squashing  bending  twisting  stretching | **Year 1**  human body  leg  arm  elbow  head  ear  nose  back  mammals  fish  reptiles,  birds  amphibians  + examples of each  herbivore,  omnivore  carnivore | **Year 2**  human body  adult  baby  offspring  kitten  calf,  puppy  survival  air  water  food  balanced diet  exercise  hygiene  exercise  hygiene | **Year 1**  leaves  flowers  petals  stem  fruit  roots  trees  trunk  branches  deciduous  evergreen  summer  spring  autumn  winter  sun  day  moon  night  light  dark | **Year 2**  explore  compare  plants  growth  seeds  bulbs  water  light  temperature  identify  deciduous  evergreen  living  dead  habitat + examples  energy  food chain  predator  prey |