


Dereham Church Infant and Nursery School- Science

	Year group: 1	Area/topic: Plants
<p><i>(Objectives from NC/ELG/Development matters)</i></p> <p>Working scientifically:</p> <ul style="list-style-type: none"> *Observing closely, using simple equipment. *Identifying and classifying. *Using their observations and ideas to suggest answers to questions. <p>Plants:</p> <ul style="list-style-type: none"> *Identify and name a variety of common wild and garden plants, including deciduous and evergreen trees (Year 1, B1) *Identify and describe the basic structure of a variety of common flowering plants, including trees. (Year 1, B2) *Observe and describe how seeds and bulbs grow into mature plants. (Year 2, B3) <p>Seasonal changes:</p> <ul style="list-style-type: none"> *observe changes across the four seasons. (Year 1, E1) 		

Prior learning	Future learning
<ul style="list-style-type: none"> *Plant seeds and care for growing plants. (Nursery - Plants) *Understand the key features of the life cycle of a plant and an animal. (Nursery - Plants) *Begin to understand the need to respect and care for the natural environment and all living things. (Nursery - Plants) *Explore the natural world around them. (Reception - Living things and their habitats) *Recognise some environments that are different to the one in which they live. (Reception - Living things and their habitats) 	<p>Plants:</p> <ul style="list-style-type: none"> *Identify and name a variety of common wild and garden plants, including deciduous and evergreen trees (Year 1, B1) *Identify and describe the basic structure of a variety of common flowering plants, including trees. (Year 1, B2) *Observe and describe how seeds and bulbs grow into mature plants. (Year 2, B3) *Find out and describe how plants need water, light and a suitable temperature to grow and stay healthy. (Year 2, B4)
Working scientifically & encouraging scientific enquiry	
<p>Observing over time</p> <ul style="list-style-type: none"> *Observing plant growth and recording through drawing. 	

Identifying and classifying

- *Children to identify and recognise the difference between seeds and bulbs.
- *Children to dissect plants and identify the different parts.

Research using secondary sources

- *Children to see and discuss images and photographs of different types of plants including flowers and trees.
- *Children to view labelled diagrams of plants including trees and flowers.
- *Using ID charts to support naming plants.
- *Using images to support identifying and recognising if trees are deciduous or evergreen.

What pupils need to know or do to be secure

Key knowledge and skills	Possible evidence
<p>Plants:</p> <ul style="list-style-type: none">*I can see and talk about how the trees and plants are changing during Autumn. (E1 & B1)*I can use ID charts to identify and name trees and flowers I see in the local area. (B1)*I can record a tree through drawing or another method of recording and label with its correct name. (B1)*I can look at leaves and explain if they are from an evergreen tree or a deciduous tree and how I know by describing the shape and look of the leaves. (B1)*I can identify and verbally name a tree trunk, branches, leaves, roots and bark. (B2)*I can dissect a plant and verbally name the roots, stem, leaves and petals. (B2)*I can compare plants and recognise that the parts of a plant do not always look the same. (B2)*I can identify and name a bulb and a seed, recognising similarities and differences. (B3)*I can plant a seed and watch it grow by drawing what I see over a period of time. (B3)*I can compare the growth of my plant to others that have been planted at the same time. (B3)	<p>There will be evidence of children meeting the 'I can' statements through:</p> <ul style="list-style-type: none">*Quotes taken from discussions.*Children can correctly use the key vocabulary during lessons.*Adults scribing to evidence children's understanding.*Children recording through drawing.*Photographs of children's learning.*Children completing sorting, grouping and classifying activities.
<h3>Key vocabulary</h3>	
Common, wild, garden, roots, stem, stalk, bud, petals, fruit, berry, flower, seed, bulb, trunk, branch, leaves, bark, herbaceous plants, fern, moss, herb, deciduous, evergreen.	

Names of trees, garden and wild flowering plants in the local area.	
Common misconceptions	Books linking to this area
<ul style="list-style-type: none"> *Children may see plants as only being flowering plants that grow in pots with colourful petals and a stem. *Children may not recognise that trees are a plant. *Children may think all leaves and stems are green. *Children may not understand that a trunk is a stem. *Children may not recognise that blossom is a flower. 	<ul style="list-style-type: none"> *Leaf man by Lois Ehlert *Jaspers beanstalk by Nick Butterworth *Look what I found in the woods by Moira Butterfield *Eco Girl by Ken Wilson-Max *The extraordinary gardener by Sam Boughton *It starts with a seed by Laura Knowles and Jennie Webber *The tree book *Ten seeds by Ruth Brown
Memorable first hand experiences	Opportunities for communication
<ul style="list-style-type: none"> *Completing a local walk to identify and classify trees, plants, leaves etc. *Dissecting and observing plants using equipment. *Planting seeds and observing growth. *Collecting fallen items from trees such as leaves, fruit, nuts etc. 	<ul style="list-style-type: none"> *Children to be given opportunities for communication with partners, groups and whole class to discuss as completing practical activities and also to share findings. *Children to be provided with lots of opportunities to be outside observing plants and encouraged to discuss and describe what they see. *Through the use of Explorify.

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DCINS Reasonable adjustments for pupils with SEND

Communication and Interaction

- *Visual aids, pictures of equipment with words labelled, word mats with pictures for key words in that lesson.*
- *Freedom to explore scientific equipment and investigate in own way.*
- *Hands on experiences to encourage communication and interaction with others.*
- *Pre teaching any new vocabulary.*

Cognition and Learning

- *Opportunity for lots of hands on exploration and verbally sharing thoughts and ideas.*
- *Freedom to explore scientific equipment and processes.*
 - *Pre teaching new vocabulary or concepts.*
 - *Activities adapted if needed for safety and ease.*
- *Visual aids, pictures of equipment, mats with key words and pictures*
- *Learning recorded through photos and adult quotes, children not expected to write for recording their understanding.*
- *Using working walls to aid learning and remind of previous learning.*

Social, Emotional and Mental health

- *Awareness of individual needs, any potential triggers within the curriculum and the child's background.*
- *Pre prepare children for any activity they could find triggering or difficult in some way.*
 - *Practical activities or experiments to be completed within a smaller group or 1:1 if needed.*
- *If the class are sharing their learning within a large group, take the child in a smaller focus group if they struggle with social situations.*
- *Adjustments made where needed to suit individual.*

Sensory and Physical

- *Adult support with any practical activities.*
- *Awareness of the individual's likes or dislikes and their own reactions to sensory activities.*
- *If a child enjoys sensory activities, then plan for this wherever possible within the lesson.*