

## Year 5 and 6



Year 5 – with support

Year 6 – independently

### Grouping and classifying

- Children will build on all their primary learning and wider general knowledge when generating scientific questions.
- Children will learn more about different types of classification and other information records to identify, classify, sort and describe HOW their objects have been sorted.
- Children will begin to understand that there may be more than one way to sort a group of objects and begin to independently decide which method will be most efficient.
- Children will learn about the work of taxonomists such as Carl Linnaeus and create and read such keys **(Year 6 only)**.



By year 6 chn could use the classification system of Linnaeus to sort animals into vertebrates and invertebrates and then sort them further into

mammals, bird, amphibians etc. and arachnids, molluscs etc. explaining why they have placed them in that category based upon their common observable characteristics

Research

- Children will conduct scientific research using a range of sources - books, newspapers, magazines, journals, and the internet – and begin to understand that scientific ideas change over time and thus a book published in the 1970's will not have the most up to date research in it, nor can they simply read an online blog and take it as true fact
- Children will identify scientific evidence that has been used to support or refute ideas or arguments.



Children will record their research using scientific diagrams and vocabulary

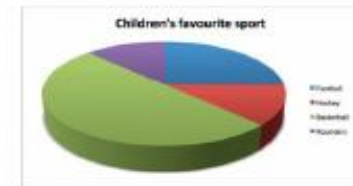
## Pattern Seeking

- Look for different casual relationships in their data and identify evidence that refutes or supports their ideas
- Use relevant scientific language and illustrations to discuss, communicate and justify their scientific ideas, use oral and written forms such as displays and other presentations to report conclusions, casual relationships and explanations of degree of trust in results.

**Year 5 should build on year 4 learning, and consolidate their understanding of line graphs, bar graphs and tables and begin to be able to describe the results they see.**



**Year 6 will build on year 5 and begin to interpret a range of data and construct data (AAR chn will construct pie charts).**



## Year 5 correlating maths targets

### Statistics

Solve comparison, sum and difference problems using information presented in a line graph.

*I can solve comparison, sum and difference problems using information presented in a line graph.*

Complete, read and interpret information in tables, including timetables.

*I can complete, read and interpret information in tables, including timetables.*

## Year 6 correlating maths targets

### Statistics

Interpret and construct pie charts and line graphs and use these to solve problems.

*I can interpret and construct pie charts and line graphs.*

*I can use these to solve problems.*

Calculate and interpret the mean as an average.

*I can calculate and interpret the mean as an average.*

## Observation over time

- Children decide what they what to observe and why
- Children will choose which equipment is best suited and why.
- Children will decide what measurements to take and how to record the data.

- Chn will be able to explain their results in detail using precise scientific vocabulary.



What is Mould?

Have you ever contemplated why your bread is covered with vile, fuzzy black spots, after you <sup>the self by doing a bit of sipping</sup> ~~have forgotten the self by~~ <sup>doe that</sup> ~~doe that~~ <sup>doe you really do it every morning</sup> ~~doe you really do it every morning~~ <sup>is</sup> ~~is~~ called mould? Mould (which is part of the Fungi's family)

It can be completely harmless, -like the mould in blue cheese. Although, other moulds can contain millions of <sup>seriously</sup> ~~micro-~~ <sup>seriously</sup> ~~bacterial~~ cells that can make you ill with diseases.

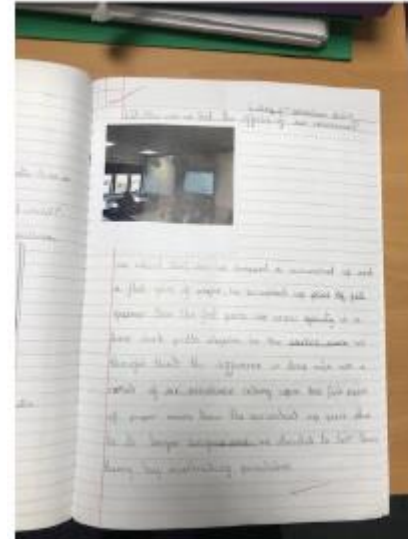
~~Mushrooms are the fun, mould recreates itself as~~ ~~miniature~~ ~~Keep reading to learn about the fascinating~~ ~~in dangerous world of mould,~~ <sup>when you just unintentionally</sup> ~~advanced.~~ <sup>advanced.</sup>

How does mould develop?

When <sup>food</sup> ~~moist~~ is placed in a <sup>hot, sunny</sup> ~~warm, dry~~ place with plenty <sup>of moisture and</sup> ~~enough~~ <sup>enough</sup> food to grow on, ~~moist~~

## Comparative and fair tests

- Choose the most appropriate equipment to make measurements with increasing precision and explain how to use it accurately. Take repeat measurements where appropriate.
- Decide how to record data and results of increasing complexity from a choice of familiar approaches: scientific diagrams and labels, classification keys, tables, scatter graphs, bar and line graphs
- Use relevant scientific language and illustrations to discuss, communicate and justify their scientific ideas, use oral and written forms such as displays and other presentations to report conclusions, causal relationships and explanations of degree of trust in results
- Use their results to make predictions and identify when further observations, comparative and fair tests might be needed



By the end of year 6 chn will be able to use the post-it-note planner to plan, and then write up their experiment. They should be able to explain their prediction/ hypothesis, equipment list / method / data and draw a conclusion.

