

Science

STATEMENT OF INTENT



INTENT

At Mytham, we understand that a science education is an entitlement for all of our pupils. We know that children are innately curious and we believe that our science curriculum will enable them to develop an understanding of the nature, processes and methods of science through different types of scientific enquiries that will help them to answer questions about the world around them and inspire a sense of awe about natural phenomena. Through their learning about science, we want children to understand its uses and significance to society and their own lives, both in the past and about the continuing importance of science in solving global challenges such as climate change, food availability, controlling disease and access to water.

Science is taught using objectives from the National Curriculum and our curriculum strives to enable children to develop both substantive knowledge (concepts, models, laws, theories) through the teaching of the fundamental areas of biology, chemistry and physics and disciplinary knowledge (working scientifically). When working scientifically, children learn that there are many types of scientific enquiry, for example, observation, pattern seeking, research, testing and classification. We want children to not only know 'the science' but to also know the evidence for it and be able to use this knowledge to work scientifically.

Science is taught every week across the key stages and a well sequenced curriculum allows children to build progressively on their scientific skills and knowledge whilst seeking to consolidate knowledge through discussion, cross curricular links and problem solving.

Knowledge organisers are used to allow teachers to build upon prior learning, introduce important vocabulary, identify key areas of new learning and to offer suggestions for ways in which teachers might broaden childrens' disciplinary knowledge with a balance of different forms of enquiry within the context of their substantive knowledge. New knowledge is broken down into meaningful components and introduced sequentially, which helps to support all pupils to learn scientific concepts. This includes those with special educational needs and/or disabilities.

We also want children to learn about the work of real life scientists and meet people in this field. We seek to dispel the myth of scientists as being old, male and eccentric! We believe there are strong links to be made with our Global Citizenship curriculum as we increasingly will need to rely on science to solve global challenges. We want children to engage as global citizens a practical level through the work of the school's Eco Team and Forest School.