



North Wingfield Primary and Nursery Academy Computing Curriculum.

Intent

At North Wingfield Primary and Nursery Academy, we aim to prepare our children for a rapidly changing world through the use of technology. Our high-quality computing curriculum is designed to enable them to use computational thinking and creativity to further understand our world. Our curriculum design has deep links with mathematics, science, and design and technology. At the core of our computing curriculum is computer science, in which pupils are taught the principles of information and computation, how digital systems work, and how to put this knowledge to use through programming.

Building on this knowledge and understanding, we intend for our children to...

- Use information technology to create programs, systems and a range of content.
- Ensure that pupils become digitally literate – able to use, and express themselves and develop their ideas through, information and communication technology – at a level suitable for the future workplace and as active participants in a digital world.
- Have an understanding of how technology works to connect and control in a range of real-world contexts.
- Be good digital citizens, able to live in a dangerous world with the critical awareness and healthy caution they need to remain safe and thrive, without being afraid.

Implementation

Our Computing curriculum amalgamates the best components of two schemes of learning: Project EVOLVE and Teach Computing.

It is comprised of three aspects:

- Information technology
- Digital Literacy.
- Computer Science

Computing skills are taught both discretely and in a cross-curricular manner, supporting other areas of learning across the school.

In EYFS and Key Stage 1, children are taught to use equipment and software confidently and purposefully, to communicate and handle information and to support their problem solving, and understanding of how the world works.

In Key Stage 2, our children extend their use of computing that they use for communication, investigation and programming and work to understand how to communicate safely.

Our planned curriculum for digital literacy that includes online safety is broad in covering a range of issues including understanding current issues such as ‘fake news’ and ‘body image’

Impact

Our students are confident using a wide range of hardware and software, and are diligent learners who value online safety and respect when communicating with one another.

Our 'I-vengers' are developing in prominence (although this program has been curtailed by COVID this year) and proficient. These children are responsible for supporting staff and children in delivering excellent Computing sessions, and in raising awareness of online safety issues. They will be further developed by completing the I-vengers Leaders Programme over the next 12 months.

If you were to walk into computing lessons at North Wingfield, you would see:

- Enthusiastic users of technology who are able to work both independently and collaboratively.
- Computing hardware and software being utilised to enhance the learning outcomes of our children, across the curriculum.
- Clear progression in technical skills in line with the Teach Computing Materials.
- A learning buzz as children engage in programming, instruct floor robots, prepare online safety presentations and design online safety video competition entries.