Curriculum Statement for Computing



Intent What we aim to achieve:

At Red Oaks we aim for children to be confident learners in Computing. We focus on 4 keys areas: Online Safety, Computer Science, Information Technology and Digital Literacy. Within these key areas are skills that will ensure our children become competent learners in a digital age.

We have set up links with the other TPAT schools and aim for the children at Red Oaks to have a smooth transition from Primary and Secondary, taking with them the key skills they need. Each computing lesson begins with an online safety starter that also has quite a few cross curricular links with PSHE and each session has been linked accordingly to the learning taking place in PSHE that term. The computing skills also link nicely to other subjects for research purposes and presentations in English and Maths. As time goes on we aim to involve the children in more exciting technological projects that keep them up to date and comfortable with the way the world is moving forward. At Red Oaks we always strive to make lessons engaging and exciting in an environment where the children want to thrive.

Implementation How we will achieve this:

Computing is taught on a weekly rota, one session per week. We use a scheme of work through Purple Mash that we have carefully looked through and made slight tweaks and adaptions to when each unit is taught throughout the year so it lines up with our overall Enquiry titles where possible, but we have also taken into consideration timescales and other commitments during particular terms. Each year group has units linked to the 4 key areas: Online Safety, Computer Science, Information Technology and Digital Literacy with extra online safety scenario starters. Each year the children use the knowledge and skills learnt in previous years to build on and develop further. Information Technology and Digital Literacy is particularly encouraged in other areas of the curriculum. The skills can be applied from research and presentations, to making videos and displaying information.

Alongside the requirements of the National Curriculum 2014, we at Red Oaks aim for children to leave primary school with the following knowledge of Computing:

- To use the program design process, including flowcharts, to develop algorithms for more complex programs using and understanding of abstraction and decomposition to define the important aspects of the program.
- To have a clear idea of appropriate online behaviour.
- To begin to understand how information online can persist.
- To understand the importance of balancing game and screen time with other parts of their lives.
- To use a spreadsheet to investigate the probability of the results of throwing many dice.
- Using the formula wizard to add a formula to a cell to automatically make a calculation in that cell.
- Using a spreadsheet to create computational models and answer questions.
- To learn about what the Internet consists of.
- To find out what a LAN and a WAN are.
- To think about what the future might hold.
- To find out what a text adventure is to be able to create one.
- To identify the purpose of writing a blog and its key features.
- To consider the effect upon the audience of changing the visual properties of the blog.
- To understand the importance of regularly updating the content of a blog.
- To understand how to contribute to an existing blog.
- To understand how and why blog posts are approved by the teacher.

- To learn how to use the question types within 2Quiz.
- To explore the grammar quizzes.

Impact

How do we measure the impact:

The subject leader ensures that both knowledge and skills are taught simultaneously through monitoring of planning, learning walks, pupil conferencing, audits of work being saved online and monitoring of assessment spreadsheets.

Each year group will have specific KPIs in the 4 key areas: Online Safety, Computer Science, Information Technology and Digital Literacy

These are: Digital Footprint, Programming, Combing Media and Online Communication.

Children will be assessed using WT, WA and GD. Those children working at GD will be encouraged to take part in extra-curricular and wider community projects. Assessments will be monitored to ensure those WT have the support in lessons they need and intervention where possible. Assessment will also be monitored to pick up on strengths and weaknesses throughout year groups so changes can be made accordingly and transitions can be smooth.