At St. Peter's, there are many ways that we adapt our teaching to respond to the different strengths and needs of all our pupils.

Adaptive Teaching in Computing

Making use of prior knowledge
This provides support for students when a new unit and new content is introduced.

Mind Mapping and Knowledge Retrieval
Knowledge retrieval and mind mapping activities can be used early in the teaching of a new Computing unit of work, to link new and previous learning. They can also be used to provide a scaffold or framework for ongoing learning throughout the topic.

Teacher intervention/discussion
When students are working on a task, the teacher takes the opportunity to work with groups/individuals to provide scaffolding through questioning and/or discussion.

The teacher probes their understanding, challenges their reasoning and explores whether they can explain their computational thinking.

Chunking Techniques
Interest can be maintained through short bursts of activity, and complexity is reduced by decomposing problems into smaller parts. This ensures that activities are kept as simple as possible and that it has all been chunked into bitesize pieces.

Students with learning difficulties can struggle with multi-step problem solving, or sustained concentration on one task, and therefore it helps to break up activities into shorter stages that can be tackled individually.

Peer discussion
Pairs/ groups can be carefully chosen with a view to providing peer-support and by getting pairs to work together.

Help sheets
These can be a checklist, visual examples or vocabulary sheets etc.

Pre-taught and embedding vocabulary
Embed opportunities to recall key terms within lessons.
Use rephrasing techniques to strengthen learner answers with correct vocabulary. Introduce new terms slowly and rehearse new words.

Attention
Know the children's areas of interest and try to include these in lessons and/or questions.
Give clear instructions (and **model**), this could be in the form of a checklist. This will create more manageable chunks.
Give verbal praise to encourage the children for their efforts, promoting a growth mindset.
Check in with learners throughout the activity, initially to check understanding of the task and then to provide more challenge when ready.

Sensory Needs
Ensure sensory needs of children are met, by ensuring any equipment (ear defenders, fidget toys, wobble cushions etc) are taken to the Discovery Suite with you at the start of the lesson. Ensure you use the Computing Monitors to support the smooth transition to each lesson – have them load the laptops before the lesson and ensure all have necessary equipment (mouse, headphones etc) to avoid delayed start to the lesson.

Physical Computing
Physical devices provide a tangible interface that helps students make connections between their actions and the results. Programming apps can then be used to consolidate learning.

Online Safety
Ensure to have considered all Online Safety elements for each lesson. For more information access Internet-Matters-Age-Guide-6-10s-Jan23.pdf (internetmatters.org).