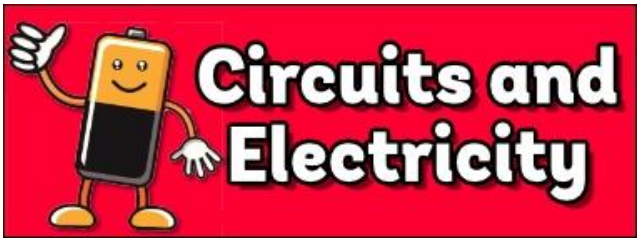
St Mary's C of E Primary School, Writhlington

'Be the BEST you can be'

Scheme of Work + Knowledge Organiser

Electricity



National Curriculum Knowledge outcomes:

I can associate the brightness of a lamp or the volume of a buzzer with the number and voltage of cells used in the circuit

I can compare and give reasons for variations in how components function, including the brightness of bulbs, the loudness of buzzers and the on/off position of switches

I can use recognised symbols when representing a simple circuit in a diagram.

Working Scientifically:

Lesson 3: planning different types of scientific enquiries to answer questions

using test results to make predictions to set up further comparative and fair tests

Lesson 4: using test results to make predictions to set up further comparative and fair tests

reporting and presenting findings from enquiries, in oral and written forms

Oracy:

Lesson 1: Presenting prior knowledge retained from Y4.

Lesson 4: Fed in facts to identify different circuits

Prior Learning:

Y4 – construct a simple series circuit, name the basic parts and recognise common conductors and insulators.

The Learning Journey:

Can I explain my current understanding of circuits and electrical components?
Discussion and mind map of knowledge retained from the last electricity unit in Year 4.

Can I identify and use the correct symbols for electrical components within circuit diagrams?

Can I build circuits using circuit diagrams to test my ideas?

Working scientifically skills applied.

Can I investigate whether the thickness or length of wire changes the brightness of a bulb?

Working scientifically skills applied.

Can I explain the difference between series and parallel circuits?

Can I use and apply my knowledge of circuits in real life situations?
Link to DT project of making a steady hand game.

Key Vocabulary:

Spelling	Definition/Sentence
Component	A device in an electric system
Parallel circuit	A closed circuit where the current is divided between two or more paths
Series circuit	A closed circuit where the current follows one path and stays the same throughout
Filament	A conducting wire or thread, which forms part of a bulb which when heated, becomes incandescent.
Incandescent	Emitting light as a result of being heated
Electromagnet	a soft metal core made into a magnet by the passage of electric current through a coil surrounding it.