

Newton Tony Primary School CE VC
Design and Technology Key Facts

Structures

EYFS Reception Year	I know that plastic is a 'waterproof' which does not absorb water.
	I know that some objects float eg boat, and others sink eg, brick
	I know I can use paper, cardboard and plastic to make models.
Year 1	I know that natural structures are those found in nature.
	I know that man-made structures are those made by people.
	I know that cylinders are a strong type of structure (e.g. the main shape used for windmills and lighthouses).
Year 2	I know the three main parts of a windmill are the turbine, axle and structure.
	I know that materials can be manipulated to improve strength and stiffness.
	I know that axles are used in structures and mechanisms to make parts turn in a circle.
Year 3	I know that wide and flat based objects are more stable.
	I know that it is important for structures to be strong and stiff.
Year 4	I know that a 'free-standing' structure is one which can stand on its own.
	I know that a paper net is a flat 2D shape that can become a 3D shape once assembled.
	I know that a product's function means its purpose.
Year 5	I know that structures can be strengthened by manipulating materials and shapes.
	I know that triangles can be used to reinforce bridges.
	I know the difference between arch, beam, truss and suspension bridges.
Year 6	I know the material (functional and aesthetic) properties of wood.
	I know that a prototype is a cheap model to test a design idea.
	I know how to carry and use a saw safely