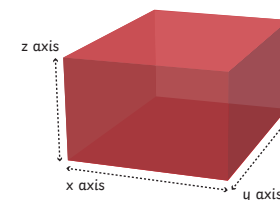


Key Vocabulary	
dimension	The measure of a size such as length or width.
edge	The straight line where two flat faces of a 3D shape meet.
face	A flat surface on a 3D shape.
handle	A point on a 3D model where it can be modified by clicking and dragging.
modify	To make a small change to something.
object	A shape or line that can be moved, resized or modified .
perspective	Seeing things in different ways.
Workplane	The area used to place objects in Tinkercad.
viewpoint	The position from where you view something.

What Is 3D Modelling?

3D modelling is a way of creating a digital representation of three-**dimensional** objects. Three-**dimensional** objects have height, width and depth.



A 3D model can be looked at from different angles or **viewpoints**.

3D models can be made using materials such as paper or wood, or they can be printed using a 3D printer.

3D modelling is used in many different industries including architecture, construction, film-making, gaming, product design, geology and even health care. 3D models allow designers to try out ideas, be creative and solve problems without using up expensive resources in the real world.

Tinkercad - The Basics

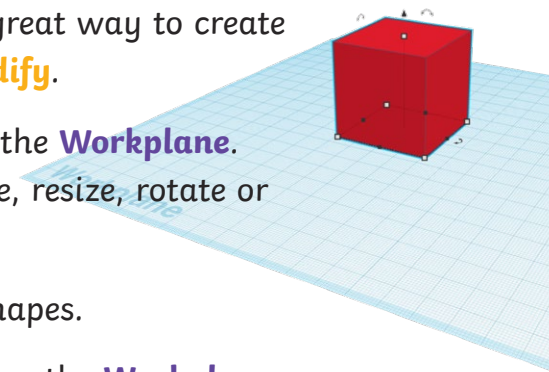
3D modelling software such as Tinkercad is a great way to create 3D models that you can be easily edit and **modify**.








In Tinkercad, 3D **objects** can be dragged on to the **Workplane**. **Handles** around the **object** can be used to move, resize, rotate or even lift it into the air.








Objects can be joined together to create new shapes.



The View Cube lets you look at things on the **Workplane** from different **viewpoints**.



Tinkercad Tools	
	View Cube Shows objects from different angles.
	Home View Returns the Workplane to the home or starting position.
	Fit all in view Changes the view so that all objects on the Workplane can be seen.
	Zoom in and out Allows you to zoom in or out of your view. Scrolling the mouse wheel also does this.
	Switches between perspective view (3D) and orthographic view (flat).
	Duplicate Makes an exact copy of the selected object on the Workplane .
	Delete Deletes the selected object on the Workplane .

Tinkercad Tools	
	Group Groups selected objects together.
	Ungroup Separates a set of objects that have been grouped together.
	Align Lines up objects in a straight line.
	Mirror Flips objects in different planes.
	Lock Locks an object on the Workplane so that it cannot be edited or moved.
	Hide / Show Hides a selected object or shows all objects on the Workplane .
	Notes Adds a note or label to a model.