

How brickideas can provide a genuine D & T experience within the school curriculum.

Show measurable outcomes.

Although this information is for a motorised vehicle all my workshops can fulfil these outcomes.

User	<p>The Children will be able to identify who the product is for.</p> <p>Use pictures of existing Vehicles or products to learn about design and ease of use.</p> <p>We are designing a vehicle or product that will be used on the moon surface. We have the following design criteria to consider:</p> <p>The vehicle or product must be stable safe.</p> <p>It must be able to move safely with an electric motor.</p> <p>It must be strong and not fall apart when used.</p>
Purpose	<p>The Children will be able to explain the purpose of their design and how it works.</p> <p>Their vehicle or product will fulfil a number of defined tasks.</p> <p>Understand the concept of 'fit for purpose'.</p>
Functionality	<p>The children will design and make a working vehicle or product that functions to fulfil the users needs, wants and purposes. The children will learn about a working vehicle or product and why design criteria are important to make sure that it works as intended. They will learn about the components necessary (gears, motors, levers, linkages) to ensure that the vehicle or product moves safely and is strong enough to do the job.</p>
Design decisions	<p>The children will make design decisions to ensure that their design is strong and 'fit for purpose'. They will be able to demonstrate their creative, technical and practical expertise. They will make design decisions, discuss why they have made decisions about their design. They will develop their technical and practical expertise, develop and improve their design.</p>
Innovation	<p>While designing and building their vehicle or product the children will have the opportunity to be totally original with their thinking. The children will be able to respond creatively and imaginatively to the design brief. They will be able to take creative risks.</p>
Authenticity	<p>The children will design and build real life working models of a vehicle or product. The children will test their vehicle or product and evaluate the effectiveness of their design.</p>
	<p>While designing, building and testing their vehicles or product the children will carry out the following:</p> <p>Use components, motors, gears. Strong structures, reinforcing structures. Conduct fair tests, collect and record data, draw a technical diagram of their design.</p> <p>Links to History, Maths, D&T.</p>