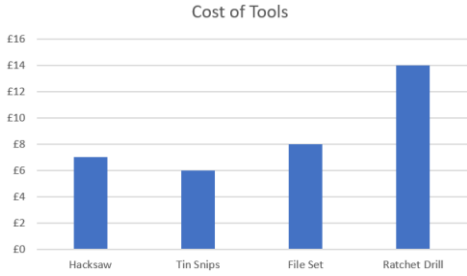


Functional Skills Maths | Lesson Starter Quiz for Engineering Learners

<p>1. Rashid is working as a car mechanic. He has the following jobs.</p> <ul style="list-style-type: none"> • Change Oil – $\frac{3}{4}$ hour • Service – 1 hour 40 minutes • Change Coolant – 30 minutes <p>How long will it take him to do these jobs?</p> <p style="text-align: right;">(1)</p>	<p>2. Shirley is adding windscreen wash to her car. She has a 750ml bottle of concentrated wash.</p> <p>It needs to be mixed in the ratio 1 : 3 windscreen wash to water.</p> <p>How many litres of mixed wash will she have in total?</p> <p style="text-align: right;">(1)</p>	<p>3. Emma needs to buy new summer tyres. She sees an offer</p> <div style="border: 1px solid orange; padding: 10px; text-align: center; margin: 10px auto; width: 80%;"> <p>Summer Tyres</p> <p>£76.99 each</p> <p>Buy four and the fitting is free</p> </div> <p>How much would it cost to replace all four tyres?</p> <p style="text-align: right;">(1)</p>										
<p>4. Nelly needs to run cable completely around a rectangular room that measures 5.26m x 3.76m.</p> <p>How much cable will she need?</p> <p style="text-align: right;">(1)</p>	<p>5. Using the following graph, how much would it cost to a ratchet drill, a file set, one set of tin snips and three hacksaws?</p> <div style="text-align: center;">  <table border="1" style="margin: 10px auto; border-collapse: collapse;"> <caption>Cost of Tools</caption> <thead> <tr> <th>Tool</th> <th>Cost (£)</th> </tr> </thead> <tbody> <tr> <td>Hacksaw</td> <td>7</td> </tr> <tr> <td>Tin Snips</td> <td>6</td> </tr> <tr> <td>File Set</td> <td>8</td> </tr> <tr> <td>Ratchet Drill</td> <td>14</td> </tr> </tbody> </table> </div> <p style="text-align: right;">(1)</p>	Tool	Cost (£)	Hacksaw	7	Tin Snips	6	File Set	8	Ratchet Drill	14	<p>6. Jamie has recorded the time it has taken them to deburr 5 copper pipes in minutes</p> <ul style="list-style-type: none"> • Pipe 1 – 25 • Pipe 2 – 17 • Pipe 3 – 13 • Pipe 4 – 21 • Pipe 5 – 19 <p>What is the mean time they took?</p> <p style="text-align: right;">(1)</p>
Tool	Cost (£)											
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<p>7. You need to deliver copper pipes to a customer.</p> <p>You know how much each pipe weighs and how much weight your van will hold?</p> <p>How would you work out how many pipes you could take in a journey?</p> <p style="text-align: right;">(1)</p>	<p>8. Your college is buying drill gauges. A single gauge costs £2.75 plus VAT.</p> <p>VAT is 20%</p> <p>How much would it cost to buy 5 drill gauges?</p> <p style="text-align: right;">(1)</p>	<p>9. Use a reverse calculation to check your answer to question 6.</p> <p style="text-align: right;">(1)</p>										