## Similar Shapes Revision

| (a) | (b) | (c) |
| :---: | :---: | :---: |
| Triangles ABC and DEF are similar. Calculate the lengths of DE and <br> AC. | Rectangles $A$ and $B$ are mathematically similar. The area of $A$ is $40 \mathrm{~cm}^{2}$. Work out the area of rectangle $B$. <br> - | Find the missing length <br> $x$. |
| (d) | (e) | (f) |
| Cylinders $A$ and $B$ are similar. The volume of cylinder $B$ is $2080 \mathrm{~cm}^{3}$. Find the volume of cylinder A. | Find the missing lengths $x$ and $y$. | Cuboids $A$ and $B$ are similar. $A$ has a volume of $28 \mathrm{~cm}^{3}$ and $B$ has a volume of $437.5 \mathrm{~cm}^{3}$. <br> Find the length $L$. |
| (g) | (h) | (i) |
| Cones $A$ and $B$ are mathematically similar. Cone $A$ has a volume of $857.5 \mathrm{~cm}^{3}$ and a surface area of $73.5 \mathrm{~cm}^{2}$. Cone $B$ has a volume of $160 \mathrm{~cm}^{3}$. Find its surface area. | The area of the white triangle is $18 \mathrm{~cm}^{2}$. Find the area of the shaded region. | Pentagons $A$ and $B$ are similar. The scale factor of their lengths is $x$. The area of $A$ is $12 \mathrm{~cm}^{2}$. If the area of B is $(16 x+3) \mathrm{cm}^{2}$, find the value of $x$. |

