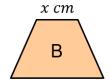
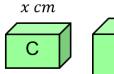
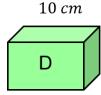
Harder Similar Areas and Volumes

4 cm



(a) The area of A is 20 cm^2 and the area of B is 180 cm^2 . Find x.





(b) The volume of C is 5 cm^3 and the volume of D is 320 cm^3 . Find x.





(c) The surface area of E is 15 cm^2 and the surface area of F is 60 cm^2 . If the volume of E is 27 cm^3 , find the volume of F.

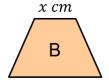




- (d) The volume of G is $4~\rm cm^3$ and the volume of H is $171.5~\rm cm^3$. If the surface area of H is $122.5~\rm cm^2$, find the surface area of G.
- (e) If a painting with area of $220\ cm^2$ has a diagonal length of $21\ cm$, what will be the diagonal length of a similar painting with area $350\ cm^2$?
- (f) It takes 5.6 litres of paint to paint a tower that is $3\,m$ high. What is the tallest similar tower that can be painted with 8 litres of paint?
- (g) A bronze statue has a mass of $300\,\mathrm{g}$ and a height of $9\,\mathrm{cm}$. A similar statue has a mass of $2\,\mathrm{kg}$. What is its height?

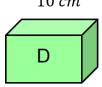
Harder Similar Areas and Volumes





(a) The area of A is 20 cm^2 and the area of B is 180 cm^2 . Find x.





(b) The volume of C is 5 cm^3 and the volume of D is 320 cm^3 . Find x.





(c) The surface area of E is $15~\rm{cm^2}$ and the surface area of F is $60~\rm{cm^2}$. If the volume of E is $27~\rm{cm^3}$, find the volume of F.





- (d) The volume of G is $4~\rm cm^3$ and the volume of H is $171.5~\rm cm^3$. If the surface area of H is $122.5~\rm cm^2$, find the surface area of G.
- (e) If a painting with area of 220 cm^2 has a diagonal length of 21 cm, what will be the diagonal length of a similar painting with area 350 cm^2 ?
- (f) It takes 5.6 litres of paint to paint a tower that is $3\ m$ high. What is the tallest similar tower that can be painted with 8 litres of paint?
- (g) A bronze statue has a mass of $300\,\mathrm{g}$ and a height of $9\,\mathrm{cm}$. A similar statue has a mass of $2\,\mathrm{kg}$. What is its height?