Question 1: Find the volume of each of these spheres. Give each answer to one decimal place (you may use a calculator)

(a) 8 cm
(b) 3 cm
(c) 1.5 m
(d) 22 cm
(e) 7 m
(f) 0.8 cm

Question 2: Find the volume of each of these spheres. Give each answer in terms of \(\pi\) (you may not use a calculator)

(a) 3 cm
(b) 12 cm
(c) 5 cm

Question 3: Find the volume of each of these spheres. Give your answers to three significant figures (you may use a calculator)

(a) A sphere with radius 9 cm
(b) A sphere with diameter 38 cm
(c) A sphere with diameter 6.7 cm
(d) A sphere with radius 1.25 inches.
Volume of a Sphere
Video 361 on Corbettmaths

Question 4: Find the size of the radius in each of the spheres below.
   Give your answers to one decimal place (you may use a calculator)

(a) ![Sphere A] Volume = 200 cm$^3$
(b) ![Sphere B] Volume = 1950 cm$^3$
(c) ![Sphere C] Volume = 1 m$^3$

Question 5: Find the size of the diameter in each of the spheres below.
   Give your answers to one decimal place (you may use a calculator)

(a) ![Sphere D] Volume = 50 cm$^3$
(b) ![Sphere E] Volume = 2360 cm$^3$
(c) ![Sphere F] Volume = 0.4 m$^3$

Question 1: A metal cuboid measuring 4 cm by 5 cm by 12 cm is melted down and a sphere is made.
   Calculate the radius of the sphere.

Question 2: Calculate the volume of a hemisphere with base of radius 8 cm.

Question 3: A solid sphere fits perfectly inside of a cube box of side length 10 cm.
   What percentage of the box is empty?

Question 4: A ball of gold has a radius of 9 cm.
   The density of gold is 19.3 g/cm$^3$.
   Work out the mass of the ball.