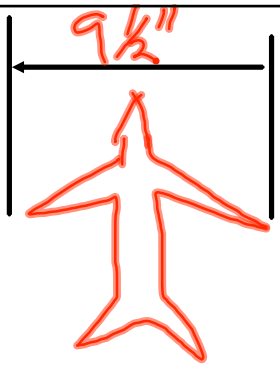
November 02, 2009

1:72



$9.5 \times 72 = 684"$

$684 \div 12 = 57'$

$$D = \frac{m}{V} = \frac{14.5\,oz}{9\,in^3} \approx \frac{1.6\,oz}{1\,in^3} =$$

$$1.6\,oz/in^3$$

ICE

$16^3 = 4096\ cm^3$

$\frac{0.922\ g}{1\ cm^3} = \frac{m}{4096\ cm^3}$

$m = 3777\ g$

STEEL

$\frac{7.8\ g}{1\ cm^3} = \frac{m}{512\ cm^3}$

$m = 3994\ g$

CHAP 4.3

4a) $\frac{130\ kg}{1\ m^3} \times \frac{4}{4} = \frac{520\ kg}{4\ m^3}$ ≈ 520 kg

4b) $\frac{130\ kg}{1\ m^3} = \frac{130{,}000\ g}{1{,}000{,}000\ cm^3} =$ 0.13 g

6) $D = \frac{m}{V}$ $m = 150\ g$ $V = 40\ cm^3$

$D = \frac{150\ g}{40\ cm^3} =$ $3\frac{3}{4}\ \frac{g}{cm^3}$

7) $D = \frac{m}{V}$ $m = 4\text{-}lb$ $V = 29\ in^3$

$D = \frac{4\text{-}lb}{29\text{-}in^3} =$ 0.14 lb/in3