

Notes on Surface Area

Name: Key

th Grade Math

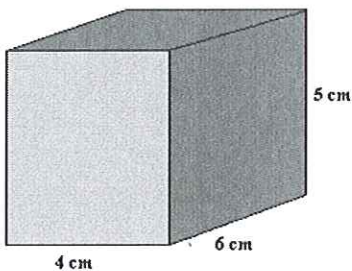
The surface area of a figure is:

The sum of areas of each face.

Rectangular Prism-

How many different rectangles do we have? 3

1.

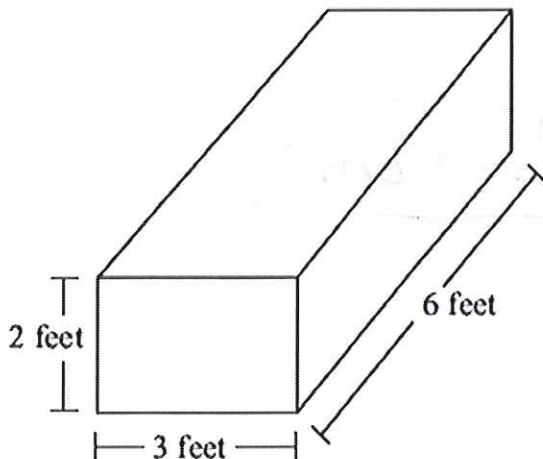


Top & Bottom : $4\text{cm} \cdot 6\text{cm}$
Left & Right : $5\text{cm} \cdot 6\text{cm}$
Front & Back : $4\text{cm} \cdot 5\text{cm}$

$$24 + 24 + 30 + 30 + 20 + 20 = \text{Surface Area}$$

$$= 148 \text{ cm}^2$$

2.

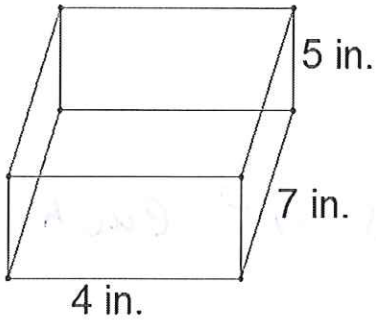


Top & Bottom : $3\text{ft} \cdot 6\text{ft} = 18\text{ft}^2$
Left & Right : $2\text{ft} \cdot 6\text{ft} = 12\text{ft}^2$
Front & Back : $2\text{ft} \cdot 3\text{ft} = 6\text{ft}^2$

$$18 + 18 + 12 + 12 + 6 + 6 = \text{Surface Area}$$

$$= 72 \text{ ft}^2$$

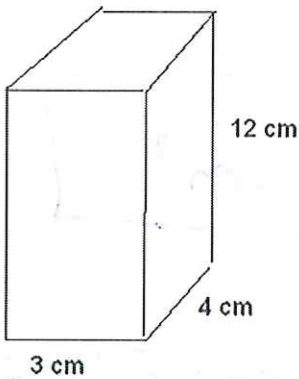
3.



$$\begin{aligned} \text{Top \& Bottom: } & 4\text{ in} \cdot 7\text{ in} = 28\text{ in}^2 \\ \text{Left \& Right: } & 5\text{ in} \cdot 7\text{ in} = 35\text{ in}^2 \\ \text{Front \& Back: } & 4\text{ in} \cdot 5\text{ in} = 20\text{ in}^2 \end{aligned}$$

$$28 + 28 + 35 + 35 + 20 + 20 = \text{Surface Area} = \boxed{166\text{ in}^2}$$

4.



$$\begin{aligned} \text{Top \& Bottom: } & 3\text{ cm} \cdot 4\text{ cm} = 12\text{ cm}^2 \\ \text{Left \& Right: } & 4\text{ cm} \cdot 12\text{ cm} = 48\text{ cm}^2 \\ \text{Front \& Back: } & 3\text{ cm} \cdot 12\text{ cm} = 36\text{ cm}^2 \end{aligned}$$

$$12 + 12 + 48 + 48 + 36 + 36 = \text{Surface Area} = \boxed{192\text{ cm}^2}$$