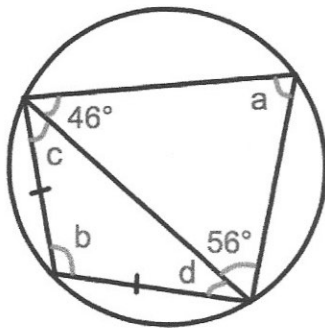


On the grid, clearly indicate the region that satisfies all these inequalities.

$$x \geq 2$$

$$y \geq 1$$

$$x + y \leq 4$$



Find a

$$\begin{aligned} a &= 180 - 46 - 56 \\ &= 78^\circ \end{aligned}$$

Find b

$$180 - 78 = 102^\circ$$

Find c

$$\begin{aligned} 180 - 102 &= 78 \\ 78 \div 2 &= \underline{\underline{39^\circ}} \end{aligned}$$

Find d

$$39^\circ$$

C is directly proportional to the square root of y.

When  $C = 12.8$ ,  $y = 16$ .

Express C in terms of y.

$$C = 3.2 \times \sqrt{y}$$

$$\begin{aligned} C &\propto \sqrt{y} \\ C &= k \times \sqrt{y} \\ 12.8 &= k \times 4 \\ k &= 3.2 \end{aligned}$$

Find C when  $y = 400$

$$\begin{aligned} C &= 3.2 \times \sqrt{400} \\ C &= 64 \end{aligned}$$