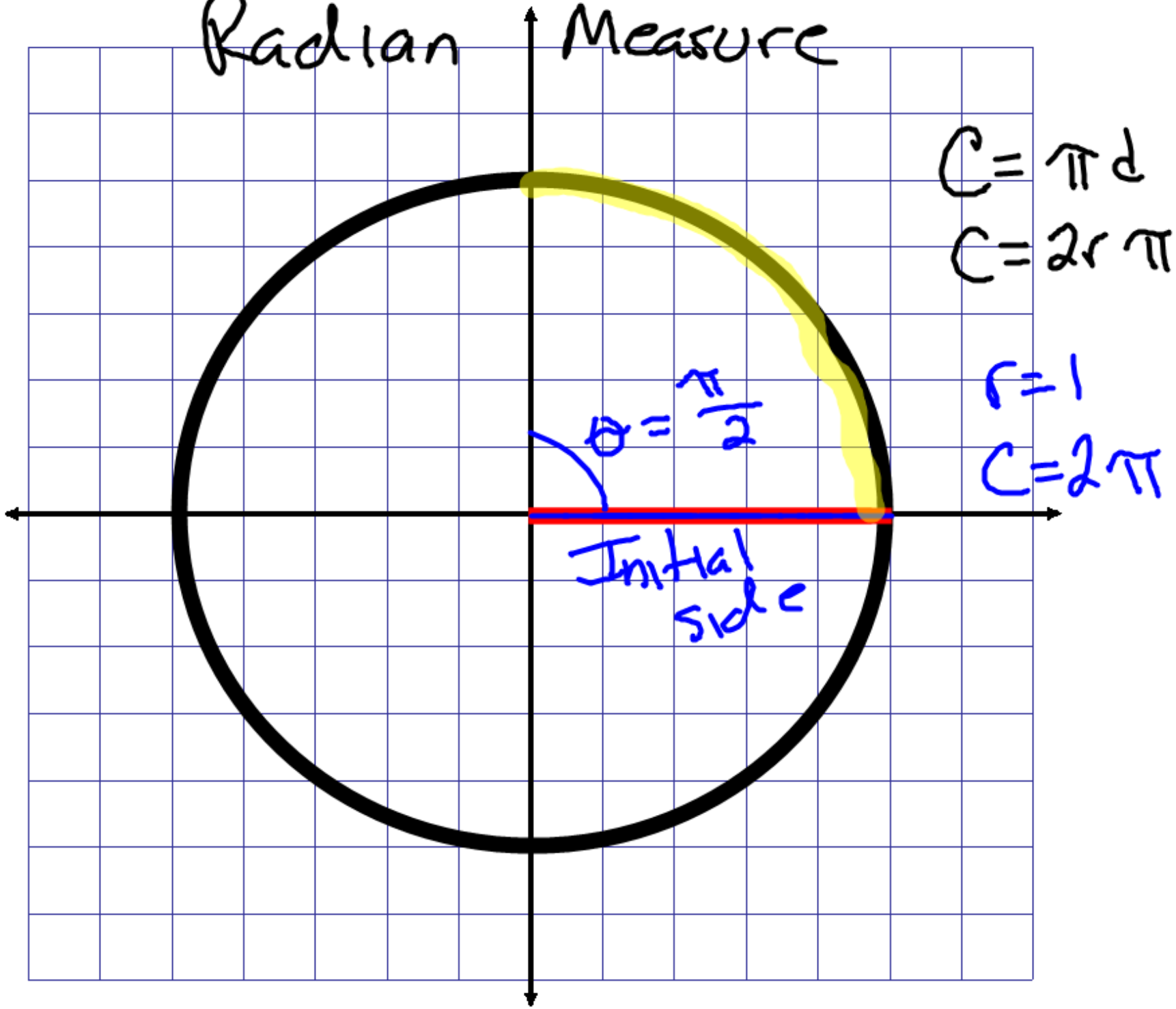
Radian Measure



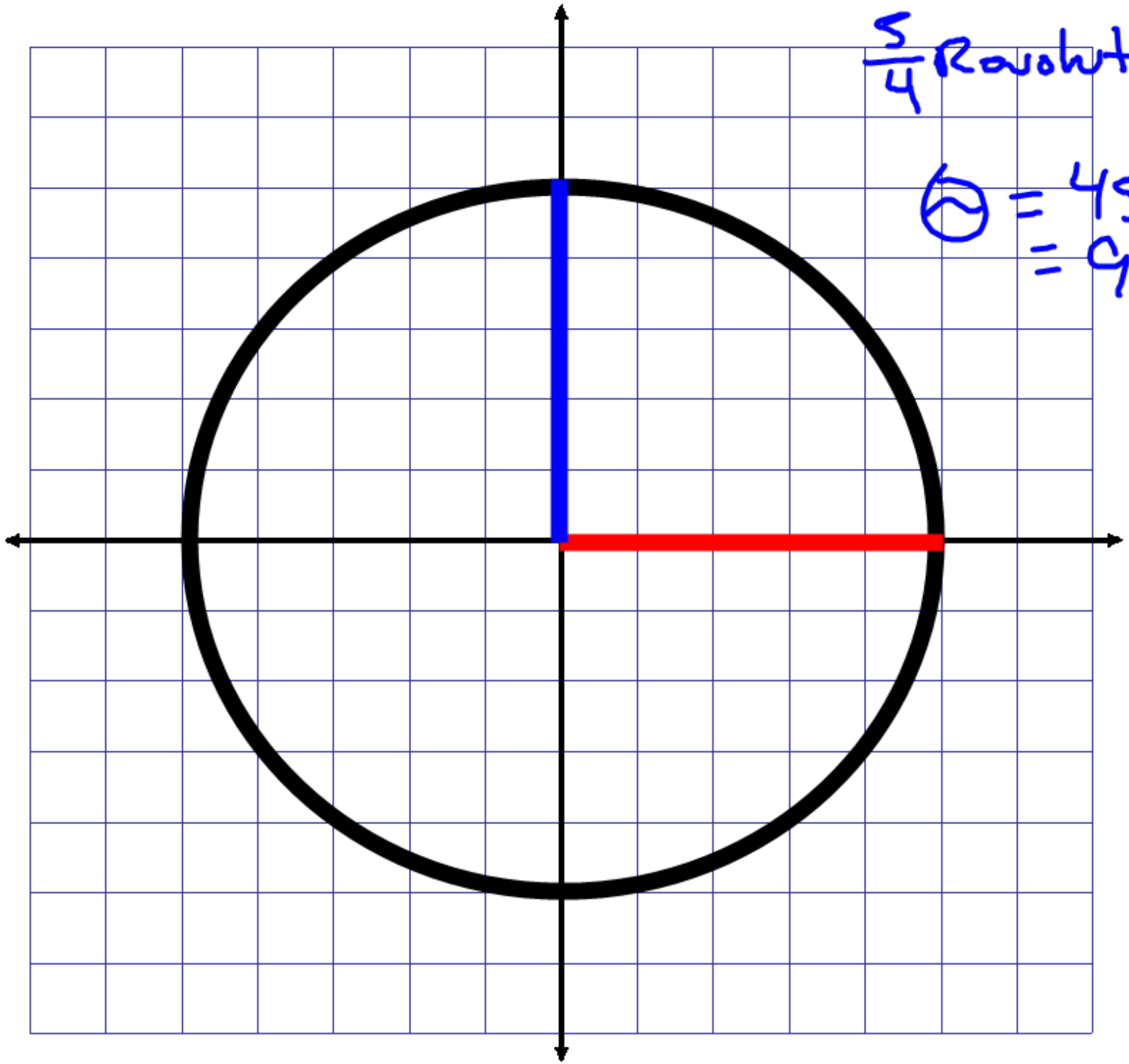
$0^\circ = 0$ or 2π 0

$90^\circ = \frac{\pi}{2}$ 1/4

$180^\circ = \pi$ 1/2

$270^\circ = \frac{3\pi}{2}$ 3/4

$360^\circ = 0$ or 2π 1


$\frac{5}{4}$ Revolutions
$\theta = 450°$
$= 90°$

$$\frac{\pi}{2} + \frac{2\pi}{1} = \frac{5\pi}{2}$$

$$\frac{\pi}{2} = \frac{1}{2}\pi$$

$$\frac{1\pi}{2} + \frac{4\pi}{2} = \frac{5\pi}{2} + \frac{4\pi}{2} = \frac{9\pi}{2}$$

$$\frac{\pi}{2} \to \frac{5\pi}{2} \to \frac{9\pi}{2} \to \frac{-3\pi}{2}$$

$$\frac{\pi}{2} - 2\pi = \frac{\pi}{2} - \frac{4\pi}{2} = \frac{-3\pi}{2}$$

$$\frac{13\pi}{6} \rightarrow \frac{\pi}{6}$$

$$0 \rightarrow 2\pi$$

$$\frac{13}{6} - \frac{2}{1} = \frac{13}{6} - \frac{12}{6} = \frac{1}{6}$$

Degree → Radians

$90^\circ = \frac{\pi}{2}$

$\frac{1}{4} \cdot 2\pi = \frac{\pi}{2}$

$\frac{90}{360} \cdot 2\pi$

$\frac{x}{360} \cdot 2\pi = \frac{2x\pi}{360}$

$\frac{D\pi}{180}$

$\frac{135}{180}\pi$

$D = 135^\circ$

$R = \frac{3\pi}{4}$

Radians → Degrees

$$\frac{D\pi}{180} = R$$

$$\frac{3\cancel{\pi}}{4} \cdot \frac{180^{\circ}}{\cancel{\pi}} = 135^{\circ}$$

$$\frac{D\pi}{\pi} = \frac{180R}{\pi}$$

$$D = \frac{180}{\pi}R$$