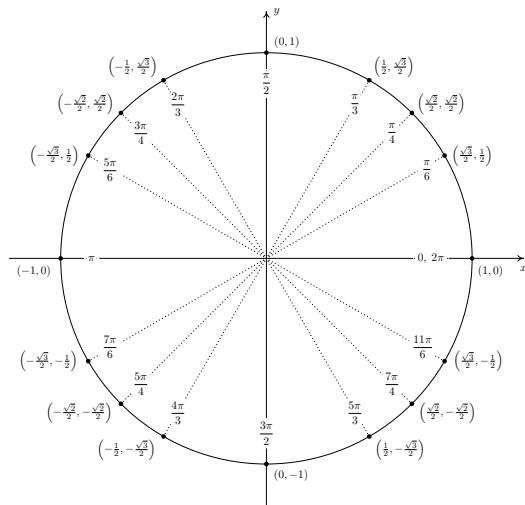Figure 4.1.15: Important Points on the Unit Circle

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True or False: $\sin\left(\dfrac{\pi}{3}\right) = \dfrac{1}{2}$

(a) True, and I can explain why

(b) True, but I am unsure why

(c) False, and I can explain why

(d) False, but I am unsure why

(e) Umm . . .

True or False: $\cos\left(\dfrac{5\pi}{6}\right) = -\dfrac{\sqrt{3}}{2}$

(a) True, and I can explain why

(b) True, but I am unsure why

(c) False, and I can explain why

(d) False, but I am unsure why

(e) Umm . . .

$$\cos\left(-\frac{2\pi}{3}\right) =$$

(a) $\frac{1}{2}$

(b) $-\frac{\sqrt{3}}{2}$

(c) $-\frac{1}{2}$

(d) $\frac{2}{\sqrt{2}}$

(e) Umm ...

$\tan\left(\dfrac{5\pi}{4}\right) =$

(a) -1

(b) 1

(c) $-\dfrac{\sqrt{2}}{2}$

(d) Is undefined

(e) Umm . . .

Graph $y = \sin(x)$ and $y = \cos(x)$ on the interval $[0, 2\pi]$

1. Where is $\sin(x)$ positive? Negative? Increasing? Decreasing?

2. Where is $\cos(x)$ positive? Negative? Increasing? Decreasing?