y-axis

$P\left(\dfrac{\pi}{2}\right) = (0, 1)$

$P\left(\dfrac{\pi}{4}\right) = (\tfrac{1}{2}\sqrt{2}, \tfrac{1}{2}\sqrt{2})$

$P(\pi) = (-1, 0)$

$P(0) = (1, 0)$

x-axis

$x^2 + y^2 = 1$

$P\left(\dfrac{3\pi}{2}\right) = (0, -1)$