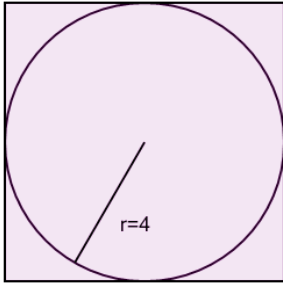




Math worksheet on 'Inscribed Circle in Square - Circle Radius to Square Side Length (Level 1)'. Part of a broader unit on 'Inscribed Squares and Circles - Intro'

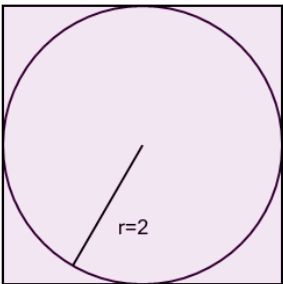
Learn online: app.mobius.academy/math/units/inscribed_squares_and_circles_intro/

1 Find the side length of a square that has an inscribed circle with radius 4



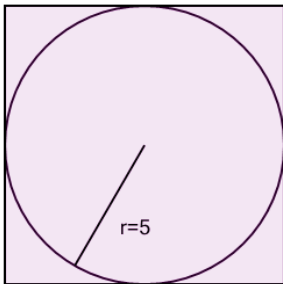
a $\frac{8^2}{2} \pi$	b 4	c $(\sqrt{8})^2 \pi$
d 8π	e $2\sqrt{\frac{8}{2\pi}}$	f 8

2 Find the side length of a square that has an inscribed circle with radius 2



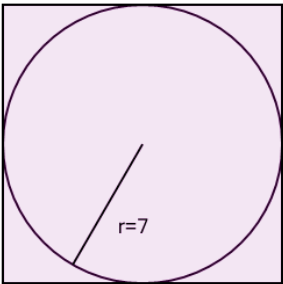
a 4	b 8π	c $\frac{4^2}{2} \pi$
d 4π	e $2\sqrt{\frac{4}{2\pi}}$	f 2

3 Find the side length of a square that has an inscribed circle with radius 5



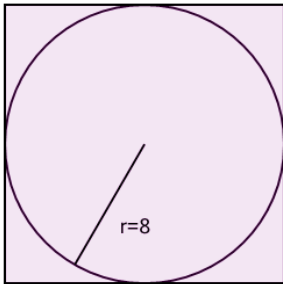
a $2\sqrt{\frac{25}{2\pi}}$	b $2\sqrt{\frac{50}{2\pi}}$	c $\frac{50^2}{2} \pi$
d 5	e 10	f $4\sqrt{50}$

4 Find the side length of a square that has an inscribed circle with radius 7



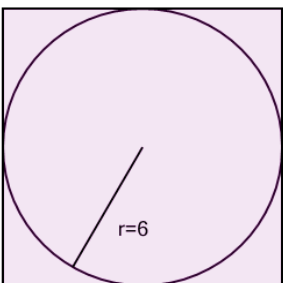
a 14	b $\frac{49}{2} \sqrt{2}$	c $(\sqrt{49})^2 \pi$
d 7	e 98π	f $\frac{49^2}{2} \pi$

5 Find the side length of a square that has an inscribed circle with radius 8



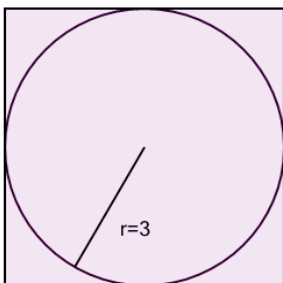
a $2\sqrt{\frac{16}{2\pi}}$	b 64	c $\frac{32}{2} \sqrt{2}$
d 16	e 8	f $\frac{64^2}{2} \pi$

6 Find the side length of a square that has an inscribed circle with radius 6



a $2\sqrt{\frac{18}{2\pi}}$	b $2\sqrt{\frac{72}{2\pi}}$	c 12
d $4\sqrt{36}$	e 6	f $2\sqrt{\frac{12}{2\pi}}$

7 Find the side length of a square that has an inscribed circle with radius 3



a 6	b $\frac{18^2}{2} \pi$	c $\frac{9^2}{2} \pi$
d $\frac{18}{2} \sqrt{2}$	e $(\sqrt{6})^2 \pi$	f 3