

Introduction to Radians

Radians are another way to measure angles, based on the radius of a circle.

One radian is the angle formed when the arc length equals the radius of the circle.

Key facts:

- $180^\circ = \pi$ radians
- $360^\circ = 2\pi$ radians

Radians are commonly used in higher-level math because they simplify formulas.

Example:

$$90^\circ = \pi/2 \text{ radians}$$

Quiz

1. What is a radian?
2. How many radians are in 180° ?
3. Convert 90° to radians.
4. Convert π radians to degrees.
5. True or False: Radians are based on the radius of a circle.

Answer Key

1. An angle measured using the radius of a circle.
2. π radians
3. $\pi/2$ radians
4. 180°
5. True