

# Basic Trig func

## Using Beamer

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BUET

August 13, 2022

# Trigonometric Identities

## Quotient Identities

$$\tan \theta = \frac{\sin \theta}{\cos \theta} \quad \cot \theta = \frac{\cos \theta}{\sin \theta}$$

## Reciprocal Identities

$$\sin \theta = \frac{1}{\csc \theta} \quad \cos \theta = \frac{1}{\sec \theta} \quad \tan \theta = \frac{1}{\cot \theta}$$

## Pythagorean Identities

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Pythagorean identity

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2 if  $\cos \theta = \frac{3}{5}$ , find  $\csc \theta$

## Simplify each expression

$$\frac{\csc \theta}{\cot \theta}$$

$$\cos \theta \csc \theta \tan \theta$$

$$\cos \theta \cot \theta + \sin \theta$$

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# PRACTICE

$\sin$	$\cos$	$\tan$	$\csc$





