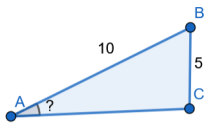
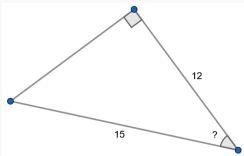
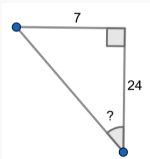


Inverse Trigonometric Functions

INVERSE TRIG NOTES

Definition	Example / notes
Basic trig functions ($\sin \theta$, $\cos \theta$, $\tan \theta$) Input: Output: Used to:	
Inverse / arc trig functions ($\sin^{-1}$, $\cos^{-1}$, $\tan^{-1}$) Input: Output: Used to:	
⚠ Common mistake In algebra: $x^{-1} = 1/x$ (reciprocal) In function notation: $f^{-1}(x)$ means the inverse function — the input that produces a given output So $\sin^{-1}(x)$ means: ‘the angle whose sine is x’ <i>It does NOT mean $1/\sin(x)$. That is called cosecant ($\csc x$) — a different function entirely.</i>	
Inverse of sine Name: Notation:	
Inverse of cosine Name: Notation:	
Inverse of tangent Name: Notation:	
Arctangent and slope	Example: What angle does $y = \frac{2}{3}x + 7$ make with the x-axis?