

- Trigonometric equations and general values

When θ is the principle value and n is any integer

Equation	General Solution
$\sin x = \sin \theta$	$x = n\pi + (-1)^n \theta$
$\cos x = \cos \theta$	$x = 2n\pi \pm \theta$
$\tan x = \tan \theta$	$x = n\pi + \theta$
$\operatorname{cosec} x = \operatorname{cosec} \theta$	$x = n\pi + (-1)^n \theta$
$\sec x = \sec \theta$	$x = 2n\pi \pm \theta$
$\sin^2 x = \sin^2 \theta$	$x = n\pi \pm \theta$
$\cos^2 x = \cos^2 \theta$	$x = n\pi \pm \theta$
$\tan^2 x = \tan^2 \theta$	$x = n\pi \pm \theta$
$\sin x = 0$	$x = n\pi$
$\cos x = 0$	$x = (2n + 1)\frac{\pi}{2}$
$\tan x = 0$	$x = n\pi$