

# Basic tan graphs

$y = a \tan bx$

No amplitude/min/max

Identify the period:  $\frac{\pi}{|b|}$

Vertical Asymptotes: odd multiples of  $\frac{\pi}{2|b|}$  where tangent is undefined

Example 1:  
 $y = \tan x$

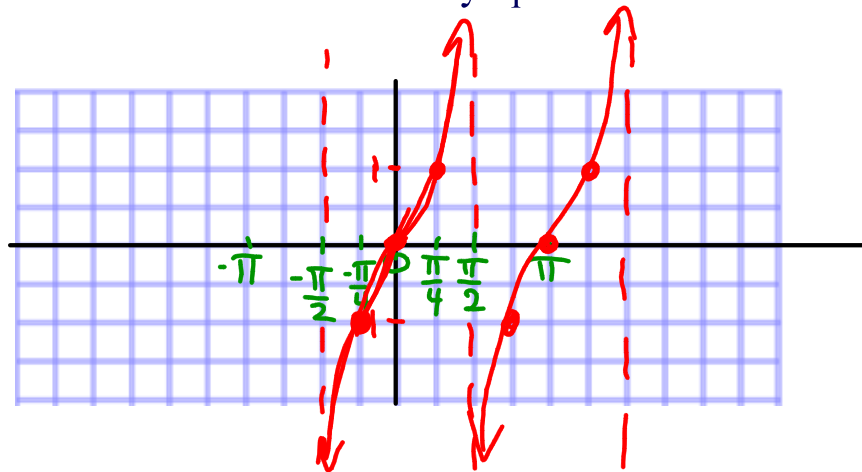
key points: x-intercepts > asymptotes

period =  $\frac{\pi}{b} = \frac{\pi}{1}$

=  $\pi$



4 squares



Example 2:

$y = \tan 2x$

key points: x-intercepts > asymptotes

Period:  $\frac{\pi}{2}$

