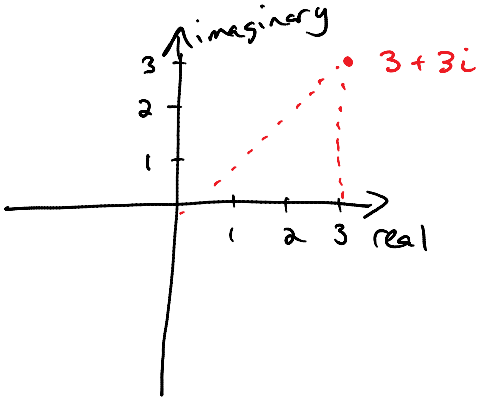
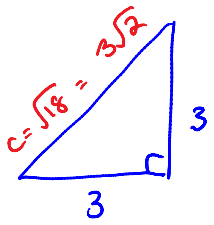
Section 8.3: Complex Numbers in Trig Form

Friday, March 04, 2016
12:06 PM

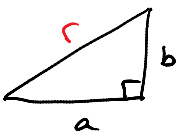
graph the complex number $3+3i$ in the complex plane.



what is the distance from the origin to this point?



in general:



complex number $a+bi$

$r=\sqrt{a^2+b^2}$

from Pythagorus

so, what is the absolute value of a complex number?

→ the distance from the origin

$$|3+3i| = 3\sqrt{2}$$

in general,

$$|a+bi| = \sqrt{a^2+b^2}$$