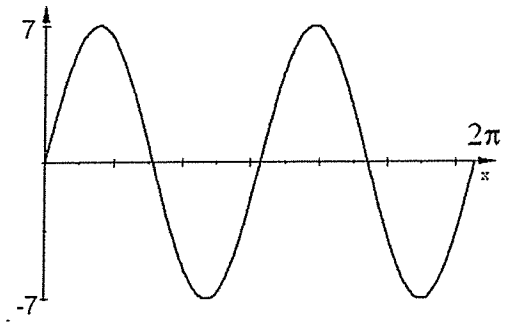
Algebra 2 Bellwork Wednesday, March 11, 2015

For each Sine function below state the Period and Amplitude.

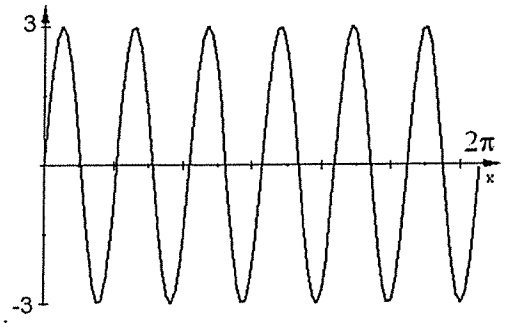
1. $y = 4\text{Sin}3x$

2. $y = -10\text{Sin}\left(\frac{x}{6}\right)$

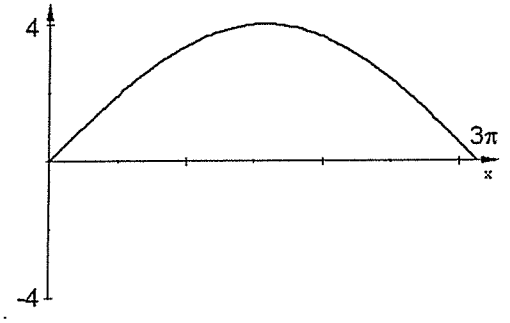
3.



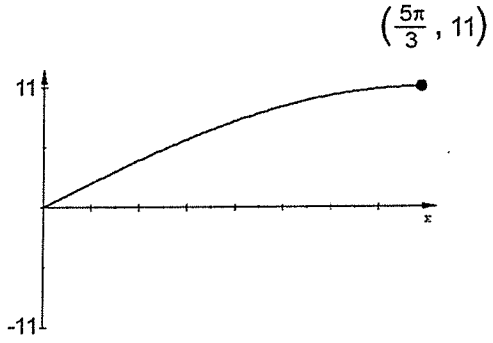
4.



5.

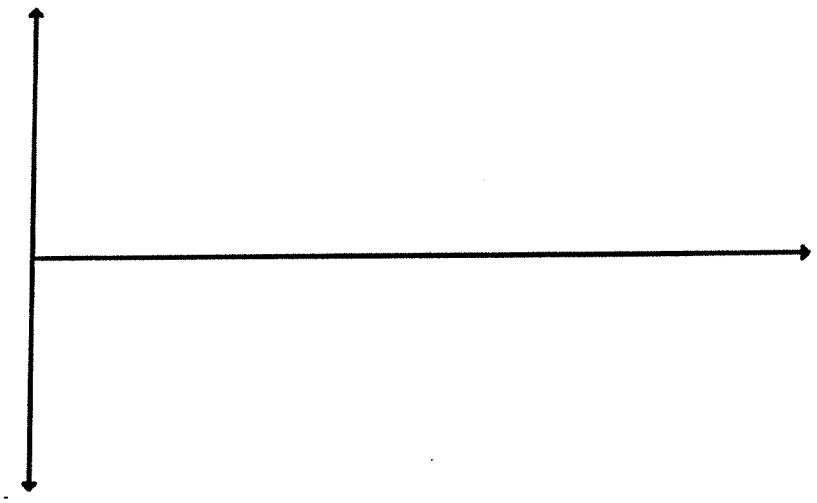


6.



7. Find the period and amplitude of this Sine function then sketch one cycle and label the coordinates of the max's, min's, and x-int.

$y = 6\text{Sin}4x$



Algebra 2 Bellwork Wednesday, March 11, 2015

ANSWERS

Period = $\frac{2\pi}{b}$

For each Sine function below state the Period and Amplitude.

1. $y = 4\text{Sin}3x$

Amplitude = 4

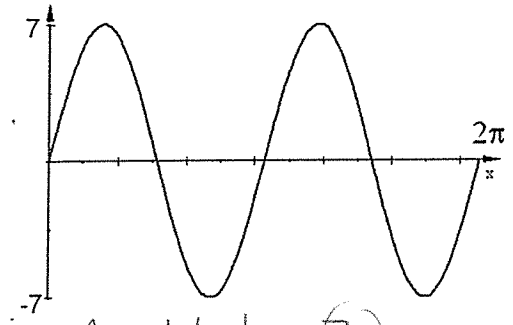
Period = $2\pi/3$

2. $y = -10\text{Sin}\left(\frac{x}{6}\right)$

Amplitude = 10

Period = $\frac{2\pi}{\frac{1}{6}} = 2\pi \cdot 6 = 12\pi$

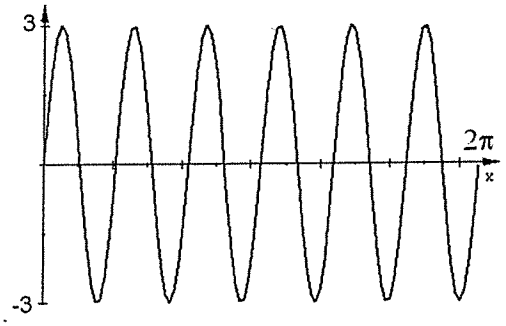
3.



Amplitude = 7

Period = $2\pi/2 = \pi$

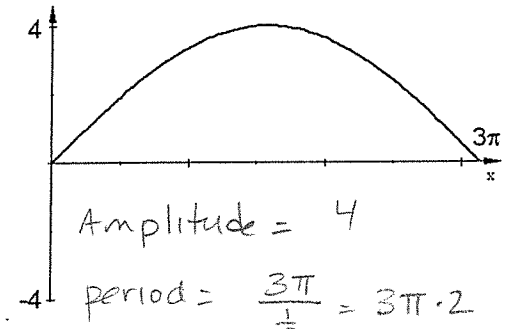
4.



Amplitude = 3

Period = $\frac{2\pi}{6} = \frac{\pi}{3}$

5.

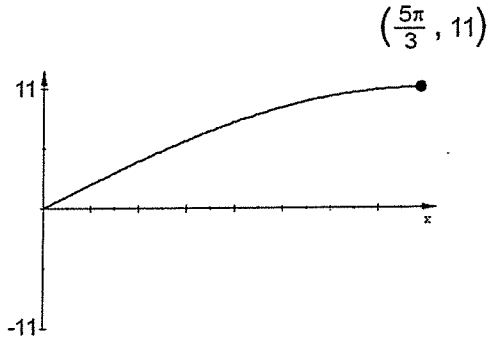


Amplitude = 4

Period = $\frac{3\pi}{\frac{1}{2}} = 3\pi \cdot 2$

$= 6\pi$

6.



Amplitude = 11

Period = $\frac{\frac{5\pi}{3}}{\frac{1}{4}}$

$= \frac{5\pi}{3} \cdot 4$

$= \frac{20\pi}{3}$

7. Find the period and amplitude of this Sine function then sketch one cycle and label the coordinates of the max's, min's, and x-int.

$y = 6\text{Sin}4x$

Amplitude = 6

Period = $\frac{2\pi}{4} = \frac{\pi}{2}$