Name: $\qquad$ Date: $\qquad$ Pd: $\qquad$

1. Given the following triangle. Find $\sin \theta=$


Given $\cot \theta=\frac{1}{2}$, find the following trig ratios:
2. $\cos \theta=$
3. $\csc \theta=$
4. The angle of elevation of the sun is $68^{\circ}$ when a tree casts a shadow 14.3 m long.
A) Draw a diagram that represents the situation.
B) Set up a trig equation to solve for the height of the tree based on the given information.

Find the missing sides of each right Triangle:
5.

6.


Name a positive and negative angle that is co-terminal to the given:

| $7 . \frac{7 \pi}{4}$ | $8 .-200^{\circ}$ |
| :--- | :--- |

What is the reference angle for the following?

| 9. $223^{\circ}$ | $10 .-269^{\circ}$ |
| :--- | :--- |
| $11 . \frac{13 \pi}{3}$ | $12 . \frac{17 \pi}{12}$ |

