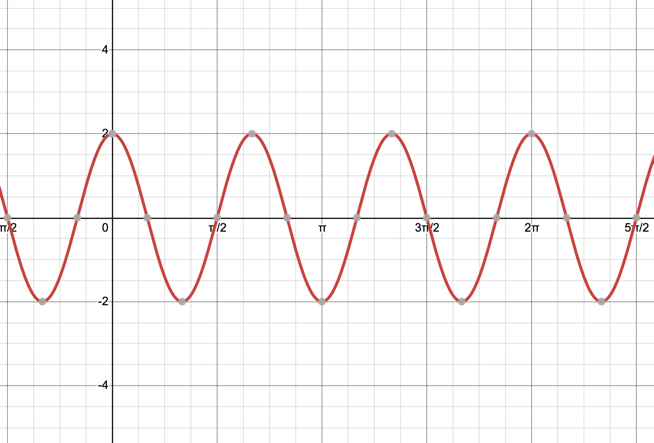
Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Problem Set 3.8**

**1 – 10] Match the graphs with the functions.**

**A**

\_\_\_\_\_\_1.)



\_\_\_\_\_\_2.)

\_\_\_\_\_\_3.)

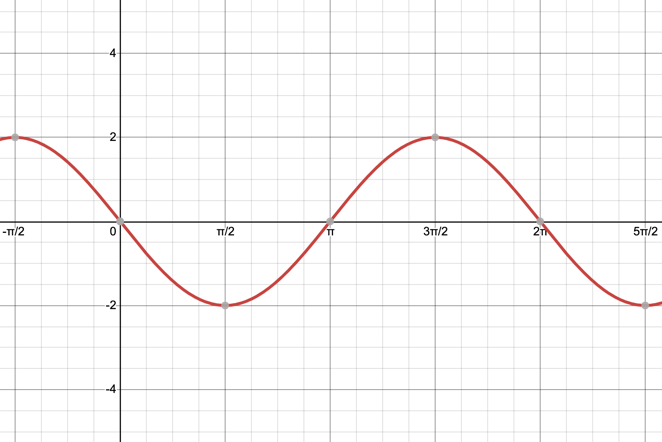
\_\_\_\_\_\_4.)

\_\_\_\_\_\_5.)

\_\_\_\_\_\_6.)

\_\_\_\_\_\_7.)

**B**



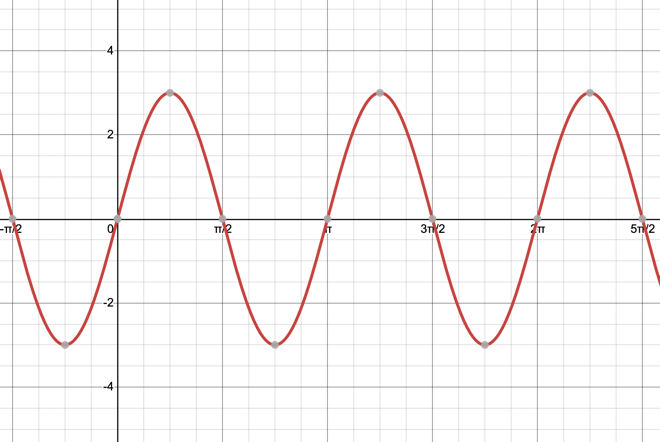
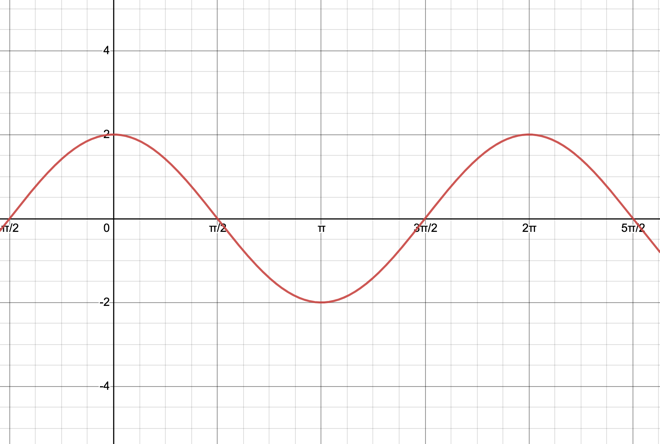
\_\_\_\_\_\_8.)

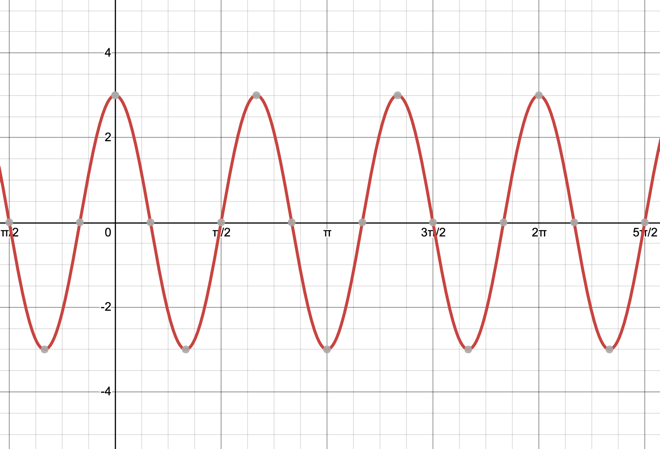
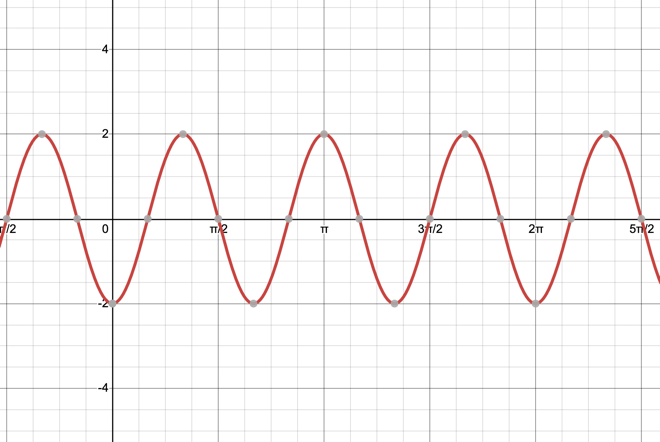
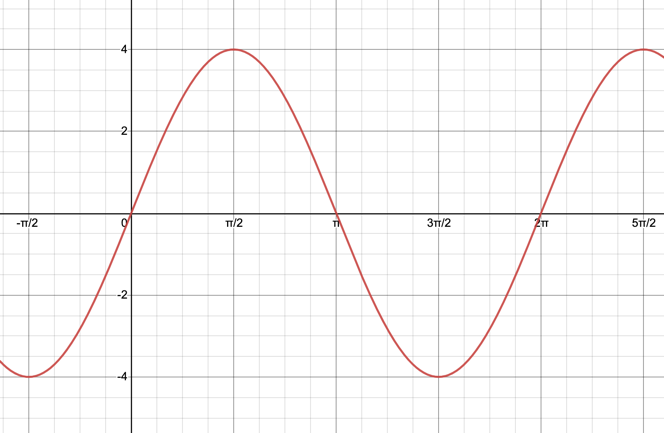
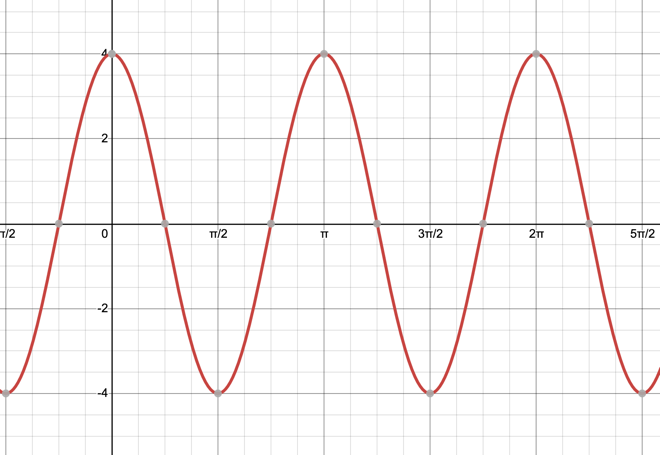
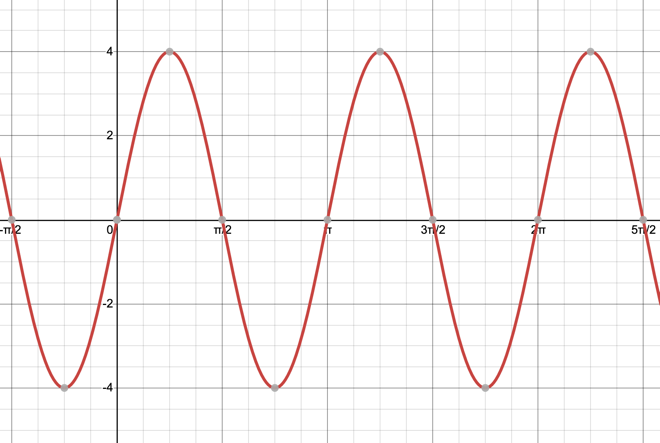
\_\_\_\_\_\_9.)

\_\_\_\_\_\_10.)

**D**

**C**





**J**

**I**

**H**

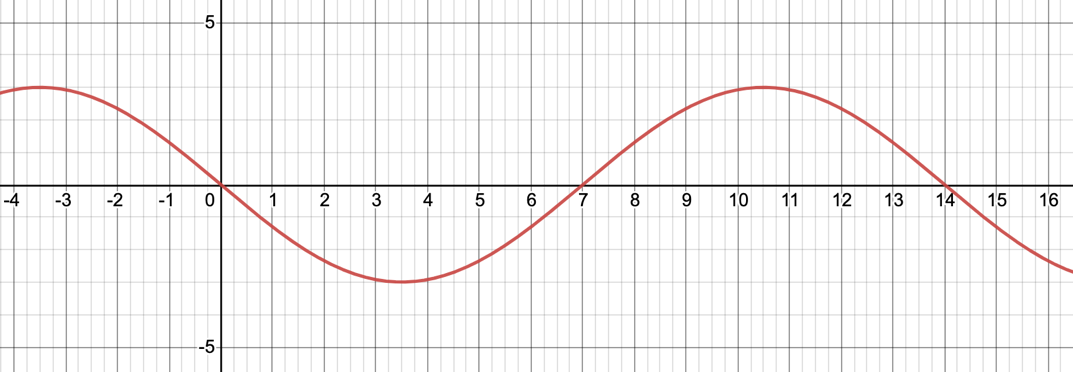
**G**

**F**

**E**

**11.)** What is the amplitude and period of the function

Amplitude: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Period: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**12.)** What is the amplitude and period of the function graphed below? What would be the functions “a” and “b” values?

Amplitude: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Period: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

a: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ b: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**13.)** List the transformations being done to y = sin(x) to produce the graph of f(x). Would is the domain, range, amplitude, and period of f(x)?

Domain:

Range:

Amplitude:

Period:

Transformations:

**14.)** List the transformations being done to y = cos(x) to produce the graph of f(x). Would is the domain, range, amplitude, and period of f(x)?

Domain:

Range:

Amplitude:

Period:

Transformations:

**15.)** List the transformations being done to y = sin(x) to produce the graph of f(x). Would is the domain, range, amplitude, and period of f(x)?

Domain:

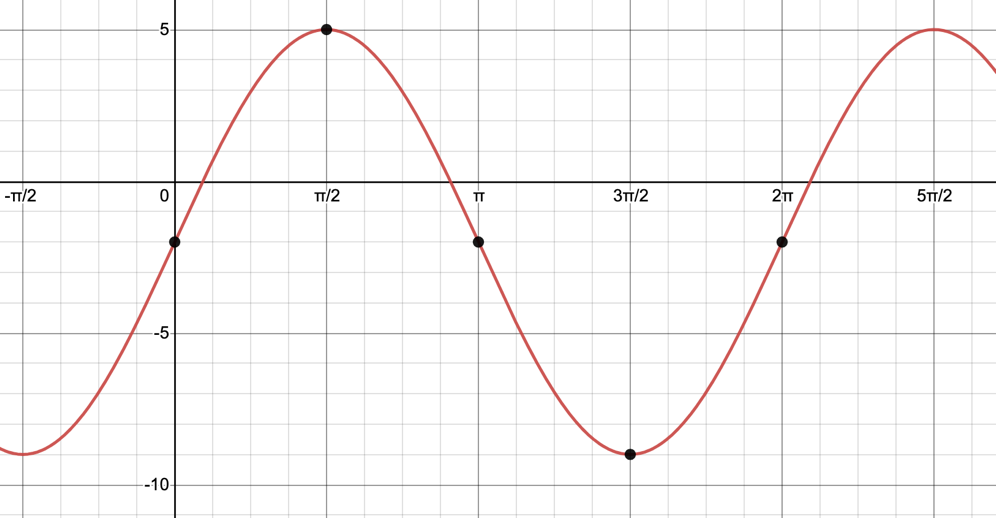
Range:

Amplitude:

Period:

Transformations:

**16.)** The function below is a sine function. Write the equation of the graphed function.



**17.)** Now the function below is a cosine function. Write the equation of the graphed function.

