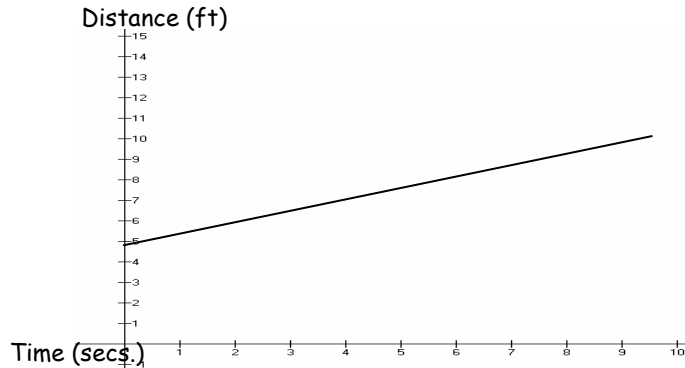


Name _____

Distance Match
Student Pages (Answer key)
 Adapted from Texas Instruments, Inc.

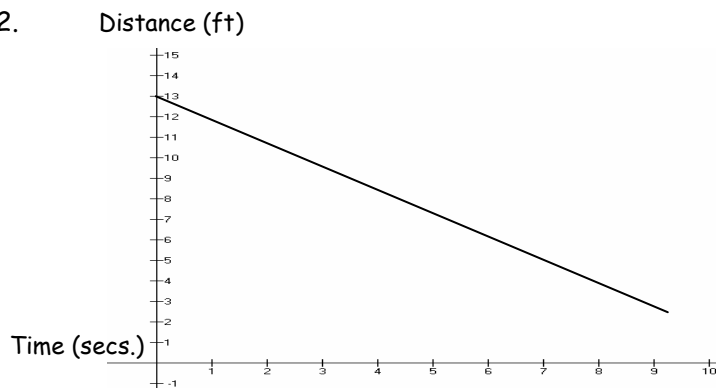
Directions. Examine each graph below, then develop a "walking strategy" that would result in such a graph. Write your strategies next to the graphs. Be sure to be detailed, but concise. Be sure to discuss beginning distance, speed, direction (toward or away from sensor), and changes in speed of the walker.

1.



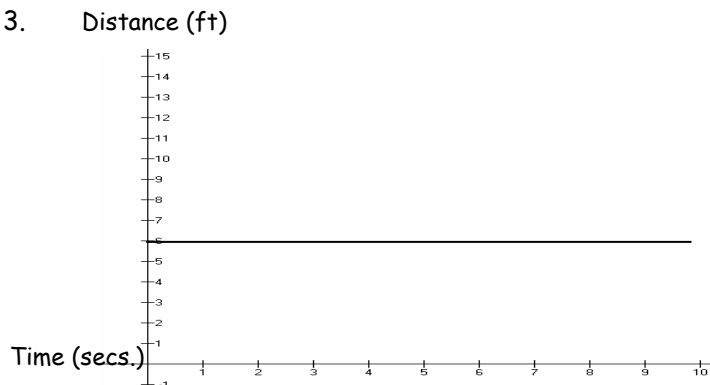
Begin about 5 feet away from the sensor, walk at a slow but steady pace away from the sensor.

2.



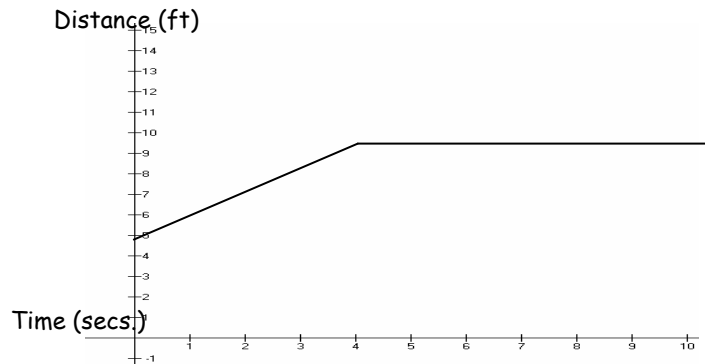
Begin about 13 feet away from the sensor and walk at a moderate but steady pace toward the sensor.

3.



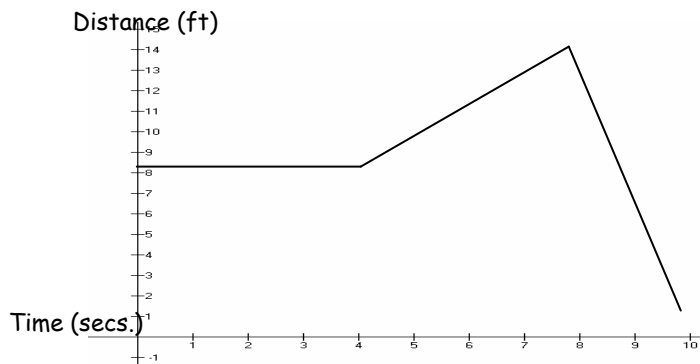
Begin about 6 feet away from the sensor and stand still for 10 seconds.

4.



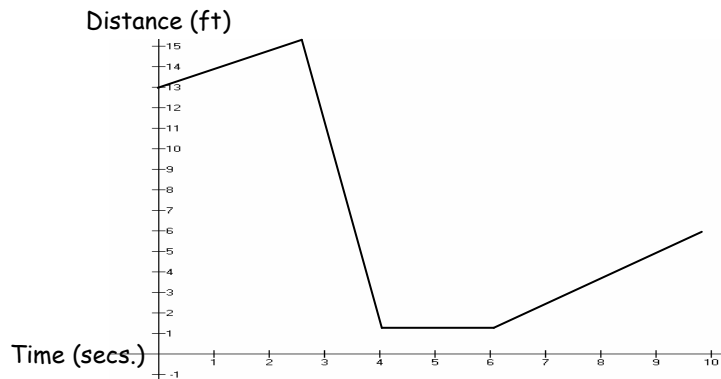
Begin about 5 feet away from the sensor and walk at a moderate but steady pace for 4 seconds, then stop and stand still for the remainder of the experiment.

5.



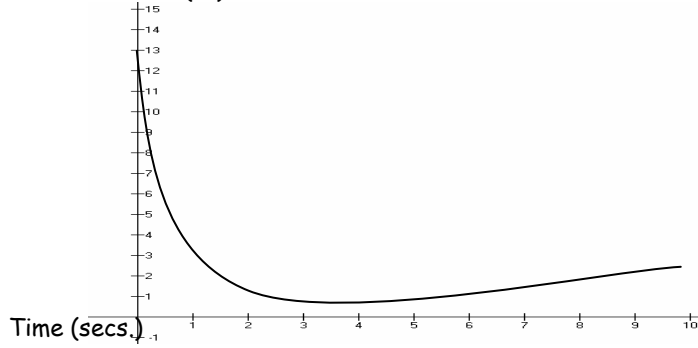
Begin about 8 feet from the sensor and hold position for about 4 seconds, then walk away from the sensor at a moderate but steady pace for 4 more seconds, then turn around and walk quickly back toward the sensor.

6.



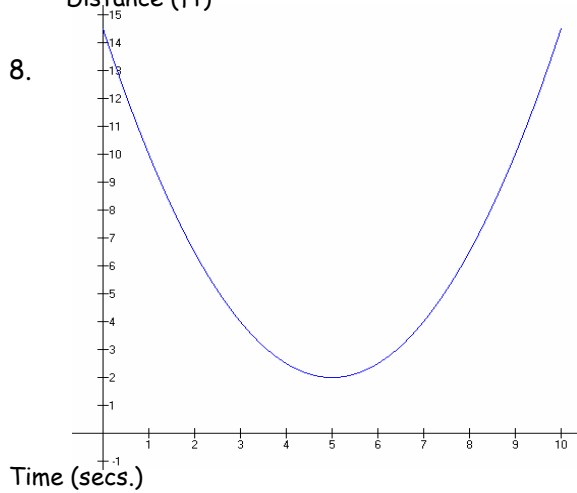
Begin about 13 feet from the sensor, then walk at a slow but steady pace for about 3 seconds, turn around and walk quickly toward the sensor for about 1 second. Stand still for 2 seconds, then walk at a moderate pace away from the sensor for about 4 seconds.

7. Distance (ft)



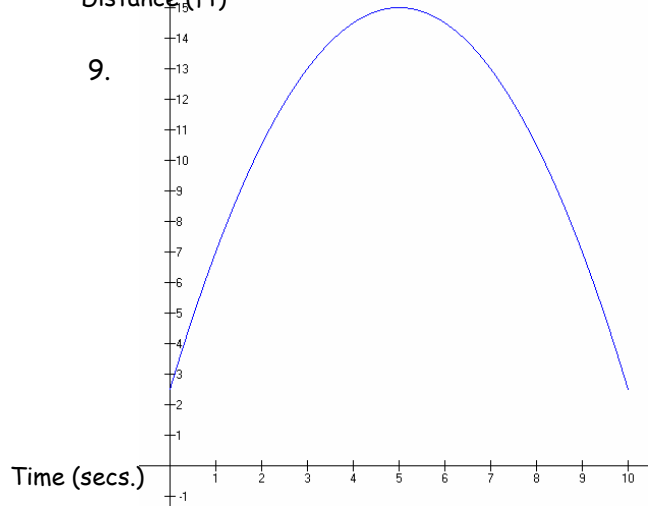
Begin about 13 feet away from the sensor. Start walking toward the sensor at a very fast, but decreasing pace for about 3 seconds. Turn around and walk toward the sensor at a very slow, but gradually increasing pace.

8. Distance (ft)



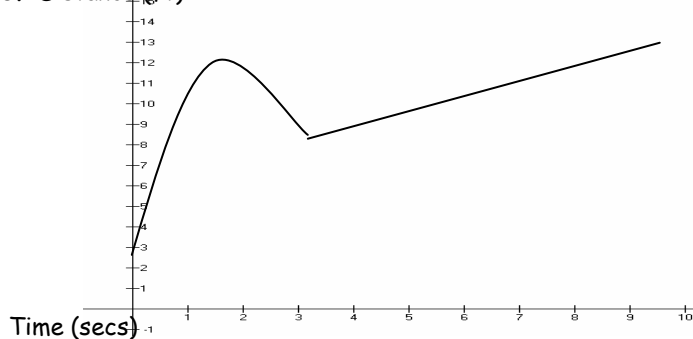
8. Begin about 14 feet away from the sensor. Start walking quickly at a brisk, but slowing pace toward the sensor for about 5 seconds. Turn around and walk away from the sensor at a slow but quickly increasing pace.

9. Distance (ft)



9. Begin about 3 feet away from the sensor. Start walking at a brisk but decreasing pace away from the sensor for 5 seconds, when you slow to a point of reversing direction. Then walk toward the sensor at an increasing pace for the next 5 seconds.

10. Distance (ft)



Start at about 3 feet from the sensor and walk away from the sensor at a quick but decreasing pace for about 2 seconds when you slow to turn. Walk toward the sensor at an increasing pace for another 1.5 seconds. Then walk away from the sensor at a moderate but steady pace for 6.5 seconds.