

Name _____

Date _____

Chapter 1

Define the Vocabulary:

1. Motion-

2. Reference Point-

3. International System of Units-

4. Distance-

5. Speed-

6. Average Speed-

7. Instantaneous Speed-

8. Velocity-

9. Slope-

10. Acceleration-

11. Draw the speed triangle:

Solve the following word problems. Round all answers to the nearest tenth.

12. A boy walks to school at a speed of 4 km/hr. How much time does he take to walk a distance of 20 km?

Formula	
Substitution	
Final Answer with Units	

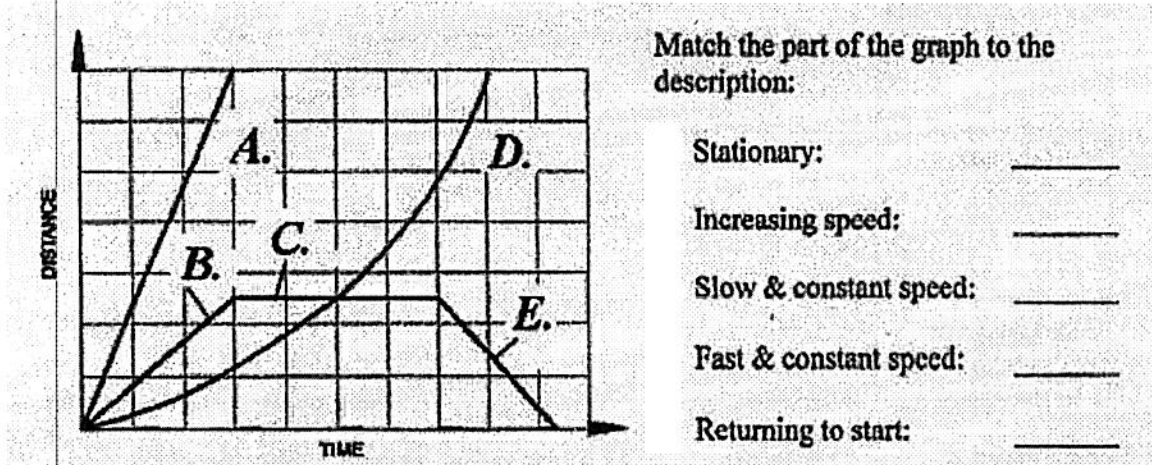
13. A cyclist covers a distance of 15 miles in 2 hours. Calculate his speed.

Formula	
Substitution	
Final Answer with Units	

14. An airplane flies with a constant speed of 540 mi/hr. How far can the plane travel in 3 hours?

Formula	
Substitution	
Final Answer with Units	

15. Match the part of the graph to the description.



Match each description of motion with the corresponding line segment on the graph.

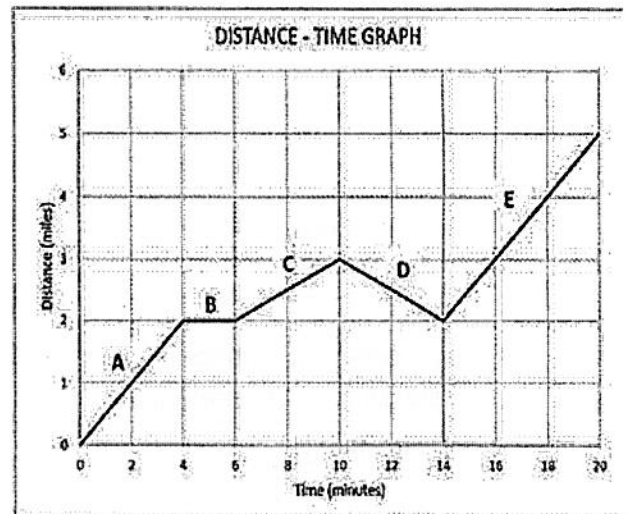
_____ 16. The bus has a detour because of an accident and backtracks 1 mile along a road that is full of potholes. It takes 4 minutes to get to the end of the detour.

_____ 17. The bus begins its routes and travels 2 miles in 4 minutes.

_____ 18. The bus travels 1 mile in 4 minutes.

_____ 19. The bus travels 3 miles in 6 minutes.

_____ 20. The bus waits at one of the stops for a student who is slowly walking to the bus.



21. What is the formula for acceleration?

Calculate Acceleration. Round all answers to the nearest tenth.

22. A ball is rolled at a velocity of 12 m/sec. After 36 seconds, it comes to a stop. What is the acceleration of the ball?

Formula	
Substitution	
Final Answer with Units	

23. A car going 50 mi/hr accelerates to pass a truck. Five seconds later the car is going 80 mi/hr. Calculate the acceleration of the car.

Formula	
Substitution	
Final Answer with Units	

24. A meteoroid changed velocity from 1.0 km/s to 1.8 km/s in 0.03 seconds. What is the acceleration of the meteoroid?

Formula	
Substitution	
Final Answer with Units	