

Runaway Train!

Pre-Activity Worksheet

Instructions: Read the questions and write your answer in the space below or circle the letter for multiple choice questions. Pick only one answer for multiple choice questions.

1. What gets you excited about science or math?

2. If you were given the chance to create a science lesson which method would you use?

- a. lecture;
- b. read textbook;
- c. watch movie;
- d. conduct hands- on activity;
- e. research on the internet

3. Do you think robotics can be helpful when used to collect data in science experiments?

- a. Yes
- b. No
- c. Unsure

4. What is the force that pulls anything with mass toward the earth?

- a. Magnetism
- b. Gravity
- c. Friction

5. Speed is a measurement of how fast an object moves. Velocity is the speed and _____ of an object in motion.

- a. Mass
- b. Direction
- c. Weight

6. Speed is expressed by units of LENGTH (Ex: meters, feet) divided by _____.

- a. TIME (second)
- b. MASS (grams)
- c. LENGTH (meters, feet)

7. As a car rolls down a hill, which of the following is true?

- a. Its potential energy increases and its kinetic energy decreases.
- b. Its potential energy decreases and its kinetic energy increases.
- c. Both its potential energy and kinetic energy increase.
- d. Both its potential energy and kinetic energy decrease.