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

Date:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Circle One: Pre-test / Post-test

**Slippery Soles: A Lesson In Friction**

**Directions:** Choose the correct answer out of the options provided and write it in the space provided.

1. \_\_\_\_\_\_\_\_\_ This scientific phenomenon can be detected because it often emits heat, it is also responsible for preventing a ladder leaning along a wall from sliding out of place.
A) Electricity
B) Viscosity
C) Coefficient
D) Friction
E) Gravity
2. \_\_\_\_\_\_\_\_\_ A measure of how easily something moves against another surface like a shoe slips on ice is...
A) Natural selection
B) The friction coefficient
C) The law of thermodynamics
D) The theory of relativity
3. \_\_\_\_\_\_\_\_\_According to scientists ice is so slippery because...
A) It is a naturally perfectly smooth surface
B) Ice is covered with a microscopic layer of water
C) Ice melts due to the pressure of being stepped on creating a layer of water that causes you to slip
D) of the temperature difference between your shoe or foot and the ice
4. \_\_\_\_\_\_\_\_\_A faster time while measuring how fast your shoe tread design travels down the

ramp translates to a\_\_\_\_\_\_\_\_\_\_\_\_\_ between your shoe and the ice.
A) decrease in friction
B) increase in friction
C) greater surface area
D) smaller surface area

5. \_\_\_\_\_\_\_\_\_An increase in the surface area of a shoe tread \_\_\_\_\_\_ the amount of friction created.
A) reduces
B) increases
C) has no impact on

**Answer Key:**

1) D

2) B

3) B

4) A

5) B