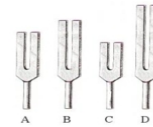


8th Grade Term Test

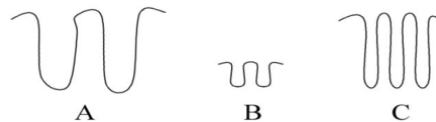
Do not write on this test. Please choose the best answer for each question and completely darken the circle on the answer blank sheet. Be sure to write your name and period number on the answer sheet.

Standard IV: UNDERSTAND THE RELATIONSHIPS AMONG ENERGY, FORCE, AND MOTION

- 1- What is the effect of rubbing sunblock into your skin?
- It blocks out compressional waves from the sun
 - It blocks out ultraviolet waves from the sun
 - It blocks out infrared waves from the sun
 - It blocks out gamma waves from the sun
- 2- Where will a bowling ball have the greatest kinetic energy when travelling down the bowling alley?
- just before it is released from a person's hand
 - just after it is released from a person's hand
 - just before it hits the pins
 - just after it hits the pins
- 3- A bowling ball weighing 10 kg is dropped from 1 meter above the bowling alley. At which point is the potential energy the greatest?
- the potential energy doesn't change
 - 100 cm above the floor
 - 5 cm above the floor
 - 50 cm above the floor
- 4- Why can you see fireworks explode before you hear the "BANG?"
- because eyes send signals faster than ears
 - because light waves are longitudinal waves
 - because light waves travel faster than sound
 - because sound waves are transverse waves
- 5- Which of these tuning forks will generate the lowest pitch?
- A
 - B
 - C
 - D



- 6- What would happen if you reduced the frequency of a sound wave?
- the sound would be louder
 - the sound would be softer
 - the sound would be at a higher pitch
 - the sound would be at a lower pitch
- 7- Why does a prism separate white light into the rainbow colors?
- different wavelengths of light are bent different amounts
 - the prism acts differently on waves of different amplitude
 - different speeds of light are affected differently
 - the prism changes the amplitude of each of the wavelengths
- 8- Study the drawings. If these represent three electromagnetic (light) waves, how could you make wave C look more like wave B?
- decrease the amplitude
 - increase the amplitude
 - decrease the frequency
 - increase the frequency



- 9- Which is a result of energy being transferred from the interior of the earth to the surface?
- mountain building
 - geysers
 - volcanoes
 - all of these