The Energy of Waves Test Review – Test on _____

Answer the following questions and make a note card to use on the final test.

1. Why do sound waves travel around corners better than light waves do?

2. What is a longitudinal wave?

3. What is wavelength a measure of?

4. A disturbance that sends energy through matter or empty space is called what?

5. When two objects naturally move back and forth at the same frequency, and one causes the other to vibrate, it is called what?

6. What is a crest?

7. What is the wave equation?

8. The frequency of a wave is measured using what unit?

9. What is the amplitude of a wave related to?

10. What is a transverse wave?

11. What is constructive interference?

12. What is a reflected sound wave called?

13. What happens to a wave when it is refracted?

14. What is a medium?

15. What are resonant frequencies?

16. Certain parts of the wave are always in the rest position in a what?

17. What is interference?

18. Which of the following wave types must have a medium?
Ocean wave, Microwave, Visible light, X-ray

19. What is destructive interference?

20. Draw a transverse wave and label a crest, a trough, the amplitude and a wavelength.

21. Draw a longitudinal wave and label a compression and a rarefaction.

22. What type of wave is a sound wave?

23. Does sound travel faster through air or water?

24. As a wavelength is shortened, what happens to its frequency?

25. Do you hear thunder sooner if the temperature is warmer or colder?

26. If something with a siren is moving towards you, will the siren sound higher, lower, louder or softer?

27. What does sound travel fastest through?

28. If two sounds waves interfere constructively, what happens to the sound?

29. What does the motion of either the listener or the source of the sound cause?

30. Can sound be made in a vacuum?

31. A measure of how high or low a sound is perceived to be depending on the frequency of a sound wave is called what?

32. The pitch of sound becomes higher as the frequency of the sound wave becomes what?

33. Vibrations of the tuning forks have _____ that does work on water.

34. The energy from one vibrating tuning fork can be passed by _____ through the air to cause another tuning fork to vibrate.

35. The energy from each vibrating tuning fork can travel through the air as _____ that can interfere with each other.

36. The vibrations from a tuning fork travel through the air to your ears, and the amount of _____ being carried by the vibration determines what is heard (higher pitch = higher frequency = higher energy).