Name:	Date:	Class	:

## **Uses of Ultrasound Technology Quiz Answer Key**

- 1. Which group correctly lists the categories of sounds based on frequency?
- a. Loud, soft, whisper
- b. Infrasound, people, ultrasound
- c. Infrasound, audible, ultrasound
- d. None
- 2. Describe how sound travels through different mediums.

Sound travels faster through liquids than gases. Sound travels fastest in solids. Sound moves through water at 1,484 m/s and sound travels through air at 343 m/s. Sound moves more than 4 times as fast through water as air.

3. Give at least 2 ways ultrasound technology can be used to help us in everyday life.

**Ultrasounds for medical scans** 

SONAR

Echolocation Invisible fences Finding cracks or breaks Location of items, almost like GPS

4. What have you learned about how to measure distances with sound? Sounds are sent out through vibrations. The vibrations can be created by a transducer. Sounds travel through a medium, contacts an object and the vibrations are reflected to a receiver. The time it takes for the vibrations to be sent out and received is measured. Knowing how fast sound travels through the medium helps know the distance.

Key words to look for are highlighted.