

1. **Answer:** C

Explanation: Sclerenchyma cells have thickened secondary walls usually strengthened with lignin, an important chemical component of wood

2. **Answer:** C

Explanation: Food-conducting cells are known as sieve-tube elements. Unlike water-conducting cells, sieve tube elements remain alive at maturity but lose most of their organelles. This reduction in cell content allows them to facilitate the transport of nutrients.

3. **Answer:** A

Explanation: Sclerenchyma cells can be in the form of sclereids which are shorter than fiber cells but have thick, irregular, and very hard cell walls. Sclereids impart the hardness to nutshells and seed coats and the gritty texture we feel when touching a pear.

4. **Answer:** B

Explanation: Parenchyma cells perform most [metabolic functions of the plant](#). They can also divide into other types of plant cells under certain conditions.

5. **Answer:** D

Explanation: In addition to features shared with other eukaryotic cells, most plant cells have three unique structures: the chloroplast, a large central vacuole for maintaining the cell's firmness, and a protective cell wall.