

Name _____ Date _____

Cell Structure and Function

Read the passage below and answer the questions that follow!

The discovery of cells was made possible by the development of the microscope in the 17th century. In 1665, the English scientist Robert Hooke used a microscope to examine a thin slice of cork. Hooke described it as consisting of "a great many little boxes." These "little boxes" reminded him of the cubicles or "cells" in which monks lived, so he called them cells.

What Hooke had observed were actually the remains of dead plant cells. The first person to observe living cells was a Dutch trader, Anton van Leeuwenhoek. Although van Leeuwenhoek's microscope was rather simple, in 1673 it was powerful enough to enable him to view the world of microscopic organisms which had never before been seen.

About 150 years passed before scientists began to organize the observations begun by Hooke and van Leeuwenhoek into a unified theory known as the cell theory. This theory has three parts:

- (1) All living things are composed of one or more cells.
- (2) Cells are the basic units of structure and function in an organism.
- (3) Cells come only from the reproduction of existing cells.

1. What caused scientists to discover the existence of cells?

2. What are the small rooms that monks lived in called?

3. What did Hooke observe in the cork slice?

4. What discovery is van Leeuwenhoek noted for?

5. What are the three parts of the cell theory?
