Virus Discovery

The goal of this activity is to learn more about viruses, their shapes, their functions, and their reproduction, and to compare this to cells.

Task I: Review the typical cell, and then answer the questions that follow.

What is the job of each of the following major components of the cell?

1. Nucleus
2. Mitochondria:
3. Endoplasmic Reticulum
4. Golgi Apparatus:
5. Cell membrane:
6. Ribosomes:
7. Cytoskeleton:

Task II: Learn about the structure of viruses, and then answer the questions/statements below.

1. Explain why viruses are not considered living organisms.
2. What are the main components common to all viruses?
3. Draw and label the main parts of the following viral structures: tobacco mosaic virus, adenovirus, influenza, and bacteriophage T4.

Task III: Draw a graphic organizer to show the similarities and differences between cells and viruses.

Task IV: Research about how viruses reproduce, and then answer the following questions/statements.

1. Describe, in general, how viruses replicate.
2. Describe the lytic cycle of virus reproduction.
3. Describe the lysogenic cycle of virus reproduction.
4. How is viral reproduction different from cellular reproduction?