

## ***MISSION BRIEFING* Vocabulary Terms**

Vocabulary terms that are fundamental in understanding the concepts included in Mission Three are listed below. Teachers should alert the students to the ability to click on the hot-linked words in the game.

**antibiotic** - a drug that kills an infectious agent by inhibiting its growth. Antibiotics are effective against bacteria. Some antibiotics can be used to fight certain protozoa and fungi as well.

**bioterrorism** - the use of biological agents, such as pathogenic organisms or agricultural pests, for terrorist purposes.

**electron microscope** - a microscope that uses a beam of negatively-charged particles (electrons) to produce images of extremely small objects. With certain types of electron microscopes, objects as small as 0.2 nanometers can be seen. One nanometer is one billionth of a meter.

**immunity** - the body's defense mechanism that protects it against infectious agents.

**monkeypox** - a pox disease that presents with symptoms similar to smallpox but with a lower death rate. Although the disease can be spread from person to person, monkeypox is usually acquired by contact with the blood of or through the bite of an infected animal. From 1-10% of people who get monkeypox die from it.

**nemesis** - an extremely difficult opponent that inspires both fear and respect.

**nucleic acid** - a component of DNA which is the genetic material that contains instructions to make all organisms including viruses.

**protein coat** - outer layer of a virus which gives a virus its shape and helps it attach to a cell.

**quarantine** - to restrict the movement of people who may have been exposed to a contagious disease in order to prevent them from spreading it.

**smallpox** - an infectious disease caused by the smallpox virus whose symptoms include a rash of blisters (pocks) on the body. Smallpox is contagious and can easily spread directly from person to person or through the air. With the discovery of the smallpox vaccine, this disease was eliminated in the 20<sup>th</sup> century.

**virus** - a very small pathogen consisting of nucleic acid covered by a protein coat. A virus can only reproduce within a living cell.

**vaccine** - a substance made out of dead or weakened viruses or bacteria used to prevent a specific disease by producing an immune response in the body.