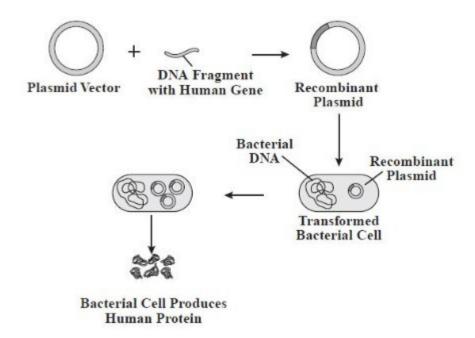
SC.912.L.16.3 – DNA Replication – Example 1 Answer

Genes for medically important proteins can be cloned and inserted into bacteria, as shown in the diagram below.



Why can bacteria recognize a human gene and then produce a human protein?

- A. DNA replication in bacteria and humans is the same.
- B. Bacterial cells contain the same organelles as human cells.
- C. The basic components of DNA are the same in humans and bacteria.
- D. Bacterial cells and human cells contain the same kind of chromosomes.

<u>Answer</u>

C. The basic components of DNA are the same in humans and bacteria.

Actually, the basic components of DNA are the same in ALL living things.