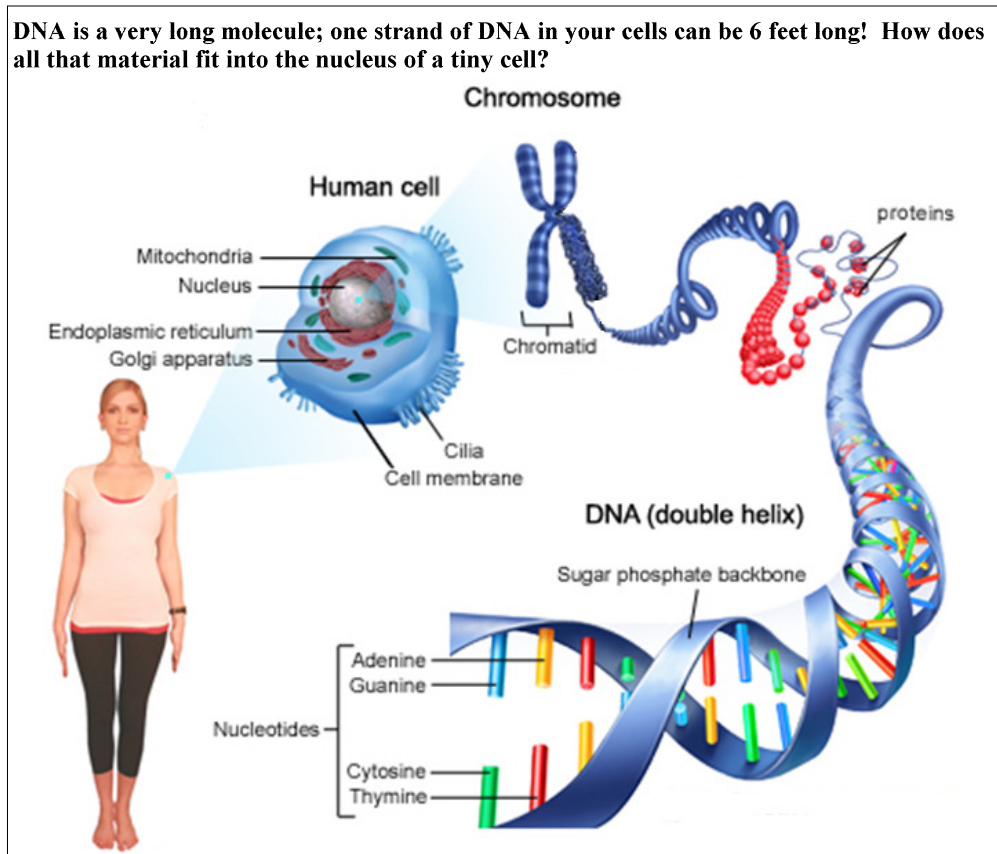


**Standard:** Students will analyze how biological traits are passed on to successive generations.

**Element:** Explain the role of DNA in storing and transmitting cellular information.

**EQ:** How does a chromosome store cellular information?



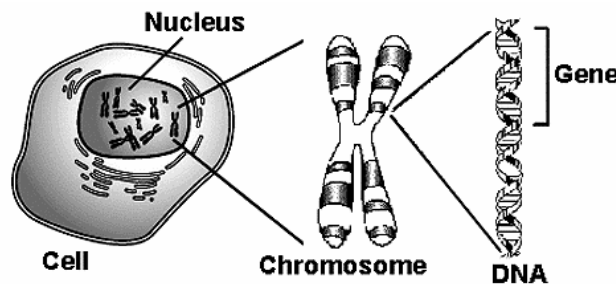
1) The DNA first wraps itself around **proteins**.

2) These strands twist together even further to form a **chromosome**.

3) The two halves of a chromosome are called **chromatids** and are *identical* to each other.

Video Clip "The DNA Molecule and Chromosomes"

Chromosomes are important in transmitting cellular information because they contain all the **genes** necessary for an organism to function.



**Definition for gene:**  
piece of DNA that has information for one trait