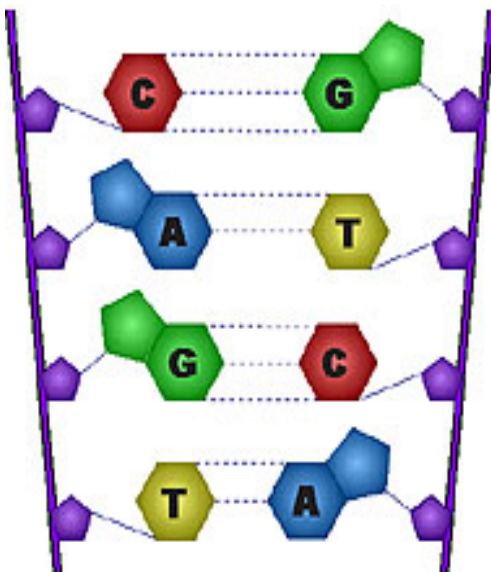


DNA: The Code of Life

- deoxyribonucleic acid
- contained in the chromosomes
- humans have 46, dogs-78, mice-40, some bacteria-only one
- DNA gives the cells specific instructions to create proteins for the organism they belong to



- DNA is made up of 4 nitrogen bases
- Guanine (G), adenine(A), thymine(T), cytosine(C)



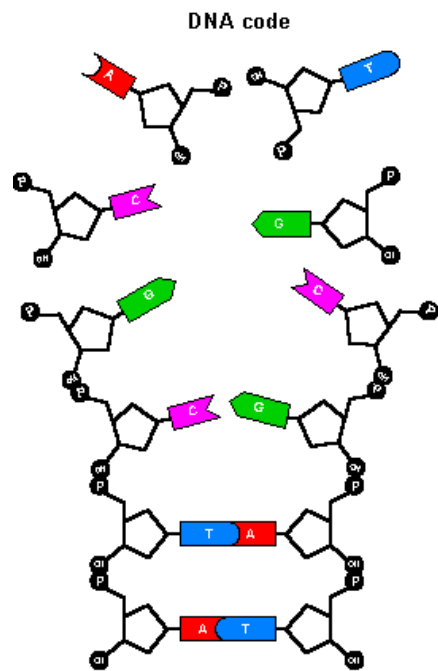
-these bases are arranged in 3 letter "words" which together form the gene "stories"

NOTE: only certain bases will pair with others
adenine ALWAYS pairs with thymine
cytosine ALWAYS pairs with guanine

DNA Replication

-DNA can make a copy of it itself BECAUSE of the way the bases pair up

- 1) the DNA strand will 'unzip' as the chemical bonds are broken between each of the nitrogen bases
- 2) 'loose' nitrogen bases of the correct type will adhere to the free one
- 3) the ends of the newly attached nitrogen bases come together and the molecule is now a perfect copy of the DNA strand it originated from



Using only the following three letter words, try to make a few sentences that 'make sense' in English. You do NOT need to use ALL the words and words CAN be used more than once if you wish.

ate bro wag Syd dog
eat ran cat Bob man
was rat Dad fit who
sat the eye