

## Chapter 12 – DNA Structure and Replication Worksheet

1. What does the acronym DNA stands for?
2. What influences how an organism develops?
3. DNA expresses our traits. What does DNA make?
4. What are enzymes and what do they do in the process of DNA expression?
5. Explain the structure of a chromosome and how histones serve to help store DNA.

### Structure of DNA

1. Draw several nucleotides- include the sugar, phosphate group and nitrogenous base. In the box on the right, list the 4 possibilities for the nitrogenous base and draw their structure. Purine bases have two rings, while pyrimidine bases have only one.

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2. What is the structure of DNA (list each part and how it lines up)?
3. What molecules form the backbone of DNA chain?
4. What is complementary base pairing? What bases always pair with one another?

### The Importance of the Nucleotide Sequence