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|  | **DNA** | **RNA** |
| 1. Unit | Uses deoxyribose and Thymine | Uses ribose and Uracil |
| 1. Pentose sugar | The pentose sugar lacks a hydroxide on the 2’ carbon | The pentose sugar has a hydroxide on the 2’ carbon |
| 1. Nitrogen bases | A, T, G, C | A, U, G, C |
| 1. Form of helix | Double-helix, double stranded | Single-stranded, helix |
| 1. Location | Nucleus | mRNA is created in the nucleus and exits the nucleus through nuclear pores rRNA + tRNA just hang out |
| 1. Amount | DNA | rRNA = 200 – 300 nucleotides mRNA = 1200 nucleotides needed for protein, but 8000 anyway (introns/extrons)  tRNA = 80 nucleotides |
| 1. Chemical Stability | DNA is more stable than RNA | RNA is less stable than DNA since uracil is less stable than thymine |
| 1. Basic Types | DNA | rRNA (ribosomal RNA), mRNA (messenger RNA), tRNA (transfer RNA) |