

### **Biology Topics & Resources**

July 2020



## **Topics to Discuss**

- → Biochemistry
- → Cell Biology
- → Genetics
- → Plant Biology
- → Animal Biology
- → Evolution and Ecology

#### **Biochemistry**

- → Basic chemistry
- → Bonding/IMFs
- → Behavior of water
- **→** pH
- → Organic compounds
- → Macromolecules
- → Energy
- → Enzymes

#### **Cell Biology**

- → Cellular Structure
- → Transport
- → Cell Junctions
- → Cell Cycle
- → Mitosis
- → Meiosis
- → Cellular Respiration

#### Heredity

- → Mendelian genetics
- → Sex-linkage
- → Pedigrees
- → Central Dogma
- → DNA structure and replication
- → Gene structure and regulation
- → Mutations
- → Genetic Engineering

#### **Plant Biology**

- → Classification,
- → Evolution
- → Anatomy
- → Physiology
- → Reproduction
- → Photosynthesis
- → C3/C4/CAM plants

#### **Animal Biology**

- → Physiology
- → Reproduction
- → Development
- → Human organ systems
- → Human Immune System
- → Animal Behavior

# Evolution and Ecology

- → Lamarck
- → Darwin and natural selection
- → Hardy-Weinberg
- → Taxonomy
- → Populations
- → Population interactions
- → Food chain
- → Ecological succession
- → Biomes
- → Chemical cycles