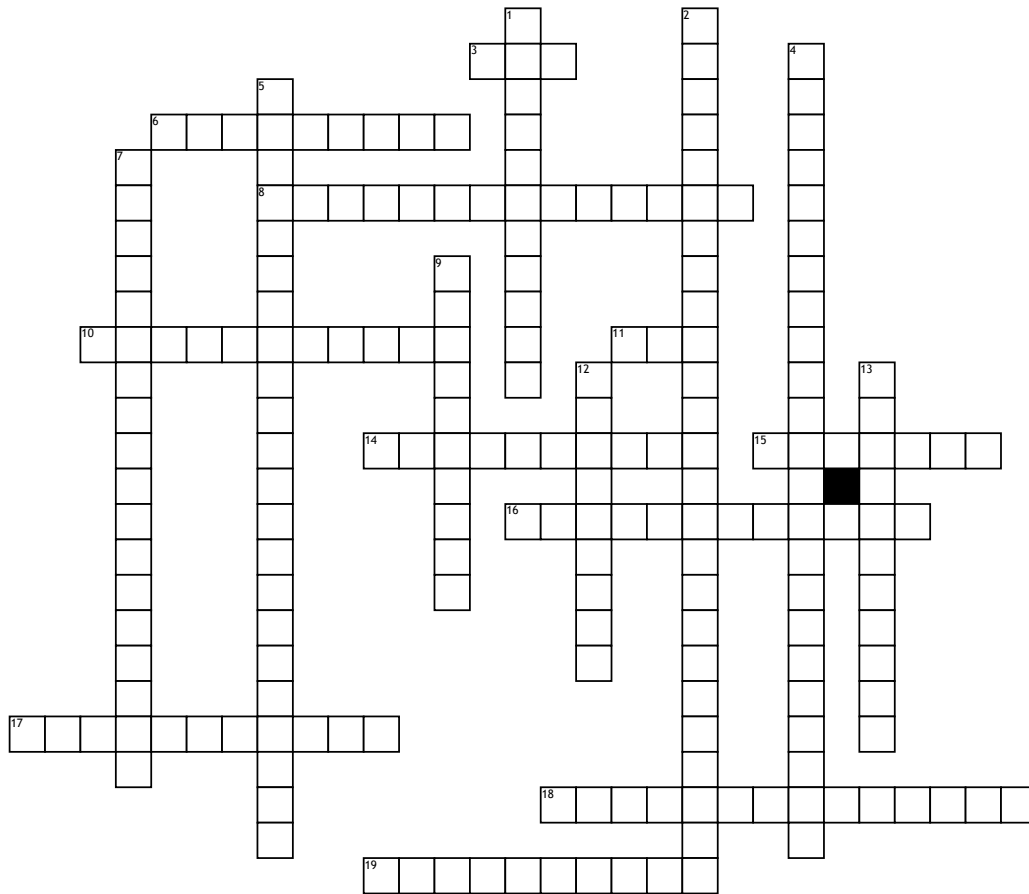


# Biology Vocabulary Words



**Across**

3. Adenosine triphosphate, an organic molecule that acts as the main energy source for cell processes composed of a nitrogenous base, a sugar, and three phosphate groups

6. A membrane system found within chloroplasts that contains the components for photosynthesis

8. Process by which ATP is synthesized by using chemicals as an energy source instead of light

10. A biochemical pathway of photosynthesis in which carbon dioxide is converted into glucose using ATP

11. Low-energy molecule that can be converted to ATP

14. Product of fermentation in many types of cells, including human muscle cells

15. Process that requires oxygen to occur

16. The breakdown of carbohydrates by enzymes, bacteria, yeasts or mold in the absence of oxygen

17. A green pigment that is present in most plant and algae cells and some bacteria that gives plants their characteristic green color, and that absorbs light to provide energy for photosynthesis

18. The process by which plants, algae, and some bacteria use sunlight, carbon dioxide, and water to produce carbohydrates and oxygen

19. The anaerobic breakdown of glucose into pyruvic acid, which makes a small amount of energy available to cells in the form of ATP

**Down**

1. Enzyme that catalyzes that reactions that adds a high-energy phosphate group to ADP to form ATP

2. Part of photosynthesis that uses energy absorbed during the light-dependent reactions to synthesize carbohydrates

4. Part of photosynthesis that absorbs energy from sunlight and transfers energy to the light-independent reactions

5. A series of molecules, found in the inner membranes of mitochondria and chloroplasts, through which electrons pass in a process that cause protons to build up on one side of the membrane

7. The process by which cells produce energy from carbohydrates atmospheric oxygen combines with

9. A series of biochemical reactions that convert pyruvic acid into carbon dioxide and water it is the major pathway of oxidation in animal, bacterial, and plant cells, and it releases energy

12. Describes a process that does not require oxygen

13. Series of light-absorbing pigments and proteins that capture and transfer energy in the thylakoid membrane

**Word Bank**

- |                             |                           |                          |                      |
|-----------------------------|---------------------------|--------------------------|----------------------|
| Photosynthesis              | ATP                       | Calvin Cycle             | Chemosynthesis       |
| Light-Independent reactions | Light-dependent reactions | Glycolysis               | Cellular respiration |
| Anaerobic                   | Lactic acid               | Fermentation             | Krebs cycle          |
| Aerobic                     | ATP synthase              | Photosystem              | ADP                  |
| Chlorophyll                 | Thylakoid                 | Electron transport chain |                      |