### Chlorophyll

Site of photosynthesis which is a process in which energy from sunlight is used to convert carbon dioxide and water into food (glucose).

### Vacuole

Vacuoles are storage bubbles within a cell which contain water, nutrients, or waste products. May gain or lose water depending on water availability

## Chloroplasts

Energy producing organelles that are found in <u>all</u> plant cells and some bacteria

They contain Chlorophyll which is a green pigment which gives plants their color

# **Plant Cells**

# Plant vs. Animals Cells

**Animal Cells** 

### Cell Wall

A tough, rigid outer covering that protects and provide shape

Found in plants, algae, fungi, and most bacteria

# Similarities between plant and animal cells

Both plant and animal cells have many similar organelles and cellular substructures such as the following:

- Nucleus
- Cell Membrane
- Mitochondria
- Cytoplasm
- Smooth and Rough ER
- Golgi Apparatus
- Ribosomes

Both cell types share similar function and cellular processes in order to provide energy and maintain the health of the organism.

## Differences between plant and animal cells

Plant cells have a much larger central vacuole than animal cells, and have a cell wall in addition to the cell membrane. They also contain a special organelle called a chloroplast that produces energy for the cell.