

# Notes: Cellular Physiology – Membrane Transport

Requires \_\_\_\_\_

## Active Transport

### Solute Pumping

- \_\_\_\_\_ that cannot go through the \_\_\_\_\_ use solute pumps  
- Adenosine Triphosphate (ATP) provides the \_\_\_\_\_  
- Solutes move from \_\_\_\_\_, or \_\_\_\_\_

## Bulk Transport

### Exocytosis

- Moves materials \_\_\_\_\_
- Material is carried in a \_\_\_\_\_
- Vacuole migrates to \_\_\_\_\_
- Vacuole \_\_\_\_\_ with cell membrane
- Material is emptied to the \_\_\_\_\_

### Endocytosis

Process of \_\_\_\_\_ by means of infoldings, or \_\_\_\_\_ of the cell membrane

### Phagocytosis

\_\_\_\_\_ brings in large particles within a food vacuole

### Pinocytosis

\_\_\_\_\_ cells taking up liquid form the surrounding environment

# Notes: Cellular Physiology - Membrane Transport

Passive Transport Does not require \_\_\_\_\_

## Simple Diffusion

- Particles tend to \_\_\_\_\_ within a solution
- Movement is from \_\_\_\_\_ or down a \_\_\_\_\_

## Facilitated Diffusion

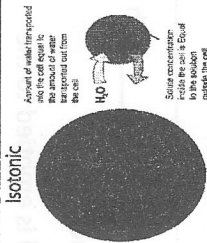
Allows \_\_\_\_\_ substances (i.e. glucose) to pass through using a \_\_\_\_\_ from \_\_\_\_\_

## Osmosis

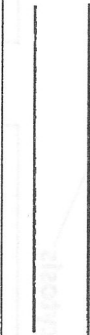
simple diffusion of \_\_\_\_\_

## Solution

Isotonic:

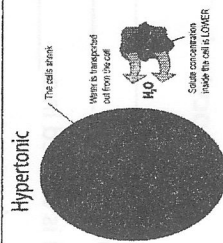


Water moves \_\_\_\_\_

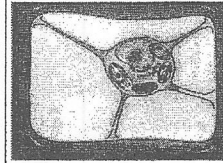


Plant Cell

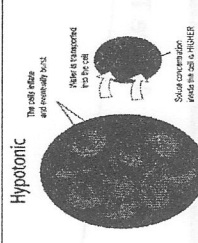
Hypertonic:



Water leaves the cell and it loses \_\_\_\_\_ and causes the cell to \_\_\_\_\_ (shrink)



Hypotonic:



Water enters the cell and pushes against the cell wall increasing the \_\_\_\_\_ causing the cell to \_\_\_\_\_

