15.9: XV Glossary

**Active transport:** Movement of solutes and ions across a cell membrane against a concentration gradient from an area of lower concentration to an area of higher concentration using energy during the process.

**Chvostek’s sign:** An assessment sign of acute hypocalcemia characterized by involuntary facial muscle twitching when the facial nerve is tapped.

**Diffusion:** The movement of solute particles from an area of higher concentration to an area of lower concentration.

**Edema:** Swelling caused by excessive interstitial fluid retention.

**Extracellular fluids (ECF):** Fluids found outside cells in the intravascular or interstitial spaces.

**Filtration:** Movement of fluids through a permeable membrane utilizing hydrostatic pressure.

**Hydrostatic pressure:** The pressure that a contained fluid exerts on what is confining it.

**Hypercapnia:** Elevated levels of retained carbon dioxide in the body.

**Hypertonic solution:** Intravenous fluids with a higher concentration of dissolved particles than blood plasma.

**Hypervolemia:** Excess intravascular fluid. Used interchangeably with “excessive fluid volume.”

**Hypotonic solution:** Intravenous fluids with a lower concentration of dissolved particles than blood plasma.

**Hypovolemia:** Intravascular fluid loss. Used interchangeably with “deficient fluid volume” and “dehydration.”

**Interstitial fluids:** Fluids found between the cells and outside of the vascular system.
Intracellular fluids (ICF): Fluids found inside cells consisting of protein, water, and electrolytes.

Intravascular fluids: Fluids found in the vascular system consisting of the body's arteries, veins, and capillary networks.

Isotonic solution: Intravenous fluids with a similar concentration of dissolved particles as blood plasma.

Oncotic pressure: Pressure inside the vascular compartment created by protein content of the blood (in the form of albumin) that holds water inside the blood vessels.

Osmolality: Proportion of dissolved particles in a specific weight of fluid.

Osmolarity: Proportion of dissolved particles or solutes in a specific volume of fluid.

Osmosis: Movement of fluid through a semipermeable membrane from an area of lesser solute concentration to an area of greater solute concentration.

Passive transport: Movement of fluids or solutes down a concentration gradient where no energy is used during the process.

Renin-Angiotensin-Aldosterone System (RAAS): A body system that regulates extracellular fluids and blood pressure by regulating fluid output and electrolyte excretion.

Trouseau’s sign: A sign associated with hypocalcemia that causes a spasm of the hand when a blood pressure cuff is inflated.

Urine specific gravity: A measurement of hydration status that measures the concentration of particles in urine.