



STRONG START STUDY STRATEGIES

SHARED DISCOVERY
CURRICULUM

Membrane Ion Transport

Instructions: After reviewing the Membrane Ion Transport video, experiment with one or both of the study strategies below. Both are high utility strategies that promote longer-term retention of important concepts.

Who?

When?

Why?

How?

Ask and Answer Questions

When learning new concepts, turn learning objectives or key points into questions and write the answer in your own words in your notes. When applicable, ask Why, What, When, Where and How questions. You can also ask “When or Why is this clinically relevant?” The practice of asking questions, in particular “why” questions, is called “elaborative interrogation.” This study approach helps you to integrate new information with existing prior knowledge. Also, the regular practice of asking yourself questions to assess understanding and coming up with answers in your own words is more effective than merely reading, rereading, or watching videos.

Example: Why are epithelial cells important?

Epithelial cells are specialized cells that come together to form the epithelium or a tissue layer that separates the external environment from the internal environment or inside the body and outside the body. These cells are important because they either allow or disallow passage of contents across organs. These cells are also important for ion transport.

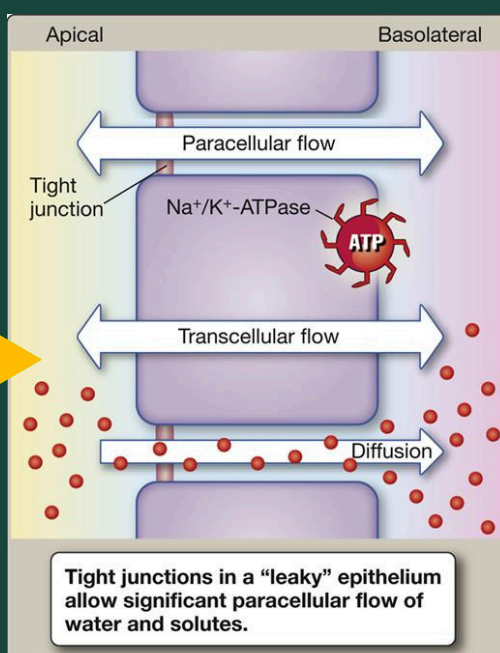


Draw, Diagram, or Label to Dual Code Information

Dual coding is the process of combining text with images such as drawings, diagrams, flowcharts, etc. Creating or integrating images into your study notes can enhance your ability to “dual code” information and promote longer-term retention of important concepts. We can recall images quicker and easier than we can recall written text.

Example:

1. From memory, try to recreate the diagram below.
2. Cover up the labels and fill in the terms. Repeat until you get them all correct.
3. Check your understanding. Can you accurately label and explain the difference between transcellular and paracellular transport?



Tight junctions in a “leaky” epithelium allow significant paracellular flow of water and solutes.

Lippincott Illustrated Reviews: Physiology, 3e, Figure 4.6