



STRONG START STUDY STRATEGIES

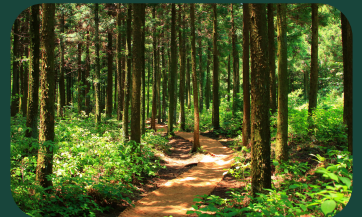
SHARED DISCOVERY
CURRICULUM

Nucleotide Structure and Metabolism

Instructions: After reviewing the Nucleotide Structure and Metabolism video, experiment with the high-utility strategies below to promote retention of important topics.

Learn Biochemical Pathways Hierarchically

Medical school learning requires an emphasis on very specific detailed and integrated content knowledge. When it comes to the numerous and interconnected metabolic pathways, students can lose sight of the forest while getting overwhelmed by the trees and twisty trails.



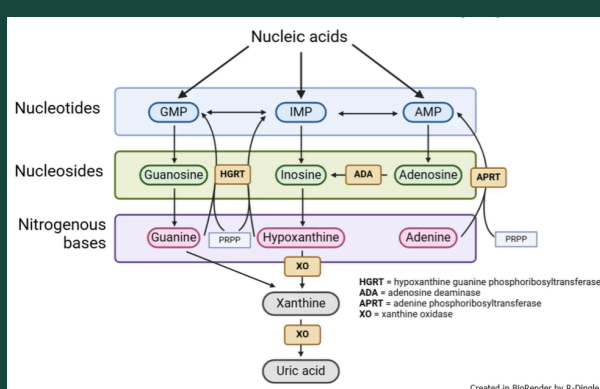
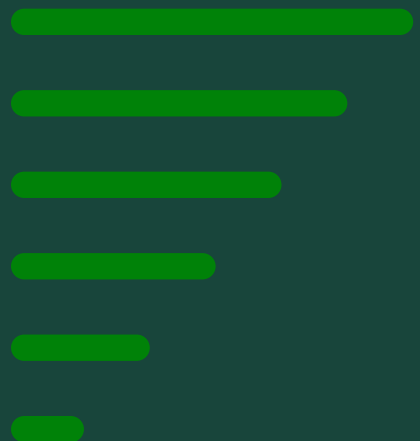
Start with the Big Picture, then add the Details!

Let's Try it!

Learning Objective #4 from the Nucleotide Structure and Metabolism video:
Describe Nucleotide Metabolism and the Major Products

Use the following prompts to articulate in your own words your understanding the conceptual relevance of nucleotide metabolism, the major steps in the pathway and finally, the biomolecular reactants, enzymes and products:

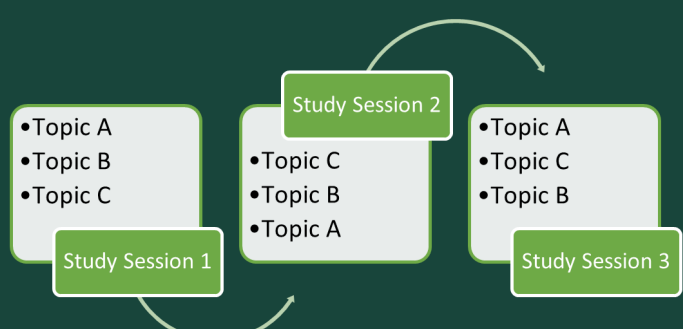
1. How does this pathway integrate with other metabolic pathways? (glycolysis, ___)
2. What is the basic function of the pathway?
3. What are the beginning and end points?
4. What are the major steps? (___, dephosphorylation, ___, ___)
5. What are the details and components of each step?



Connecting the big picture with the details will help enhance your understanding of disease mechanisms, clinical laboratory tests, and drug effects.

“Mix it up” while studying to increase mental agility!

Once you have a clear understanding of the hierarchy and details of complex processes, review the content using **Interleaving (mixing up the order of what you study)** for making new connections, problem solving and strengthening retention.



Interleaving can help you see the links, similarities and differences between ideas that you may miss if you only study topics in the same order.