

Immunology and Virology (Bio 440) #1: Overview of Immunology and Virology

Terms you should know:

obligate intracellular parasite	replication	phagocytosis
genome	assembly (maturation)	NK cell
capsid	release	complement
envelope	naked, enveloped virus	humoral response
viroid	membrane fusion	cell-mediated response
prion	budding	B cell
adsorption (attachment)	cytopathic effects	T cell
receptor	transformation (cancerous)	intracellular pathogen
glycoprotein	innate immunity	extracellular pathogen
entry	adaptive immunity	specificity
uncoating	barrier	memory

Guide questions to help you prepare for lecture:

1. What is a virus? How is it different from a cell? What is its basic structure?
2. What infectious agents are even simpler in structure than viruses?
3. What are the minimal requirements for a virus?
4. How does a virus reproduce? What are the basic steps of its reproductive cycle?
5. How is reproduction different for an enveloped virus than for a naked virus?
6. How do viruses cause disease?
7. What are the two major types of defense that the human body has against disease?
8. What are the mechanisms by which innate immunity protects us from pathogens?
9. What are the main characteristics of the adaptive immune response?
10. What are the two branches of the adaptive immune response?
11. What are the mechanisms by which adaptive immunity protects us from pathogens? How are different types of pathogens dealt with by the adaptive immune response?