PART I: Provide a well-conceived, *one-page* overview of IMMUNODEFICIENCY. (Remember: This effort is meant to be effective preparation for *you* for the final exam.)

## AIDS AND OTHER IMMUNODEFICIENCIES

- I. Primary Immunodeficiencies
  - A. Defects in the Lymphoid Lineage
    - 1. Severe Combined Immunodeficiency (SCID)
    - 2. Wiskott-Aldrich Syndrome (WAS)
    - 3. Interferon-Gamma-Receptor Defect
    - 4. X-Linked Agammaglobulinemia
    - 5. X-Linked Hyper-IgM syndrome
    - 6. Common Variable Immunodeficiency (CVI)
    - 7. Selective Deficiencies of Immunoglobulin Classes
    - 8. Ataxia Telangiectasia
    - 9. Immune Disorders Involving the Thymus
  - B. Defects in the Myeloid Lineage
    - 1. Reduction in Neutorophil Count
    - 2. Chronic Granulomatous Disease (CGD)
    - 3. Chediak-Higashi Syndrome
    - 4. Leukocyte Adhesion Deficiency (LAD)
  - C. Defects in the Complement System
  - D. Treatment of Immunodeficiency
  - E. Animal Models of Primary Immunodeficiency
    - 1. Nude (Athymic) Mice
    - 2. The SCID Mouse
- II. Aids and Other Acquired or Secondary Immunodeficiencies
  - A. The AIDS Epidemic
  - B. Transmission of HIV-1
  - C. HIV-1: The AIDS Virus
  - D. In vitro Studies of the AIDS Virus
  - E. Clinical and Immunologic Consequences of HIV-1 Infection
  - F. Therapeutic Agents to Combat AIDS
  - G. Vaccines to Prevent AIDS

Clearly, the outline is an outline of Chapter 19. I have graded your summary statements and have found generally that your statements exhibited good judgment in selecting what is important. Stated otherwise, your summaries tended to show high accuracy and good balance.

PART II: Provide a well-conceived, one-page overview of AUTOIMMUNITY.

## AUTOIMMUNITY

- I. Organ-Specific Autoimmune Diseases
  - A. Diseases Mediated by Direct Cellular Damage
    - 1. Hashimoto's Thyroiditis
    - 2. Autoimmune Anemias
    - 3. Goodpasture's Syndrome
    - 4. Insulin-Dependent Diabetes Mellitus
  - B. Diseases Mediated by Stimulating or Blocking Auto-Antibodies
    - 1. Grave's Disease
    - 2. Myasthenia Gravis
- II. Systemic Autoimmune Diseases
  - A. Systemic Lupus Erythematosus
  - B. Multiple Sclerosis
  - C. Rheumatoid Arthritis
  - D. Scleroderma
- III. Animal Models for Autoimmune Diseases
  - A. Spontaneous Autoimmunity in Animals
  - B. Experimentally Induced Autoimmunity in Animals
- IV. Evidence Implicating the CD4<sup>+</sup> T Cell, MHC, and TCR in Autoimmunity
  - A. Role of CD4<sup>+</sup> T Cells and  $T_H 1/T_H 2$  Balance
    - B. Association with the MHC
  - C. Association with the T-Cell Receptor
- V. Proposed Mechanisms for the Induction of Autoimmunity
  - A. Release of Sequestered Antigens
  - B. Molecular Mimicry
  - C. Mimicry Between MBP and Viral Peptides
  - D. Inappropriate Expression of Class II MHC Molecules
  - E. Polyclonal B-Cell Activation
- VI. Treatment of Autoimmune Diseases
  - C. Current Therapies
  - D. Experimental Therapeutic Approaches
    - 1. T-Cell Vaccination
    - 2. Peptide Blockade of MHC Molecules
    - 3. Monoclonal-Antibody Treatment
    - 4. Tolerance Induction by Oral Antigen

Clearly, the outline is an outline of Chapter 20. I have graded your summary statements and have found generally that your statements exhibited good judgment in selecting what is important. Stated otherwise, your summaries tended to show high accuracy and good balance.