

## HUMAN ANATOMY AND PHYSIOLOGY-I (HAP-I)

3 hours / week

### THEORY

#### Module - I

Scope of anatomy and physiology and basic terminology used in these subjects.

Structure of cell, its components and their functions.

Elementary tissues of the human body : Epithelial, Connective, Muscular and Nervous tissues, their sub types and characteristics.

#### Module - II

**Osseous System:** Structure, composition and functions of skeleton, classification of joints, types of movements of joints, disorders of joints.

#### Module - III

**Skeletal Muscles:** Gross anatomy and physiology of muscle contraction, physiological properties of skeletal muscles and their disorders.

#### Module - IV

**Haemopoietic System :** Composition and functions of blood and its elements, their disorders, blood groups and their significance, mechanism of coagulation, disorders of platelets and coagulation.

**Lymph and Lymphatic System:** Composition, formation and circulation of lymph; disorders of lymph and lymphatic system. Basic physiology and functions of spleen.

#### Module - V

**Cardiovascular System:** Basic anatomy of the heart, physiology, blood vessels and circulation. Basic understanding of cardiac cycle, heart sounds and electrocardiogram. Brief outline of cardiovascular disorders like hypertension, hypotension, arteriosclerosis, angina, myocardial infarction, congestive cardiac failure and cardiac arrhythmias.