***blood physiology :***

***Session 1:***

**Red Blood Cells, Anemia, and Polycythemia:**

**RED BLOOD CELLS (ERYTHROCYTES)**

**PRODUCTION OF RED BLOOD CELLS**

**Genesis of Blood Cells**

**ANEMIAS**

**POLYCYTHEMIA**

***Session 2:***

**Resistance of the Body to Infection:**

**Leukocytes, Granulocytes, the Monocyte-Macrophage System, and Inflammation**

**LEUKOCYTES (WHITE BLOOD CELLS)**

**NEUTROPHILS AND MACROPHAGES DEFEND AGAINST INFECTIONS**

**MONOCYTE-MACROPHAGE CELL SYSTEM (RETICULOENDOTHELIAL SYSTEM**

**INFLAMMATION: ROLE OF NEUTROPHILS AND MACROPHAGES**

**LEUKOPENIA**

***Session 3:***

***Resistance of the Body to Infection: II. Immunity and Allergy***

**BASIC TYPES OF ACQUIRED IMMUNITY—HUMORAL AND CELL MEDIATED**

**ACQUIRED (ADAPTIVE) IMMUNITY**

*Nature of the Antibodies*

Mechanisms of Action of Antibodies

***Session 4:***

**Blood Types; Transfusion; Tissue and Organ Transplantation**

ANTIGENICITY CAUSES IMMUNE REACTIONS OF BLOOD

O-A-B BLOOD TYPES

Rh BLOOD TYPES

TRANSPLANTATION OF TISSUES AND ORGANS

***Session 5:***

**Hemostasis and Blood Coagulation:**

**HEMOSTASIS EVENTS**

MECHANISM OF BLOOD COAGULATION

CONDITIONS THAT CAUSE EXCESSIVE BLEEDING IN HUMANS

THROMBOEMBOLIC CONDITIONS

ANTICOAGULANTS FOR CLINICAL USE