

Bio-chemistry

BC 316 SEC 2

**SOFT SKILL ENHANCEMENT COURSE (4 CREDITS EACH)**

**Semester 3**

**DIAGNOSTIC LAB TECHNIQUES**

**UNIT I: Biostatistics**

Measures of central value - Mean, median and mode. Statistics of Dispersion- SD and SEM; Coefficient of variation; Simple correlation and regression; Concept of sampling and sampling methods. Tests of statistical significance (chi square test).

**UNIT II: Elementary Knowledge of Clinical Lab Techniques**

Specimen handling, transport, preservation and disposal. Laboratory Safety and Laboratory hazard. Ethics, Chemical composition of Biological fluids: Blood, urine and cerebrospinal fluid. Reference Range. Quality control and Quality assurance. Accuracy and Precision: Factors affecting accuracy of results.

**UNIT III: Organ Functions Tests:**

Liver function test. Kidney function test. Cardiovascular markers-Lipid profile. Hematological Analysis

**UNIT IV: Immunology and Serology.**

Immunodiffusion, Immunoelectrophoresis. Radiimmunoassays. Immunofluorescence assays, Immunoenzyme Assays(ELISA).

