Subject with Subject code	Course Outcomes
1.1 Human Anatomy and Physiology I	CO1: Understanding of describe the structure and function of various organs of the body. CO2: Understand the described various homeostatic mechanisms and their imbalance of varies systems. CO3: Understand to identify the various tissue and organs of the different system of Human Body. CO4: To perform the hematological tests and also record Blood Pressure, Heart rate , Pulse and Respiratory volumes. CO5: Understand the coordinated working pattern of different organ of each system. CO6: Understand the interlinked mechanisms in the maintainance of normal functioning of human body.
1.2 Pharmaceutics	CO1:Explain formulation, evaluation and labelling of aromatic water, glycerides, syrups, elixirs and powder preparations CO2:Perform pharmaceutical calculations to determine evaluation parameters like density, viscosity, specific gravity, angle of repose, Carr's index, Hausner ratio of preparations. CO3:Describe use of ingredients in formulation and category of formulation. CO4:Compare various monophasic preparations depending upon their formulation. CO5:Selection of suitable packaging material (container-closure) for the preparation. CO6:Fundamental knowledge of preparing of various types of powder.

1.3 Medicinal Biochemistry	CO1. To understand the importance of metabolism of substrates. CO 2. Will acquire chemistry and biological importance of biological macromolecules. CO 3. To acquire knowledge in qualitative and quantitative estimation of the biological macromolecules. CO 4. To know the interpretation of data emanating from a Clinical Test Lab. CO 5. To know how physiological conditions influence the structures and reactivity's of biomolecules CO 6. To understand the basic principles of protein and polysaccharide structure.
1.4 Pharmaceutical Organic Chemistry	CO1: To be able to write IUPAC/Common names of simple organic compounds belonging to different classes of organic compounds in organic chemistry. CO2:To achieve understanding of some important physical properties of pharmaceutical organic compounds. CO3: To acquire the knowledge and understanding of the Free radical/ nucleophyllic[alkyl/ acyl/ aryl] /electrophyllic substitution, free radical/ nucleophyllic / electrophyllic addition, elimination, oxidation and reduction reactions with mechanism, orientation of the reaction, along with order of reactivity, stability of compounds etc CO4: To gain through knowledge of some named organic reactions with mechanisms CO5 :Enumerate Some important physical properties of organic compounds CO6: Describe methods of preparation of test for purity, principle involved in the assay, important medicinal uses of some important organic compounds.
1.5 Pharmaceutical Inorganic Chemistry	CO1: To learn the different basic terms used in pharmaceutical inorganic chemistry CO2: To understand the principles and procedures of analysis of drugs and also regarding the application of inorganic pharmaceuticals.

	CO3: To learn the analysis of the inorganic pharmaceuticals their applications. CO4: To learn the different indicators used in inorganic analysis with their theory. CO5: To learn about the limit tests and its significance in inorganic chemistry. CO6: To learn the importance of inorganic pharmaceuticals in preventing andcuring the disease.
1.6 Remedial Mathematics/ Biology	CO 1. Apply mathematical concepts and principles to perform computations for Pharmaceutical Sciences. CO 2. Create, use and analyze mathematical representations and mathematical relationships CO 3. Communicate mathematical knowledge and understanding to help in the field of Clinical Pharmacy CO 4. Perform abstract mathematical reasoning The main aim of this course is to make aware the students to understand and learn about CO 1. Cell biology (Basic Nature of Plant cell and Animal cell) CO 2. Classification System of both Plants & Animals CO 3. Various tissue system and organ system in plant and animals CO 4. Theory of evolution CO 5. Anatomy and Physiology of plants and animals

Subject with Subject code	Course Outcomes
2.1 Pathophysiology	CO1 Describe the etiology and pathogenesis of the selected disease states. CO2 Describe the reaction of the body to various diseases. CO3 Know the signs and symptoms of the diseases. CO4 Understand the causes and complications of diseases. CO5 Understand the mechanism of bodies immune system. CO6 Explore the importance of safe, rational and effective use of pharmacotherapy with the thorough knowledge of pathophysiology of disease.
2.2 Pharmaceutical Microbiology	CO 1 To study what is mean by microbiology, study of bacteria and its different parts and also study the how to isolate and preserve the pure culture and study of different type of microscope. CO2 To understand the importance of sterilization and different type of sterilization method and to study the different type of staining technique for bacteria (tostudy the morphology of bacteria). CO3 Study the viruses and fungi also study of antiseptic and disinfectant and their evaluation test and different sterility test for solid, liquid, ophthalmic and sterile product as per IP,BP,USP. CO4 Designing of aseptic area and study laminar air flow, Clean are classification. CO5 To gain knowledge of spoilage their type and factors affecting microbial spoilage of pharmaceutical product. Know the sources & types of microbial contamination and able to identify the causes and basis of microbial spoilage.
2.3 Pharmacognosy & Pharmacognocy & Phytopharmaceuticals	This course is one of the most advanced introductions in Herbal Medicines that is offered. Will learn and get experience about CO1. Herbs and their Science CO 2. Classification of Medicinal Plants, Phytochemistry, Carbohydrates, Lipids, CO 3. Terpenes, Polyphenols, Alkaloids,

	Pharmacology, Toxicity, Formulations and Preparations of Herbal Medicines CO 4. How herbs influence our physiology and can be helpful against several disorders. CO5. Relationsbetween Phyto-therapy and the Elderly, Phytotherapy and Children, Understanding Herbal Action, and Understanding the Materia Medica. CO 6. The recognition of medicinal plants, identification of adulteration andContamination.
2.4 Pharmacology-I	CO1 To understand the Pharmacokinetics and Pharmacodynamics of drugs CO2 To understand the clasification of drug, their mechanism of actions, therapeutics uses and side effects CO3 know the Pharmacology of adrenergic and cholinergic drugs and their applications CO4 To undrstand the Pharmacological actions of drugs acting on central nervous system, cardiovascular system and respiratory system. CO5 To understand the Pharmacology of hormones and hormone antagonist. CO6 To understand the Pharmacology of autocoids and their antagonist
2.5 Community Pharmacy	CO1.Students will provide patientcentered care to diverse patients using the best available evidence and in consideration of patients' circumstances to devise, modify, implement, document and monitor pharmacotherapy care plans, either independently or as part of healthcare team. CO 2. Students will demonstrate knowledge of the business and professional practice management skills in community pharmacies. CO 3. Students will educate patients through counseling &provide health screening services to public CO 4. Students will identify symptoms of minor ailments and provide appropriate medication CO 5. Students will participate in prevention programs of communicable diseases 6. Students will exhibit professional ethics by promoting safe and appropriate medication use throughout society

2.6 Pharmacotherapeutics-I	CO1: the pathophysiology, etiology , clinical manifestation , pharmacotherapeutic management , controversies , idividualised therapeutics approach and patient specific parameter for drug therapyof cardio vascular suystem related diseases CO2: the pathophysiology, etiology , clinical manifestation , pharmacotherapeutic management , controversies , idividualised therapeutics approach and patient specific parameter for drug therapy of respiratory system related diseases CO3: the pathophysiology, etiology , clinicalmanifestation , pharmacotherapeutic management , controversies , idividualised therapeutics approach and patient specific parameter for drug therapy of endocrine system related disorder CO4: General prescribing guidelines for a. Paediatric patients b. Geriatric patients c. Pregnancy and breast feeding CO5: the pathophysiology, etiology , clinical manifestation , pharmacotherapeutic management , controversies , idividualised therapeutics approach and patient specific parameter for drug therapy of ocular system related diseases CO6: Role of pharmacist and Essential drug concept Rational drug formulations