

Syllabus for Anatomy(Total hours - 650) .

I Semester	II Semester
Theory	Theory
General Anatomy, General Embryology, General Histology	Abdomen, Systemic Embryology, Systemic Histology
Upper Extremity, General Embryology, General Histology	Head & Neck, Systemic Embryology, Systemic Histology
Upper Extremity, Lower Extremity, General Embryology, General Histology	Brain, Systemic Embryology, Systemic Histology
Internal Assessment, thorax, Systemic Embryology, Systemic Histology	Systemic Embryology, Systemic Histology
Abdomen, Systemic Embryology, Systemic Histology	Systemic Embryology, Systemic Histology

I Semester	II Semester
Practical	Practical
General Histology, Skin & Appendages- Thick Skin and Thin Skin	Respiratory System-Trachea & Lung, Lymphoid tissue-Lymph Node; Thymus; Tonsils; Spleen
Cardiovascular System-Arteries-large & Medium size veins	Esophagus; Stomach-Fundus & Pylorus, Small Intestine-Duodenum; Jejunum; Ileum; large Intestine-Appendix; Tongue
Epithelial Tissue, Connective tissue, cartilage-Hyaline; Elastic; Fibrous	Pancreas, Liver, Gall Bladder Urinary System-Kidney, Urinary Bladder, Ureter, male Reproductive system- Prostate, Testis, Seminal Vesicle, Penis
Compact-bone L.S. & T.S.; cardiac; Smooth, Salivary Gland:- Serous; Mucous; Mixed	Female reproductive System-fallopian Tube, Uterus, Ovary, Mammary Gland Endocrine system-Thyroid Gland, Pituitary Gland, Adrenal Gland, Special Senses;-Eye:Retina

Syllabus of Dissection

I Semester	II Semester
General Anatomy, General Embryology Upper Extremity, Lower Extremity, General Embryology, Thorax, Abdomen, Systemic Embryology, Final examination.	Abdomen, Systemic Embryology, Head and Neck, Brain, Systemic Embryology, Final Examination.

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Physiology (Total hours - 480)

I Semester	II Semester
Theory	Theory
General Physiology, Blood	Renal System, Skin & Body Temperature
Nerve Muscle Physiology, Cardiovascular System	Central Nervous System, Special Senses
Digestive System, Respiratory System	Endocrine System, Reproductive System

I Semester	II Semester
Practical	Practical
Introduction to Laboratory, Study of Microscope	Clinical Examination of Radial Pulse
Study of the drop of blood (Osmotic fragility of Blood cells), Study of the Haemocytometer	Recording of Blood Pressure
Total R.B.C. Count, Total W.B.C. Count	General Clinical Examination
Differential Leucocyte Count (D.L.C.) Estimation of the haemoglobin concentration	Clinical Examination of Cardiovascular System
Estimation of the Haemoglobin concentration, Bleeding Time (B.T.) and Clotting Time (C.T.)	Clinical Examination of Respiratory System
Blood Group Demonstration : Blood Indices MCV, MCH, MCHC, Colour index	Clinical Examination of Sensory System
ESR (Wintrobe and Westergren method)	Clinical Examination of Motor System
	Clinical Examination of Cranial Nerves
	Effect of Posture on Vital Capacity
	Mosso's Ergography
	Stethography
	Perimetry
	Electrocardiography

Syllabus for Biochemistry (Total hours - 240).

I Semester	II Semester	
Theory	Theory	
Cell	Carbohydrate Metabolism	Metabolism xenobiotics
Chemistry of Carbohydrate	Lipid Metabolism	Environmental biochemistry
Chemistry of Lipids	Protein Metabolism	
Chemistry of amino acids and Proteins	Nucleic acid Metabolism	
Nucleic acid and Nucleotide Chemistry	Mineral Metabolism	
Vitamins	Water and Electrolytes	
Enzymes	Acid- Base Balance	
Biological Oxidation	Genetics	
Hemoglobin Chemistry	Cancer biochemistry	
Hemoglobin Metabolism	Endocrinology	
Nutrition	Immunology	
Nucleotide Metabolism	Free radicals and Antioxidants	
I Semester	II Semester	
Practical	Practical	
Qualitative Analysis	Urine analysis for normal and abnormal constituents	
Colour reactions of carbohydrates	Quantitative analysis	
Identification of unknown carbohydrates	Blood glucose estimation by GOD/POD methods and clinical interpretation of results	
Colour reactions of amino acids.	Blood urea estimation by DAM method and clinical interpretation of results.	
Precipitation reactions of proteins Identification of unknown proteins	Serum creatinine estimation by Jaffe's method and clinical interpretation of results. Serum Total Protein & Albumin estimation. Calculation of A/G ratio and its clinical interpretation.	
Demonstration Osazoms, Colorimetry, pH meter	Demonstration Flame Photometer, Chromatography, Electrophoresis	

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Department of Pharmacology: Total 300 hours

(Theory 180 hours + Practical 120 hours).

III Semester	IV Semester	V Semester
Theory-(72 hours)	Theory-(40 hours)	Theory-50
General pharmacological principles	Drugs affecting renal function	Chemotherapy of microbial diseases
Autonomic nervous system	Blood and the blood forming organs	Chemotherapy of neoplastic diseases
Skeletal muscle relaxants	Respiratory system	Drugs used for immunomodulation
Local anesthetics	Hormones and hormone antagonists	Toxicology
Autacoids and related drugs	Gastro intestinal drugs	Dermato pharmacology
The central nervous system		Ocular pharmacology
Cardiovascular system		Gene therapy
Practical- (48 hours)	Practical- (40 hours)	Practical- (50 hours)
Introduction to pharmacology practical's	Essential drug concept	Problem solving exercises
Sources of drugs	P-drug concept	Prescription writing
Sources of drug information	Clinical Pharmacology charts	Quantitative/Qualitative experimental charts
Dosage forms/ formulations	Study of effects of various drugs on GIT motility	Prescription Audit
Guidelines to the use of animals	Bioassay of histamine on Guinea pig ileum	Pharmacoeconomic problems
Study of effects of drugs on rabbit eye-pilocarpine/atropine/phenylephrine/lignocaine	Dosage Calculations	

(Detailed monthly teaching schedule would be provided before the commencement of every month)

Syllabus for Department of Pathology (Total hours - 315)

(Theory hours - 195 + Practicals hours - 120)

III Semester	IV Semester	V Semester
Theory- (90 hours)	Theory- (65 hours)	Theory- (40 hours)
Introduction of Pathology	Respiratory System	Important diseases of skin
Cell injury and cell death	Urinary tract	Central and peripheral nervous systems and head and neck pathology
Cellular adaptations	GIT	Revision.
Acute and chronic inflammation	Liver and gall bladder	
Hemodynamic disorders	Lymph node	
Genetic disorders	Spleen and thymus	
Neoplasia, important immune-mediated disorders	Female genital tract and breast	
Infectious diseases	Male reproductive system	
Environmental and nutritional disorders	Bones and joints	
Hematological disorders	Endocrine system	
Anemias, leukemias and ,bleeding disorders.	Muscles and soft, tissue tumors and blood banking techniques.	
Diseases of blood vessels and of, heart.		
Practical- (40 hours)	Practical- (40 hours)	
Haemoglobin estimation	Demonstration of pathology of respiratory diseases	Demonstration of lesions of skin
Differential leukocyte count, Blood banking	Urinary tract diseases, GIT	CNS and peripheral nervous system and pathology of head and neck
Urinalysis	Hepatobiliary diseases	
Demonstration of lesions of inflammation	Diseases of LN and spleen demonstration of reproductive system	
CVC, Thrombus	Bones and joints	
Neoplasms and cardiovascular diseases.	Endocrine tumor	
	Muscles and soft tissue tumors	

Syllabus for Department of Microbiology : Total 260 hours

(Theory 140 hours + Practical 120 hours)

III Semester	IV Semester	V Semester
Theory- (60 hours)	Theory- (40 hours)	Theory - (40 hours)
General Microbiology	Systemic Bacteriology upto <i>Borrelia vincenti</i> & <i>Leptospira</i> .	Orthomyxoviruses, virus causing Diarrhea, Arboviruses, HIV, Hepatitis viruses, Rabies virus, Miscellaneous viruses. .
Immunity, Antigen, Antibody, Ag-Ab interaction, Complement system, Structure and function of immune system, Immune Response	Immunodeficiency diseases, Hypersensitivity reaction, Autoimmunity, Transplant immunity	<i>Brucella</i> & <i>Bordetella</i> , <i>M.leprae</i> , <i>Mycoplasma</i> & <i>Actinomycetes</i> , <i>Chlamydia</i> , <i>Rickettsia</i> , Miscellaneous Bacteria.
Systemic Bacteriology upto <i>N.meningitidis</i> & <i>N.gonorrhoea</i>	Parasitology	Immunology
Introduction to parasitology, <i>Entamoeba histolytica</i> , Free living amoeba, <i>Giardia</i> , <i>Leishmania donovani</i> , <i>Toxoplasma gondii</i> , Malaria	General properties of viruses, Virus host-interaction, Bacteriophage, Herpesviruses, Adenoviruses, Picornaviruses	<i>T.saginata</i> , <i>T.solium</i> , <i>Echinococcus</i> , Blood Flukes, <i>Ascaris lumbricoides</i> , <i>E.vermicularis</i> , <i>Ancylostoma duodenale</i> , <i>Trichuris trichura</i> , <i>Wuchereria bancrofti</i> , <i>Dracunculus medinensis</i> , Miscellaneous.
Mycology introduction	Superficial and Deep mycosis, Opportunistic systemic mycosis	
Practical - (40 hours)	Practical - (40 hours)	Practical - (40 hours)
Microscopy	<i>Corynebacteria</i>	<i>Brucella</i> , <i>Bordetella</i> , <i>Haemophilus</i>
Morphology of bacteria	<i>Bacillus</i>	<i>Yersinia</i> , <i>Actinomycetes</i>
Sterilization	<i>Clostridia</i>	<i>Spirochaetes</i>
Culture media, Culture methods	Nonsporing anaerobes	<i>Leishmania donovani</i>
Identification of bacteria	<i>M. tuberculosis</i>	<i>Plasmodia</i>
Antigen –antibody reaction	<i>M. leprae</i>	<i>Cryptosporidium</i> , <i>Isospora</i>
<i>Staphylococci</i>	<i>E. coli</i> , <i>Klebsiella</i> , <i>Proteus</i>	<i>Cestodes</i>
<i>Streptococci</i> & <i>Diplococcus pneumoniae</i> , <i>N.meningitidis</i> & <i>N.gonorrhoeae</i> .	<i>Shigella</i> , <i>Salmonella</i>	<i>Trematodes</i> , <i>Intestinal Nematodes</i>
Mycology	<i>Vibrio</i> , <i>Pseudomonas</i>	<i>Tissue Nematodes</i>
Introduction to parasitology	Mycology	Laboratory animals & vectors
<i>Entamoeba histolytica</i> , <i>Ent. coli</i> , <i>T. vaginalis</i> , <i>G.lamblia</i> , <i>T.gondii</i> ,	Virology	Virology, Revision practicals

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Department of Forensic Medicine & Toxicology : Total 100 hours

(Theory 40hours + Practical - 60 hours)

III Semester	IV Semester	V Semester
Theory-(20 hours)	Theory-(10 hours)	Theory-10
Medical jurisprudence & ethics COPRA & PNDT Act	Infanticide & child abuse	Deleriant poisoning
Legal procedure	Virginity, pregnancy, delivery & abortion	Cardiac poisoning
Identification	Impotence & sterility	Asphyxiants
Medicolegal autopsy	Sexual offences	Agricultural poisoning
Thanatology	Forensic psychiatry	Drug dependence
Signs of death	Regional injuries	Blood stain & biological fluids
Mechanical injuries	Thermal injuries	Newer techniques & recent advances
General toxicology	Transportation & explosion injuries	Medicolegal aspects of HIV
Asphyxia	Corrosive poisoning	Anesthetic death
	Metallic poisoning	Torture & custodial death
	Somniferous poisoning	
Practical- (30 hours)	Practical- (20hours)	Practical- (10hours)
Medico legal injury report writing	Report writing of sexual offence	Analysis of poison & DNA profile
Autopsy report writing	Potency certificate	Toxicological specimen
Various certificates (birth, death, medical etc)	Autopsy report writing	Autopsy report writing
Age estimation	Forensic pathology	Drunkenness certificate
Skeletal examination	Interpretation of Photograph	Museum certificate
Postmortem instruments , Medico legal important weapons	Blood & biological fluid examination	Autopsy report of custodial deaths

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Community Medicine (Theory hours - 198)

Ist Semester	IInd Semester	IIIrd Semester
Topic	Topic	Topic
Community Medicine- Introduction and Historical Perspective	General Epidemiological Concepts (Part-I)	Biostatistics
		Ecto-and Endo-parasites
Concept of Health and Disease	Mental Health	Medical Entomology
Social Sciences and Health	Genetics & Health	
Nutrition and Health	Health Care of Community	
IVth Semester	Vth Semester	VIth Semester
Environmental Sanitation & Health	International Health, NGO's	Communicable Diseases
Demography, MCH, Family Welfare	Occupational Diseases	Non-Communicable Diseases
	Health Education and Communication	
	Gen Epidemiological Concepts (Part-II)	
<u>VIIth Semester</u>		
Public Health Administration		
National Health Programs, and National Health Policy		
Revision Tutorials		

(Detailed monthly teaching schedule would be provided before the commencement of every month)

Detail of Practical Work Of Community Medicine (Total Hours- 100)

Sem	Field Visit	Lab/Museum	Clinico-Social Case Study
I st	-Visit Rural Community	-Anthropometry	_____
II nd	-Visit PHC/CHC -Visit Hospital Setup	_____	_____
III rd	-Visit Anganwadi	-Mosquito breeding -Parasites -Entomology	-Family Study-Two
IV th	-Visit Water Works -Visit Sewage Treatment Plant -Visit RHTC Visit UHTC	-Chemicals in Public Health -Water Quality Testing	-Environmental Study
V th	-Visit Dairy Plant - Visit Distt Immunization Clinic Visit Distt Vector Borne Disease Control Organization	- Contraceptives -Road to Health Chart	- Nutritional Survey - Communicable Disease-Two - Non-communicable Disease
VI th	-Visit Infectious Disease Hosp/ward -Visit DOTS Centre -Visit Urban Leprosy Centre	-Vaccines and Sera, Cold Chain -ORS, Weaning Foods	-AN Case-Two -PN Case-Two
VII th	_____	-Revision of Practicals	-School Health Survey - Malnutrition case

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus of General Medicine (Total hours - 300)

III Semester		Clinical Postings – 6 weeks	
IV Semester		V Semester	
Topics to be covered		Topics to be covered	
Fever And PUO	ECG, Echocardiography, CVS X-Rays, CT, Interventions	Acute Glomerulonephritis	
Acute Diarrhoea and Vomiting (Incl. Bacillary Dysentery)	Heart Failure, Ischaemic Heart Disease	Polycystic and Tubo-Interstitial Kidney Disease	
Brucellosis, Enteric Fever, Food Poisoning	Hypertension, Congenital Heart Diseases	Nephrolithiasis and UTI/Pyelonephritis	
Rickettsial Fevers, Malaria, Leishmaniasis	Infective Endocarditis, Valvular Heart Diseases	AC. And Chronic Renal Failure	
Amoebiasis & Giardiasis, Halminthiasis	Cardiomyopathies, Pericardial Diseases	Diseases of Ant Pitutary & Hypothalamus	
Dengue Fever	Pulmonary Hypertension & Cor-Pulmonale	Hypothyroidism, Hyperthyroidism	
	ARDS, Shock and Mechanical Ventilation	Diseases of Adrenal Cortex & Pheochromocytoma	
	DVT & PULM Thrombo-Embolism	Diabetes Mellitus, Disorders of Calcium Metabolism	

(Detailed monthly teaching schedule would be provided before the commencement of every month)

Syllabus for TB & Chest (Total hours - 20)

IV Semester
Topics to be covered
Respiratory Function Tests & Respiratory X-Rays, Bronchial. Asthma, COPD, Pneumonias
Bronchiectasis & Lung Abscess, Interstitial Lung Disease, Occupational and Environmental Lung Diseases
Pulmonary Tuberculosis, Extra Pulmonary Tuberculosis, Treatment of tuberculosis, Internal assessment Test

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Dermatology (Total hours - 30)

IV Semester
Topics to be covered
Structure & common Dermatological Terms, Bacterial and Viral Infections Skin, Acne
Atopic Dermatitis, Contact Dermatitis & Eczema, Pauplosquamous Disorders
Dermatophytosis, Tinea, Candidiasis, Warts, Herpes Simplex and Zoster, Leprosy, Pemphigus
Skin Manifestations of Internal Diseases, Internal Assessment Test

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Paediatrics (Total hours - 100)

IV Semester
Topics to be covered
Growth and Development Assessment , Protein Calorie Malnutrition, Vitamin Deficiencies Incl Rickets
Immunisation-Principles and Schedules, Measles and Mumps, Diphtheria, Tetanus, Meningitis
Pertussis, Influenza and Other Viral Diseases, Gastro-Enteritis and Dehydration, Bronchopneumonias
Resuscitaion/Care of New Born, Sepsis in Infancy, Congenital heart Diseases in Childhood
Genetic Disorders of Metabolism, Seizure Disorders in Childhood, Internal Assessment-Test

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus of Surgery (Total hours - 300)

III Semester		Clinical Postings – 6 weeks	
IV Semester		V Semester	
Topics to be covered		Topics to be covered	
Introduction to Surgery		Principles of Laparoscopic Surgery	
Sterilization and Disinfection		Principles of Day care Surgery, Burns	
Universal precautions including AIDS		Accident and Emergency Surgery	
Shock, Fluid and Electrolyte, Blood Transfusion		Warfare Injuries, Principles of Oncology	
Wounds and Tissue Repair, Parasitic Infections		Principles of plastic and reconstructive surgery	
Nutrition, Surgical Ethics, Imaging in Surgery		Oral and Orphanyngeal CA, Salivary gland disorders	
Preparation of Pt. of Surgery		Breast, Thyroid, Arterial disorders, Venous disorders	

(Detailed monthly teaching schedule would be provided before the commencement of every month.)

Syllabus for Obstetrics & Gynecology(Total hours - 300)

III Semester	Clinical Posting – 2 weeks	
IV Semester	V Semester	
Topics to be covered	Topics to be covered	
Anatomy of Female Genital Tract	Onset of Labour & Uterine Activity in Labour	Vomiting in Pregnancy
Anatomy of Female Genital Tract	Normal Labour, Physiology and Mechanism	Haemorrhage in Early Pregnancy (Abortion)
Anatomy of Female Genital Tract	Documentation of Labour – Partogram	Septic Abortion
Physiology of Menstruation	Management of Ist Stage of Labour	Ectopic Gestation
Fundamentals of Reproduction (Ovulation, Fertilization, Implantation)	Mechanism & Management of IInd Stage of Labour	Hydatidiform Mole
Development of Embryo & Placenta	Physiology & Management of IIIrd Stage of Labour	Antepartum Haemorrhage (Placenta Praevia)
Foetal Development & Foetal Circulation	Normal Puerperium	Abruptio Placentae
Physiological Changes during Pregnancy	Introduction of family Planning Program & Contraception	Hypertensive Disorder in Pregnancy (P.I.H.)
Symptoms, Signs & Diagnosis of Pregnancy	Temporary Method of Contraception	Eclampsia
Obstetrical History taking & Examination	IUCD	Polyhydramnios
Antenatal Care	Hormonal Method of contraception	Multiple Pregnancy
Antenatal Assessment of foetal Wellbeing	Permanent Method of Contraception	High Risk Pregnancies
Foetal skull and Maternal Pelvis	Medical Termination of Pregnancy	

(Detailed monthly teaching schedule would be provided before the commencement of every month.).

Syllabus of Psychiatry (Total hours - 20)

V Semester
Topics to be covered
Biology of Psychiatric Diseases, Assessment of a Psychiatric Patient, Substance Abuse Exe.(Alcohol Dependence)
Anxiety Neurosis and Panic attacks, Phobic, Obsessive-Compulsive and Stress Disorders
Depression, Bipolar Disorders, Somatoform and Personality Disorders, Schizophrenia
Internal Assessment Test

(Detailed monthly teaching schedule would be provided before the commencement of every