INFLAMMATION AND INFECTION MODULE

MBBS Year-3 (Academic Year 2020-2021)

KMU Central Curriculum Committee
Khyber Medical University, Phase V, Hayatabad | Peshawar

List of Themes

TOTAL WEEKS-6

Themes	**Duration in weeks**
Pain and Fatigue	Week 1 & 2
Trauma and Repair	Week 3
Fever and Infection	Week 4, 5 & 6

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Learning Objectives

At the end of this module, the 3rd year students would be able to:

1. Describe the process of acute & chronic inflammation with their outcomes
2. Relate different aspects of healing and repair
3. Differentiate common pathogenic bacteria based on morphology, pathogenesis & lab diagnosis.
4. Relate bacterial pathogenic factors to clinical manifestations of common infectious diseases.
5. Describe the pharmacological details of anti-inflammatory drugs
6. Apply/relate the pharmacokinetics & pharmacodynamics of chemotherapeutic agents to their use in infectious diseases
7. Construct / Write prescriptions for various inflammatory and infectious diseases
8. Describe medico legal aspects of HIV patient
9. Describe mechanism of wound causation
10. Describe medico legal aspects of poisoning in general
11. Describe medico legal aspects of parameters used for personal identification in real life situation
12. Apply parameters of a person's identification in a simulated environment
13. Describe the epidemiology of common infectious diseases.
14. Explain the preventive and control measures for infectious diseases.
15. Explain the control & preventive measures for nosocomial infections.
16. Describe the risks associated with hospital waste and its management.

Week 1 Theme-1 (Pain and Fatigue)			
Subject	**Topic**	**Sr.**	**Learning objectives**
Pharmacology	Overview to anti-inflammatory drugs		-Classify anti-inflammatory drugs -Describe the role of DMARDs and glucocorticoids as anti-inflammatory agents
	NSAIDs (Non-selective cox inhibitors: Aspirin & other commonly used NSAIDs)		-Classify NSAIDS -Differentiate between non-selective COX inhibitors and selective COX-2 inhibitors based on mechanism of action. -Name the prototype non-selective COX inhibitor. -Describe the pharmacokinetics of Aspirin -Describe the mechanism of action of aspirin as anti-platelet, analgesic, antipyretic and anti-inflammatory agent. -Give the dose of Aspirin as anti-platelet, analgesic/antipyretic and as anti-inflammatory drug. -Describe clinical uses of NSAIDs. -Describe the adverse effects of NSAIDs. -Describe the drug treatment of Aspirin poisoning -Describe the pharmacokinetics with emphasis on dosage, duration of action and elimination of Diclofenac, Ibuprofen, Indomethacin, Mefanamic acid and Piroxicam in contrast to Aspirin -Relate pharmacokinetics and pharmacodynamics of NSAIDs to their clinical applications
	Selective COX-2 inhibitors		-Describe the mechanism of action of selective COX-2 inhibitors. -Describe the clinical uses of selective COX-2 inhibitors -Describe the adverse effects of selective COX-2 inhibitors -Describe the merits and demerits of selective COX-2 inhibitors and non-selective COX inhibitors.

	Paracetamol (Acetaminophen)		-Describe the pharmacokinetics of Paracetamol -Describe the mechanism of action of Paracetamol. -Describe the clinical uses of Paracetamol. -Describe the adverse effects of Paracetamol. -Give therapeutic and fatal doses of Paracetamol. -Describe the drug treatment of Paracetamol poisoning
Pathology	Cells of Inflammation		-Describe different cells of inflammation -Describe the functions of various cells of inflammation - Enumerate different causes of leukopenia and leucocytosis(each neutrophil, lymphocyte, monocyte, eosinophil, basophil seperately)
	Overview to Acute Inflammation and vascular phase		-Define acute inflammation -Describe causes of acute inflammation -Describe the vascular events of acute inflammation
	Recognition of microbes		-Describe various molecular patterns and appropriate receptors used by the inflammatory cells to identify microbes -Relate the recognition of microbes to the initiation of inflammation
	Cellular phase of acute inflammation		-Describe the sequence of events and cellular changes involved in cellular phase of acute inflammation
	Plasma Derived Mediators		-Enumerate plasma derived mediators -Enlist the functions of each mediator -Describe the different cascades involved in the generation of mediators
	Cell Derived Mediators		-Enumerate cell derived mediators -Enlist the functions of each mediator
Forensic Medicine	Poison & related laws		Define poison Describe laws related to poisoning
	Legal duties of RMP in a case of poisoning		Describe legal duties of RMP in a case of poisoning
	Fate of Poison		Describe the protocols of diagnosing poisoning in living and dead
	Diagnosis of poisoning in living and dead		Describe the protocols of diagnosing poisoning in living and dead

Community Medicine	Hospital and Biomedical waste management		• Define biomedical waste • Describe various types of biomedical waste • Describe the color coding scheme for various types of waste • Describe the hazards of hospital waste • Explain the waste management plan and strategies of the hospital
	Visit to hospital to see disposal of hospital waste		
Week 2 Theme (Pain and Fatigue)			
Pharmacology	Anti-histamines		-Classify anti-histamines -Differentiate between first and second generation anti-histamines -Describe the pharmacologic effects of H1-receptor antagonists. -Describe the clinical uses of H1-receptor antagonists. -Enlist the adverse effects of H1-receptor antagonists. -Describe the drug interactions of H1-receptor antagonists.
	Serotonin agonist and antagonisst		- Enlist serotonin agonists - Classify serotonin antagonists - Describe the mechanism of action of serotonin - Describe the organ system effects of serotonin. - Describe the clinical uses of serotonin agonists and antagonists - Describe the pharmacological basis of ondansetron in chemotherapy induced vomiting
Pathology	Morphological patterns, outcomes, defects of inflammation	**1**	-Enumerate the different morphological patterns of inflammation -Describe the histological changes in each pattern - Enlist the outcomes of inflammation -Enumerate the various defects of inflammation -Describe the consequences of the defects of inflammation
	Overview to chronic inflammation	**2**	-Define chronic inflammation -Differentiate chronic from acute inflammation -Describe the causes and morphological features of chronic inflammation
	Granulomatous inflammation	**3**	Define granulomatous inflammation

			-Describe the morphological features and mediators involved in granulomatous inflammation
	Cells and mediators of chronic inflammation	**4**	-Enlist the cells of chronic inflammation -Enumerate the mediators of chronic inflammation -Describe the function of the mediators -Relate the functions of mediators to the morphological changes seen in chronic inflammation
	Systemic effects of inflammation	**5**	-Enumerate the systemic effects of inflammation -Describe the pathophysiology of the systemic effects of inflammation
Forensic Medicine	Antidotes		Define and classify antidotes Describe the mechanism of action of different antidotes
	Steps of management in a case of poisoning		Describe general steps of management in a case of poisoning
Community Medicine	Infection control		• Define the basic definition related to infectious disease epidemiology • Review the role of susceptible host for successful parasitism, modes of transmission and the host defense system • List and explain the various classifications of communicable diseases with special reference to the scope and purpose of the International classification of Disease (ICD -10). • Enlist the common infectious diseases affecting the population of Pakistan as per National institute of Health Pakistan. • Explain the effect of climate change and seasonal variation on specific diseases globally and in Pakistan. • Explain the role of personal hygiene & PPE in infection control.

Week 3 Theme (Trauma and repair)			
Pathology	Prostaglandins		- Enlist various prostaglandins- - Describe the mechanism of action of Prostaglandins. - Describe the organ system effects of Prostaglandins. - Describe the clinical uses of Prostaglandins.
	Overview to tissue healing and repair	1	-Differentiate between regeneration and repair -Describe various steps involved in the process of tissue healing and repair
	Tissue regeneration	2	-Define regeneration -Enlist organs capable of regeneration -Describe the process and mediators involved in regeneration
	Cell Cycle and its role in repair	3	-Define cell cycle -Describe the initiation, various phases and proteins involved in the cell cycle -Discuss cells capable of entering the cell cycle -Describe proliferative capabilities of various cells
	Repair by scarring	4	-Describe the various steps involved in process of repair by scarring -Describe the various mediators involved in the steps of scarring
	Growth factors and receptors	5	-enumerate various growth factors and their receptors -Describe the most common pathways by which growth factors affect tissue repair and regeneration
	ECM	6	-Classify various components of ECM -Describe the role and importance of ECM in tissue repair
	Factors affecting wound healing/abnormal scarring	7	-Enlist the various factors that influence wound healing -Describe the mechanism by which these factors affect wound healing -Describe the abnormalities of repair and their consequences

Forensic Medicine	Overview to medico-legal aspects of trauma (Wound causation)	.	Describe mechanism of wound causation
	Toxicity by analgesics		Describe the medico legal aspects of toxicity by aspirin and paracetamol
Community Medicine	Nosocomial infection & its control		• Describe the prevalence of the nosocomial infections globally and Specifically in Pakistan. • Identify the cause of nosocomial infections in Pakistan. • Enlist common nosocomial infections. • Describe the importance of different modes of transmission for causation of the nosocomial infections. • Explain the control & preventive measures for nosocomial infections
Week 4 Theme (Fever and Infection)			
Pharmacology	Introduction to Chemotherapy		1. Define basic terms like chemotherapy, antibiotic, antimicrobial, MIC, MBC, chemoprophylaxis, empirical therapy and post-antibiotic effect, bacteriostatic and bactericidal antimicrobials. 2. Explain advantages of drug combinations. 3. Describe various mechanisms of bacterial resistance against antibiotics. 4. Differentiate between concentration and time dependent killing with examples. 5. Classify antimicrobials on the basis of mechanism of action (MOA)
	Penicillins		1. Classify beta-lactam antibiotics 2. Enlist narrow and broad spectrum Penicillins. 3. Enlist anti-pseudomonal, anti-staphylococcal/ beta lactamase resistant Penicillin. 4. Enlist long- and short-acting Penicillins 5. Describe anti-bacterial spectrum of Penicillins. 6. Describe pharmacokinetics in respect of emphasis on route of administration and excretion of Penicillins

			7. Describe mechanism of action of Penicillins 8. Describe clinical uses of Penecillins 9. Describe adverse effects of Penicillins, 10. Describe contraindications of Penicillins. 11. Describe principal mechanism of bacterial resistance to Penicillins 12. Describe drug interactions of Penicillins 13. Apply formula for interconversion of milligrams and units of Penicillin G. 14. Relate pharmacokinetics and pharmacodynamics of Penicillin with their clinical applications / uses.
	Cephalosporins		1. Classify Cephalosporins 2. Describe anti-bacterial spectrum of Cephalosporins. 3. Describe pharmacokinetics of Cephalosporins with special emphasis on route of administration and excretion. 4. Describe clinical uses of Cephalosporins 5. Describe the adverse effects of Cephalosporins. 6. Describe drug interactions of Cephalosporins with Ethanol. 7. Describe the principal bacterial mechanism of resistance to Cephalosporins. 8. Relate pharmacokinetics and pharmacodynamics of Cephalosporin with their clinical applications / uses.
	Beta lactamase inhibitors		1. Enlist beta-lactamase inhibitors 2. Explain the rationale for using beta lactamase inhibitors in combination with β-lactam antibiotics.
	Monobactams & Carbapanem,		1. Describe the antibacterial spectrum of Monobactams and Carbapanem 2. Describe the clinical uses of Monobactams and Carbapanem
	Vancomycin		1. Describe the MOA of Vancomycin. 2. Describe clinical uses of Vancomycin 3. Describe the use of vancomycin in MRSA (Methicillin-resistant Staph aureus). 4. Describe adverse effects of Vancomycin

			5. Describe "Red man/Red neck" syndrome.
	Fosfomycin Bacitracin & Cycloserine		1. Enlist clinical uses of Fosfomycin, Bacitracin & Cycloserine
	Protein synthesis inhibitors:		Classify bacterial protein synthesis inhibitors
	Tetracyclines		1. Classify Tetracyclines. 2. Describe anti-bacterial spectrum of Tetracyclines. 3. Describe the pharmacokinetics of Tetracycline with special emphasis on absorption of Tetracyclines. 4. Describe mechanism of action of Tetracyclines. 5. Describe the principal mechanism of resistance to Tetracyclines. 6. Describe clinical uses of Tetracyclines. 7. Describe adverse effects of Tetracyclines 8. Describe Black Bone disease. 9. Describe the teratogenic effects of Tetracyclines. 10. Describe drug interactions of Tetracyclines. 11. Describe the adverse effect related to the use of outdated (expired) Tetracycline products. 12. Relate pharmacokinetics and pharmacodynamics of Tetracycline with their clinical applications / uses.
Pathology	Bacteria: Pyrogenic Bacteria	1	-Define boil and furuncle -Enlist organisms responsible for pyrogenic infections -Describe important properties, pathophysiology, lab diagnosis of GPC & GNC
	Bacteria: Rickettsia	2	-Define Rickettsia -Describe the important properties, pathophysiology, lab diagnosis of diseases caused by Rickettsia
	Spore forming GP rods	3	-Enumerate spore forming GP rods - Describe the important properties, pathophysiology, clinical features and lab diagnosis of spore forming GP rods
	Non Spore forming GP rods	4	Enumerate non spore forming GP rods

			- Describe the important properties, pathophysiology, clinical features and lab diagnosis of non-spore forming GP rods
	Chlamydia	5	Describe the important properties, pathophysiology, clinical features and lab diagnosis of chlamydia.
	Miscellaneous: Sepsis and Septic Shock	6	-Define sepsis and septic shock -Enlist organisms capable of causing sepsis and inducing septic shock -Describe the pathophysiology and clinical features of septic shock
	Zoonotic Infections	7	-Enlist organisms causing zoonotic infections -Describe the important properties, pathophysiology, clinical features and lab diagnosis of different zoonotic diseases
Forensic Medicine	General outlines of identification		Describe methods and parameters of identification
	Fetal age determination		Write important physical developmental stages of fetus for age estimation
	Age determination by skeletal study		Write important skeletal points of age estimation
	Age estimation by dental study		Write important dental points for age estimation
	Ages of medico legal significance		Enlist important ages of legal significance
Community Medicine	–		–
Week 5 Theme (Fever and Infection)			
Pharmacology	Aminoglycosides		1. Enlist Aminoglycosides. 2. Describe anti-bacterial spectrum of Aminoglycosides. 3. Describe the pharmacokinetics of Aminoglycosides with special emphasis on route of administration, concentration-dependent killing and post-antibiotic effect. 4. Describe mechanism of action of Aminoglycosides. 5. Describe the principal mechanism of resistance to Aminoglycosides. 6. Describe clinical uses of Aminoglycosides.

			7. Describe adverse effects of Aminoglycosides. 8. Describe the drug interactions of Aminoglycosides. Relate pharmacokinetics and pharmacodynamics of Aminoglycosides with their clinical applications / uses.
	Macrolides & other related drugs		1. Enlist Macrolides. 2. Describe anti-microbial spectrum of Macrolides 3. Describe pharmacokinetics of Macrolides 4. Describe the mechanism of action of Macrolides 5. Describe the principal mechanism of resistance to Macrolides 6. Describe clinical uses of Macrolides 7. Describe adverse effects of Macrolides. 8. Describe drug interactions of Macrolides 9. Differentiate the salient features of Erythromycin, Clarithromycin and Azithromycin in respect of dosing and clinical use. 10. Relate pharmacokinetics and pharmacodynamics of Macrolides with their clinical applications / uses.
	Linezolid		1. Describe mechanism of action of Linezolid Describe clinical uses of Linezolid with special emphasis on methicillin-resistant staphylococci and vancomycin-resistant enterococci
	Clindamycin		1. Describe mechanism of action of Clindamycin. 2. Enumerate clinical uses of Clindamycin. 3. Describe antibiotic-associated (pseudomembranous) colitis.
	Streptogramins		1. Enumerate Streptogramins. 2. Describe clinical use of Quinupristin-Dalfopristin in VRE (Vancomycin-resistant enterococci).
	Chloramphenicol		1. Describe anti-microbial spectrum of Chloramphenicol 2. Describe mechanism of action of Chloramphenicol 3. Enlist clinical uses of Chloramphenicol 4. Describe the reason for obsoleting the systemic use of Chloramphenicol 5. Enlist adverse effects of Chloramphenicol

			6. Describe Gray baby syndrome.
	Quinolones		1. Classify Quinolones. 2. Describe the pharmacokinetics of Fluroquinolones with special emphasis on half-life of Moxifloxacin 3. Enlist respiratory Quinolones. 4. Describe anti-microbial spectrum of Fluoroquinolones. 5. Describe mechanism of action of Fluoroquinolones. 6. Describe the principal mechanism of resistance to Fluroquinolones, 7. Describe clinical uses of Fluroquinolones 8. Describe adverse effects of Fluroquinolones 9. Describe drug interactions of Fluroquinolones 10. Relate pharmacokinetics and pharmacodynamics of Fluoroquinolones with their clinical applications / use.
			1.
	Sulfonamides and Trimethoprim		2. Classify Sulfonamides 3. Describe anti-microbial spectrum of Sulfonamides 4. Describe mechanism of action of Sulfonamides and Trimethoprim 5. Describe mechanism of resistance to Sulfonamides 6. Describe clinical uses of Sulfonamides and Trimethoprim 7. Describe adverse effects of Sulfonamides and Trimethoprim 8. Describe the advantages of combining sulfamethoxazole with trimethoprim (Co-Trimoxazole) 9. Describe the drug interaction of Sulphonamides with Phenytoin.
	Parasites: Hydatid Cyst	1	-Describe the life cycle and important properties of Echinococcus - Relate the pathogenesis to the clinical features and lab work up of Echinococcus -Identify cysts of Echinococcus in the lab
	Leishmania	2	-Describe the life cycle, and important properties of Leishmania -Relate the pathogenesis to the clinical features and lab work up of Leishmania -

Pathology	Toxoplasma	3	-Describe the life cycle and important properties of Toxoplasma -Relate the pathogenesis to the clinical features and lab work up of Toxoplasma
	Malaria	4	-Describe the life cycle and important properties of Malarial parasite -Relate the pathogenesis to the clinical features and lab work up of Malaria
	Tenia	5	Describe the life cycle, important properties, of Tenia saginata and solium -Relate pathogenesis to the clinical features and lab work up of Tenia saginata and solium
Forensic Medicine	Sex determination		Describe parameters of sex determination
	Race determination		Describe parameters of race determination
	Examination of hair		Describe medico legal aspects of hair
	Forensic odontology		Write the application of odontology in forensic medicine
	Forensic Anthropometry		Describe medico legal aspects of forensic anthropometry
Community Medicine	Epidemiology & control of Malaria		• Describe the epidemiological determinants, frequency and distribution of Malaria • Compare the prevalence/incidence of malaria in different provinces of Pakistan. • Explain the preventive and control measures of Malaria • Describe the scope/function of Malaria control program.
	Epidemiology & control of Leishmaniasis		• Describe the epidemiological determinants, frequency and distribution of Leishmaniasis • Explain the preventive and control measures of Leishmaniasis
Week 6 Theme (Fever and Infection)			
	Antimalarials		1. Describe terms like chemoprophylaxis, causal prophylaxis, terminal prophylaxis and radical cure with examples of drugs. 2. Classify antimalarial drugs. 3. Enlist drugs used for chemoprophylaxis of malaria.

Pharmacology			4. Enlist drugs used for radical cure of malaria. 5. Describe the pharmacokinetics of Chloroquine with special emphasis on volume of distribution and dosing 6. Describe mechanism of action of Chloroquine, Quinine, Mefloquine, Halofantrine, Primaquine, Pyrimethamine and Artemisinins. 7. Describe adverse effects of antimalarial drugs 8. Describe Cinchonism and Blackwater fever. 9. Enlist the antimalarial drugs relatively safe in pregnancy. 10. Describe the antimalarial drugs contraindicated in G6PD deficiency. Relate pharmacokinetics and pharmacodynamics of antimalarial drugs with their clinical applications / use.
	Antifungal drugs		1. Classify Antifungal drugs. 2. Describe the pharmacokinetics of Amphotericin B and Ketoconazole 3. Describe the advantages of liposomal preparation of Amphotericin B 4. Describe mechanism of action of Azoles, Amphotericin B, Griseofulvin, Turbinafine, and Nystatin. 5. Describe clinical uses of Azoles, Amphotericin B, Griseofulvin, Turbinafine, and Nystatin. 6. Describe adverse effects of Azoles, Amphotericin B, Griseofulvin, Turbinafine, and Nystatin. 7. Describe drug interactions of Ketoconazole and Amphotericin B
	Antivirals		1. Classify antiviral drugs
	Anti-herpes		1. Enlist anti- Herpes drugs 2. Describe the pharmacokinetics of Acyclovir 3. Describe mechanism of action of Acyclovir 4. Describe clinical uses of Acyclovir. 5. Describe adverse effects of Acyclovir Describe the role of Ganciclovir in CMV retinitis.
	Anti-HIV drugs		1. Classify anti-HIV drugs.

			2. Describe the role of entry inhibitors, integrase inhibitors, protease inhibitors, NRTIs and NNRTIs in HIV treatment 3. Describe adverse effects of Zidovudine and Indinavir 4. Describe the rationale of HAART therapy.
Pathology	Viruses: Corona	1.	Describe the structure, important properties, pathogenesis and clinical features along with lab work up of Corona Virus
	Viruses: HIV	2	- Describe the structure, important properties, pathogenesis and clinical features along with lab work up of HIV
	Viruses: Herpesviruses	3	Describe the structure, important properties, pathogenesis and clinical features along with lab work up of Herpesviruses
	Viruses: Tumor Viruses	4	- Describe the structure, important properties, pathogenesis and clinical features along with lab work up of Tumor viruses
	Viruses: MMR	5	- Describe the structure, important properties, pathogenesis and clinical features along with lab work up of MMR viruses
	Fungi: Aspergillus	6	Describe the structure, important properties, pathogenesis and clinical features along with lab work up of Aspergillus
	Fungi: Candida	7	Describe the structure, important properties, pathogenesis and clinical features along with lab work up of Candida
	Tenia	8	Describe the structure, important properties, pathogenesis and clinical features along with lab work up of Tenia
Forensic Medicine	Medico legal issues related to HIV patient		Describe legal issues related to HIV patient
	Dactylography		Describe medico legal aspects of dactylography
	DNA finger printing		Define DNA finger printing Write its application in forensic practice Write methods of collection of samples and dispatch to laboratory
	Tattoos, scar marks, Superimposition		Describe medico legal aspects of tattoo marks, Describe medico legal aspects of scar tissue, Describe medico legal aspects of superimposition

	and facial reconstruction		Describe medico legal aspects of facial reconstruction
	Polygraph		Describe medico legal aspects of polygraph
	Narcoanalysis		Describe medico legal aspects of narcoanalysis
Community Medicine	Epidemiology & control of HIV/AIDs		• Describe the epidemiological determinants, frequency and distribution of HIV/AIDS • Explain the preventive and control measures of HIV/AIDS • Describe the scope of HIV/AIDS control program
	Epidemiology & control of MMR		• Describe the epidemiological determinants, frequency and distribution of measles, mumps & rubella • Explain the preventive and control measures of measles, mumps & rubella with reference to Pakistani context.
	Mycology and its public health importance		• Enlist common fungal infections in Pakistan • Describe the epidemiological determinants of common fungal diseases in Pakistan • Explain the preventive measures and principles of management for common fungal infections
	Epidemiology & control of Corona		• Describe the epidemiological determinants, frequency and distribution of corona • Compare the prevalence/incidence of corona in different parts of the world. • Describe the preventive and control measures of corona Describe the role of Pakistani government in corona control program.

Practical Work

Week 1 Practicals			
Pathology	Cell of inflammation	1	Identify Cells of inflammation in the microscope
	Acute Appendicitis	2	Identify the histopathological changes in acute appendicitis

Forensic Medicine	Gastric Lavage		Demonstrate the steps of gastric lavage
Week 2 Practicals			
Pathology	Chronic cholecystitis	1	-Identify the morphological changes occurring in chronic cholecystitis
	Granuloma	2	- Identify the various cells and their arrangement in a granuloma
Week 3 Practicals			
Pathology	Granulation Tissue	1	-Identify the histological features of granulation tissue
Week 4 Practicals			
Pathology	Catalase test	1	-Perform and interpret the result of catalase test by tube and slide method
	Coagulase test	2	-Perform and interpret the result of coagulase test by tube method
	Oxidase test	3	-Perform and interpret the result of coagulase test
	Culture media	4	-Identify blood agar, Mannitol salt agar, Chocolate media, Cary Blair transport media in the lab -Identify different types of haemolysis on blood agar
Pharmacology		Prescription Writing	
		Acute tonsillitis	Construct a prescription for a patient with acute tonsillitis.
Forensic Medicine	Sex determination through bones		Identify human sex through bones
	Hair, Fibre		Identify human hair through microscopy Differentiate between hair and fibre
Week 5 Practicals			
Pharmacology		Prescription Writing	
	Malaria		Construct a prescription for a patient with Malaria
Week 6 Practicals			
Pathology	Hydatid Cyst	1	-Identify cysts and ova of Echinococcus in the lab
	Leishmania	2	-Identify leishmania in slides of bone marrow/ skin biopsies
	Malaria	3	-Identify Malarial parasite trophozoites and gametocytes under microscope
	Taenia saginata/solium	4	-Identify ova of Taenia in the lab

CLINICAL SUBJECTS							
Sr. No	**MEDCINE**	**SURGERY**	**PAEDS**	**Obs/Gyn**	**ENT**	**EYE**	**BS**
1	PUO	Surgical infections	PUO (better to teach either by Medicine or Paeds if majority content is same/ joint session can be taken)	Puerperal pyrexia	Acute & chronic Phyrangitis	Acute and chronic dacrocystitis	Reaction to illness
2		Anesthesia & pain relief	Child with Rash	Post-operative wound sepsis	Acute & chronic rhinitis	Episcleritis	
3		Acute abdomen			Acute & chronic sinusitis	Infective conjunctivitis	
4					Acute and chronic tonsillitis		