STUDY GUIDE SURGERY 5th Year

MBBS COURSE

Contents

Mission Statement

Guiding your passion to profession

IMC Strives to improve health care in Faisalabad, our country and the world through excellence.

We seek to foster the development of dedicated clinicians, scientists, professionals and educators to provide leadership in education, services and discovery.

Vision:

To be an institution with

- An environment to develop creative free thinking and life long learners.
- A culture of objective research to transform health care delivery.
- Quality professional educational program based on innovation and collaboration.
- High moral and ethical values.
- Serving the needs of community in the best tradition of profession.

Goals:

- To develop humanist, skilled, intellectually disciplined and innovative medical professionals with dedication to those who they treat, lead and serve
- To educate and guide the next generation of leaders in healthcare and medical science to provide and sustain achievements in service, teaching and research.
- To provide comprehensive and effective patient centered, culturally sensitive, compassionate and innovative health care of highest quality to all.
- To recruit, develop and nurture and independent and academically outstanding community of faculty, student, trainees and staff, who each contribute to excellence in our missions.
- To promote professional and personal growth, productive, accountability, integrity and synergistic collaboration and synergy of faculty, students and staff

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INTRODUCTION

WHAT IS A STUDY GUIDE?

It is an aid to:

A. Inform students how student learning program of the subject has been Organized
B. Help students organize and manage their studies throughout the year
C. Guide students on assessment methods, rules and regulations

THE STUDY GUIDE:

- Communicates information on organization and management of the module.
- This will help the student to contact the right person in case of any difficulty.
- Defines the objectives which are expected to be achieved at the end of the program.
- Identifies the learning strategies such as lectures, small group teachings, clinical skills,
- Demonstration, tutorial and case based learning that will be implemented to achieve the Learning objectives.
- Provides a list of learning resources such as books, computer assisted learning program, web-links, and journals, for students to consult in order to maximize their learning.
- Highlights information on the contribution of continuous and test on the Student's overall performance.
- Includes information on the assessment methods that will be held to determine every student's
- Achievement of objectives.
- Focuses on information pertaining to examination policy, rules and regulations.

MEDICINE FOR 5th YEAR MBBS

Subject: Principles of Medicine
Year: Fifth Year
Duration: 36 weeks

Fifth year	70 hours Medicine 70 Hours Medicine Specialities	400 Hours (Medicine rotation 8 weeks) (Specialities rotation 4 weeks) 12 weeks clinical rotation (2 hours/week)

AT THE END OF 5TH YEAR MBBS STUDENT WILL BE ABLE TO

- Take a focused history.
- Perform physical examination(s) in order to identify specific problems.
- Perform basic procedures with the consent of the patient, ensuring infection control.
- Medical and dental graduates must continually acquire new scientific knowledge and skills to maintain competence, and incorporate it into their day-to-day medical practice.
- Able to explain basic principles of medicine.
- Graduates should be able to demonstrate Communication Skills, when dealing with patients and their families, nurses, other health professionals, community, the general public and the media.

RULES AND REGULATION

- 75% attendance in theory and clinical classes in mandatory.
- All progress will be recorded on clinical log book.
- Pass marks for assessment will be 50%.
- All this will be creadited in internal assessment for Final Professional.
- Any Conflict will be resolved by Co-Ordinator.
- All students will have to fill online feedback perfroma.

LEARNING RESOURCES

The department of Surgery will require following resources for implementation resources:

- Human resource
- Instructors (faculty members 8)
- Curriculum coordinator curriculum secretary
- Infrastructure
- Lecture hall with AV aids
- Tutorial room with AV aids
- Clinical skills Lab with manikins
- Simulated patients and simulated manikins
- Computers

LISTS OF CONTENT RESOURCES

- Practice of Medicine by Davidson.
- Clinical Medicine by Parveen J Kumar & Michaell, Clark
- Hutchison's Clinical Methods by Michael Swash. 21st edition
- Oxford Text Book of Psychiatry
- ABC of Dermatology. Latest Edition.
- Online Journals and Reading Materials through HEC Digital Library Facility

CLINICAL LOG BOOK AND HISTORY REGISTER

E-LEARNING

- e-IMC phone app for online lectures
- IMC youtube channel

JOURNALS

- The Professional Medical Journal
- Independent Review (H-2000)
- Independent Journal of Allied Health Sciences
- Online Journals and Reading Materials through HEC Digital Library Facility

LEARNING METHODOLOGY

The following teaching / learning methods are used to promote better understanding:

- Interactive Lectures
- Hospital / Clinic visits
- Small Group Discussion
- Case- Based Learning
- Skills session
- E-Learning
- Self-Directed Study

INTERACTIVE LECTURES: In large group, the lecturer introduces a topic or common clinical conditions and Explains the underlying phenomena through questions, pictures, videos of patients' interviews, Exercises, etc. Students are actively involved in the learning process.

SMALL GROUP DISCUSSION (SGD): This format helps students to clarify concepts acquire skills or attitudes. Sessions are structured with the help of specific exercises such as patient case, interviews or discussion topics. Students exchange opinions and apply knowledge gained from lectures, tutorials and self-study. The facilitator role is to ask probing questions, summarize, or rephrase to help clarify concepts.

CASE- BASED LEARNING: A small group discussion format where learning is focused around a series of questions based on a clinical scenario. Students discuss and answer the questions applying relevant knowledge gained in clinical and basic health sciences during the module.

SKILLS SESSION: Skills relevant to respective module are observed and practiced where applicable in skills laboratory or Department of Physiotherapy.

SELF DIRECTED STUDY: Students assume responsibilities of their own learning through individual study, sharing and discussing with peers, seeking information from Learning Resource Center, teachers and resource persons within and outside the college. Students can utilize the time within the college scheduled hours of self-study.

E-LEARNING: E-Learning is a strategy by which learning occurs through the utilization of electronic media, typically the Internet. The basic aspects of medical professionalism and ethics will be addressed through an e-learning course

CLINICAL ROTATION: In small groups, students observe patients with signs and symptoms in hospital orClinical settings. They will have opportunity to practice clinical skills. This helps students to relate knowledge of basic and clinical sciences of the relevant module.

ASSESSMENT

MCQ's and SEQ's

Multiple choice question and short essay question test will be used at the end of part of curriculum to assess the learning of knowledge. These all assessment exercises will be formative. The written tests like Multiple-Choice Questions (MCQs) and Short-Essay Questions (SEQs) test formats are used for the assessment of cognitive domain. The MCQs are more objective and essentially select type of item response format. MCQs have a cueing effect, which promotes guessing and leads to higher scores. In addition, writing MCQs of higher cognitive level of problem solving is challenging. On the contrary, the SEQs are more subjective and have a supply or construct type item response format, which does not have any cueing effect and can effectively assess problem solving skills(8).

OSCE AND SHORT CASE

Short case and OSCE will be used to evaluate clinical skills and procedural skills at the ward end of placement. The OSCE is a method of clinical skill assessment, and it has been reported to be appropriate for assessing learning achievement levels in the psychomotor and emotional domains, which are difficult to evaluate with written examinations(9).

CLINICAL LOG BOOK

Clinical log book is meant for self directed learning (SDL) and assessment of students. The clinical logbook includes reflection which helps the students to set educational goals.

MINI-CEX

Mini-CEX is used to assess the clinical skills and problem solving skills of medical students. This is the tool used by clinical teachers. This can assess all three domains, Pyschomotor, cognitive and affective. This also used as formative assessment.

Evaluation plan		
Each Module	Written test (MCQ and SEQ)	Formative
After 12 weeks of ward placement	Ward test (OSCE and short case)	Formative
At end of 36 weeks	Send up exam (MCQ and SEQ) Viva voce	Formative
Annual	University Professional exam	Summative

INTERNAL ASSESSMENT

i. The weightage of internal assessment shall be 10% of totals marks.
ii. Continuous internal assessment shall consist of evaluation at the end of each assignments, e.g. stages/ sub-stage, class tests etc., attitudinal assessment from educational supervisors.
iii. Assessment of knowledge, Skills and Attitude shall contribute toward internal assessment. Methods used to assess these domains shall include Multiple Choice Questions of one-best type, Short essay questions, Oral/Viva, and Practical/Clinical axaminations.
iv. The score of internal assessment shall contribute to the score in the final examination, Final university examination of each subject shall contribute 90 to total score, and the candidate shall pass in aggregate.
v. Proper record of continuous internal assessment shall be maintained.

LECTURE SCHEDULE 5th Year MBBS SURGERY

No	Date	Topic	Module	Term	Teacher
FIRST TERM					
1		Burns	Module 6		
2		Principles of skin graft and flaps	Module 6		
3		Pilonidal sinus	Module 6		
Test 1 Module 6 & 1 skin and subcutaneous tissue, wounds and surgical infections					
4		Carcinoma tongue and oral cavity lesions	Module 7		
5		Salivary gland swellings	Module 7		
6		Goiter and hyperthyroidism	Module 7		
7		Solitary nodule thyroid and thyroid malignancy	Module 7		
8		Pheochromocytoma and parathyroid diseases	Module 7		
Test 2 Module 7 Head and neck diseases					
9		triple assessment, & Inflammatory disorders of breast	Module 8		
10		Carcinoma breast	Module 8		
11		Management of carcinoma breast	Module 8		
Test 3 Module 8: Breast Diseases					
12		Groin hernia	Module 9		
13		Ventral hernia, Burst abdomen , Incisional hernia	Module 9		
14		Peritonitis	Module 9		
15		Retroperitoneal mass	Module 9		
Test 4 Module 9 abdominal wall and peritoneum					
SECOND TERM					
16		Cholelithiasis	Module 10		
17		Obstructive jaundice	Module 10		
18		Pancreatitis	Module 10		
19		Liver and splenic trauma	Module 10		
Test 5 module 10 hepatobiliary and spleen					
20		Dysphagia & Motility disorders of esophagus	Module 11		
21		Carcinoma esophagus	Module 11		
22		Peptic ulcer disease	Module 11		
23		Carcinoma stomach	Module 11		
24		Small Intestinal Obstruction	Module 11		
25		Appendicular Diseases	Module 11		
26		Inflammatory Bowel Diseases	Module 11		
27		Lower GI bleed	Module 11		
28		Diverticular disease and polyps	Module 11		
29		Colorectal carcinoma	Module 11		
30		Hemorrhoids and anal fissure	Module 11		
31		Perianal fistula and perianal abscess	Module 11		
Test 6 Module 11 Gastrointestinal surgery					
32		Arterial occlusive disease	Module 12		
33		Aneurysmal disease	Module 12		
34		Varicose veins & DVT	Module 12		
35		Diabetic foot infections	Module 12		
Test 7 Module 12 Vascular Diseases					

LECTURE SCHEDULE 5th Year MBBS SURGERY

No	Date	Topic	Module	Term	Teacher
THIRD TERM					
		Urinary calculus disease	Module 13		
		Renal mass	Module 13		
		Hydronephrosis and PUJ	Module 13		
		BOO, Prostatic diseases and Stricture urethra	Module 13		
		Carcinoma Bladder	Module 13		
		Scrotal swellings and testicular tumor	Module 13		
Test 8 module 13 Urological Diseases					
		Intracranial Hematomas	Module 14		
		Brain tumors	Module 14		
		Backache and lumbar disc prolapse	Module 14		
		Anorectal malformations and Hirschsprung's disease	Module 14		
		Undescended testis, testicular torsion	Module 14		
		Hypospadias & Ectopae vesicea	Module 14		
		Pediatrics Hernias	Module 14		
Test 9 module 2, 3, 14 surgical physiology, critical care and neurosurgery, pediatric surgery					
		Head Injury	Module 15		
		Spinal trauma	Module 15		
		Abdominal trauma	Module 15		
		Chest Trauma	Module 15		
		Basic Fracture management	Module 15		
		Upper limb fractures	Module 15		
		Lower limb fractures	Module 15		
		Osteoarthritis and septic arthritis	Module 15		
		Bone tumors	Module 15		
Test 10 module 15,4 & 5 Trauma and Orthopedics, principles of oncology and diagnostics					
Send up 1 & 2					

CLINICAL ROTATION SCHEDULE

Department	Medicine
Class	Fifth Year
Duration of course	12 weeks
Educational hours	400 hours (5.5 hours daily, 33 hours weekly)
Location	Ward, OPD, Tutorial room
Tuitors	Assistant professor, associate Professor, Professor

	Small Group Discussion	ward	% age	Assessment
Week 1	Ethical issues	General Physical Examination	8	Short case SEQ, OSPE
Week 2	GIT and Liver with introduction to abdominal ultrasound and CT	History and examination interpretation of patients with GI and Liver problems	8	Short case SEQ, OSPE
Week 3	CVS with interpretation of ECG and introduction to Echocardiography	History and examination interpretation of patients with Cardiovascular problems	8	Short case SEQ, OSPE
Week 4	Respiratory System with interpretation of chest X ray and introduction to CT Chest	History and examination interpretation of patients with Respiratory problems	8	Short case SEQ, OSPE
Week 5	Neurology and interpretation of CT scan Brain	History and examination interpretation of patients with Neurological problems	10	Short case SEQ, OSPE
Week 6	Rheumatology	History and examination interpretation of patients with Musculoskeletal problems	10	Short case SEQ, OSPE
Week 7	Endocrinology	History and examination interpretation of patients with Endocrine problems	10	Short case SEQ, OSPE
Week 8	Diabetes Mellitus	History and examination interpretation of patients with Diabetes mellitus	10	Short case SEQ, OSPE
Week 9	Nephrology	History and examination interpretation of patients with Kidney problems	8	Short case SEQ, OSPE
Week 10	Psychiatry	History and examination interpretation of patients with Psychiatric issues	8	Short case SEQ, OSPE
Week 11	Dermatology	History and examination interpretation of patients with Skin problems	8	Short case SEQ, OSPE
Week 12	Revision and assessment		4	Short case SEQ, OSPE

Evaluation:

- Attendance of 75% is mandatory
- 15 clinical histories must be completed on history register
- Every Saturday will be formative assessment for course work of that week
- End of course work will be ward test
- Ward test will be OSPE and 2 short cases

MARKING SCHEME FOR FINAL PROFESSIONAL

FINAL PROFESSIONAL MARKING SCHEME				
Theory				
	SEQ	MCQ	Int. Ass	Sub Total
Medicine 1	45	45	25	200
Medicine 2	45	40		
Clinical				
Short case X2 cases	Long case X1 case	OSPE	Int. Ass	Sub total
120	90	65	25	300
				Total: 500

Modules	Objectives	Instructional strategy				Assessment			
		Lecture	Ward	SGD	skill	MCQ	SEQ	OSPE	SC & LC
Module-1: CARDIOLOGY	To explain the Differential Diagnosis of Palpitation.								
	To explain the Differential Diagnosis of breathlessness.								
	To explain the Differential Diagnosis of chest pain.								
	To explain the Differential Diagnosis of raised JVP.								
	To be-able to take history of CVS patient.								
	To perform general physical examination.								
	To perform Inspection, palpation of precordium,								
	To interpret related radiological and laboratory investigations.								
	To prescribe general medication and medicine for CVS diseases.								
	To demonstrate ECG, X-ray, Electroconversion therapy, Echocardiography.								
	To explain pericardial effusion and thrombolytic therapy, heparinisation / anticoagulation therapy and control, anti- platelet therapy, nitrates infusion, digitalization, treatment of acute pulmonary edema, o2 therapy.								
	To explain Cardiac monitoring, Basics of ETT								
Module-2: PULMONOLOGY	To explain the Differential Diagnosis Breathlessness.								
	To explain the Differential Diagnosis Wheezing.								
	To explain the Differential Diagnosis Haemoptysis.								
	To explain the Differential Diagnosis Orthopnoea.								
	To explain the Differential Paroxysmal nocturnal dyspnoea (PND)								
	To explain the Differential Pain in calf on walking.								
	To explain the Differential Undue coldness, redness or blueness of extremities.								
	To explain the Differential Chest pain.								
	To explain the Differential Cough/expectoration/sputum.								
	To perform examiantion of chest.								
	To interpret of related radiological and laboratory investigations and pulmonary function test.								
	To explain O_2 therapy, indications,complications.								
	To discuss pleural aspiration, Endotracheal suction, Pleural biopsy, FNA biopsy, Under water seas aspiration, bronchoscopy.								
	To make plan of management of respiratory failure.								

Modules	Objectives	Instructional strategy				Assessment			
		Lecture	Ward	SGD	Skill	MCQ	SEQ	OSPE	SC & LC
Module-3: DERMATOLOGY	To take adequate clinical history in dermatology.								
	TO perform clinical examination of various skin lesions.								
	To interpret of related radiological and laboratory investigations.								
	To prescribe General medication and Dermatological.								
	To explain scraping for fungus, Use of magnifying glass, Observe skin biopsy, Use of Wood's lamp.								
Module-4: Neurology and Central Nervous System	To take adequate clinical history in CNS dermatology.								
	To perform clinical examination of nervous system.								
	To interpret related radiological and laboratory investigations.								
	To prescribe General and Neurological medication.								
	To explain Lumber puncture.								
Module-5: ALIMENTARY SYSTEM	To take adequate clinical history in vomiting, diarrhoea, pain abdomen, constipation, haematemesis, melena, dyspepsia, distension.								
	To perform clinical examination of GIT.								
	To interpret related radiological and laboratory investigations.								
	To prescribe General and GIT medication.								
	To demonstrate steps of N/G tube passing and feeding.								
	To demonstrate steps of aspiration of peritoneal fluids.								
	To describe endoscopies, upper and lower GIT.								
	To make a preparation plan for patient of GI endoscopies.								

Modules	Objectives	Instructional strategy				Assessment			
		Lecture	Ward	SGD	Skill	MCQ	SEQ	OSPE	SC & LC
Module-6: KIDNEYS AND URINARY SYSTEM	To take adequate clinical history in lumbar pain, anuria, oliguria, hematuria, dysuria,								
	To perform clinical examination of abdomen and lumber area.								
	To interpret related radiological and laboratory investigations.								
	To prescribe General and Urinary tract diseases medication.								
Module-7: ENDOCRINOLOGY	To take adequate clinical history and correlate with a specific diagnosis.								
	To perform clinical examination of thyroid gland, male and female genital organs etc.								
	To interpret of related radiological and laboratory investigations.								
	To prescribe General and endocrinology medication.								
Module 8: RHEUMATOLOGY	To take adequate clinical history and correlate with a specific diagnosis.								
	To perform clinical examination of bones, Joints, Skin and subcutaneous tissue.								
	To interpret of related radiological and laboratory investigations.								
	To prescribe General and rheumatology medication.								
Module 9: METABOLIC DISORDERS	To take adequate clinical history and correlate with a specific diagnosis.								
	To perform clinical examination of bones, Joints, Skin and other organs.								
	To interpret of related radiological and laboratory investigations.								
	To prescribe General and metabolic diseases.								

Modules	Objectives	Instructional strategy				Assessment			
		Lecture	Ward	SGD	Skill	MCQ	SEQ	OSPE	SC & LC
Module-10: INFECTIOUS DISEASES	To take adequate clinical history and correlate with a specific diagnosis.								
	To perform examination and assessment of the pattern of fever, involvement of organ systems and any positive findings.								
	To interpret related radiological and laboratory investigations.								
	To prescribe General and Infectious diseases medication.								
Module-11: HAEMATOLOGY	To take adequate clinical history and correlate with a specific diagnosis.								
	To perform examination pallor, cyanosis, jaundice, clubbing, koilonychia, lymph nodes, edema, pulse, cyanosis, fever, headache, anorexia, weight loss, pain, facial swelling etc.								
	To interpret related radiological and laboratory investigations.								
	To prescribe perform General and Haematology medications.								
	To demonstrate steps of Injection I/V, I/M, S/C, intradermal.								
	To collect samples of blood/blood film preparation.								
	To perform I/V lines/fluids/blood/blood products, direct branula, cutdown, CVP etc.								
	To describe bone marrow aspiration/ trephine.								
Module-12: PSYCHIATRY	To take adequate clinical history and correlate with a specific diagnosis.								
	To do counseling and psychoanalysis especially in patients with suicidal and homicidal attitude.								
	To prescribe General and psychiatry medications.								
	To interpret related radiological and laboratory investigations.								

WEEKLY TIME TABLE FINAL YEAR MBBS 2022

INDEPENDENT MEDICAL COLLEGE

Time	Lecture 08:00-08:45	Clinical Training 08:45-12:00	Clinical Skills 12:00-01:00	NAMAZ BREAK	Lecture 01:15-02:00	Evening Duty 05:00-08:00
Mon	Surgery	Ward			Medicine	Clinical Training
Tue	Medicine	Ward	A1 & A2-Batch		Surgery	Clinical Training
Wed	Gynae & Obs.	Ward	B1 & B2-Batch		Pediatrics	Clinical Training
Thu	Pediatrics	Ward	C1 & C1-Batch		Medical Specialities	Clinical Training
Fri	Gynae & Obs.	08:45-11:15	11:15-12:00			
		Ward	Surgical Specialities			
Sat	08:00-09:00 / Medicine	09:00-10:00 / Surgery	10:00-11:00 / Peadiatrics	11:00-12:00 / O & G	SDL	

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