



INSTRUCTION DIVISION
FIRST SEMESTER 2016-2017
Course Handout (Part - II- B)

Date: 2nd August, 2016

In addition to part I (General Handout for all courses appended to the time table) this portion gives further specific details regarding the course.

Course No. : PHA G614
Course Title : CLINICAL PHARMACY AND THERAPEUTICS
Instructor-in-Charge : R.MAHESH
Practical Assignment* : To be announced

1. Scope and Objective of the Course :

This course is designed to enlighten the students in the field of clinical pharmacy, an emerging area in therapeutics. Basic concepts of clinical pharmacy and its applications, pharmaco-kinetics, laboratory data analysis, drug interactions and adverse drug reactions, therapeutic drug monitoring, development of drug information systems will be covered. Emphasis will also be made on health care management.

2. Text Books (TB):

- a) Roger Walker and Clive Edwards-"Clinical Pharmacy and Therapeutics"-Churchill Livingstone, II Ed., 1999 **or latest edition**
- b) Herfindal, Eric T et al.,-" Clinical Pharmacy and Therapeutics"-Lippincott, IV Ed., 1992 **or latest edition**

3. Reference Books (RB):

- a) Nick Barber and Alan Willson-"Churchill's Clinical Pharmacy Survival Guide"- Churchill Livingstone, I Ed., 1999
- b) Karen J. Tietze-"Clinical skills for Pharmacists- A patient focused approach"-Mosby, Inc., I Ed., 1997
- c) Gopal B Saha-"Fundamentals of Nuclear Pharmacy"-Springer-Verlag, Inc., IV Ed., 1997
- d) Robert G Petersdorf, et al.,-"Harrison's Principles of Internal Medicine"- McGraw-Hill International Book Co., X Ed., 1985.
- e) Richard Ravel-"Clinical Laboratory Medicine"-Mosby, Inc., VI Ed., 1995

2/...





-:2:-

4. Course Plan:

Learning objectives*	Topic	Lectures	Book(s) for Reference
<u>Policy:</u>			
	Practice of clinical pharmacy	1-3	TBb-1; RBa-1-4; RBb-1,3,10
	Clinical trial design	4-6	RBa-5; RBe-1;35,36
	Pharmaco-economics	7-9	TBa-6; RBa-7
<u>Choice of Drugs:</u>			
	OTC prescribing	10,11	RBa-8
	Pain - types and drugs of choice	12,13	RBa-9
	Anti-infectives	14,15	RBa-10
	Parenteral nutrition	16,17	TBa-5; RBa-12
<u>Monitoring:</u>			
	Neonates, Paediatrics, Geriatrics	18-22	TBa-7-9; TBb-1-5
	Clinical Pharmacokinetics	self study -	TBa-1
	Drug interactions	23,24	TBa-2
	Adverse Drug Reactions	25-27	TBa-3; RBa-16
	Laboratory data analysis	28,29	TBa-4; RBb-5; RBe-1
	Prescription monitoring	30-32	RBa-13,17-20; RBb-8
	Patient-case presentation	33-34	RBb-3,4,6
	<u>Therapeutics: –</u>		
	Planning in various disorders	35-36	TBb-10-58; TBb-2-13;
	(selected topics will be discussed in class and others covered through case studies)		RBb-7; RBe-2-33
<u>Clinical Applications of Radio-Pharmaceuticals</u>			
			self reading RBc-3,6,7,13-15; RBe-36

Learning objectives*

Policy: Background, ethics, methods of Phase I, II, III clinical trials, design and analysis, economic prescribing will be discussed.

Choice of Drugs: The use of over-the-counter drugs, their management, detection of symptoms, use of anti-microbial drugs, parenteral nutrition and maintenance, - their drug induced alterations, etc. will be emphasized.

Monitoring: Drug dose calculations in different age groups and their significance, assessment of physical functions, drug-drug and drug-food interactions, patient case presentations, therapeutic drug monitoring of potent drugs are covered. Some of these topics will be covered through case studies and studies on patient case presentations, prescription data analysis separately through the practical component as discussed below.

3/...





-:3:-

Clinical Applications
of Radio-Pharmaceuticals :

Radio-active - tracers / chemicals / pharmaceuticals used as diagnostics and for treatment, their applications in pharmacy.

The Assignment(s) / Practicum experience will be case study, survey based study or situation based study on either some or all of the below mentioned topics. Students may have to collect material from various sources for the same. Details will be intimated through a separate notification or in class.

Assignment(s)* / Practicum experience* (Ref: TBa, TBb, RBb):

Practice of Clinical Pharmacy and ethics	Taking medication histories
Physical assessment skills	Review of laboratory and diagnostic tests
IV drug administration and dosing calculations	Patient case presentation
Therapeutic planning	Monitoring drug therapies
Researching and providing drug information (DIS)	Health care management

5. Evaluation :

COMPONENT	WEIGHTAGE	DURATION	DATE & TIME	REMARKS
1. Test – I*	30	90 min.	as in timetable	CLOSED BOOK
2. Assignment(s)*/ Practicum experience*	30		continuous	-----
3. Compre. Exam.*	40	180 min.	as in timetable	partly CLOSED and /or OPEN BOOK 9/12 AN

MID.- SEM. grading will be done whenever about 30 40 % of the evaluation components are completed.

NOTE :

- * Case studies, interpretation of data and their analysis, will form a part of all evaluation components. Assignments(s) may include seminar presentation and viva.
- * Assignment(s) may be practical / theory oriented for which type-written report in a standard format should be submitted as per deadline(s) that would be announced, therein. It may also include a viva and or a seminar presentation. However all assignments/reports (final, compiled) should be completed and submitted by **25th November, 2016**. It is necessary that all students **stick to time schedule and DO NOT postpone submission** of assignments/reports so as to prevent extra load during last two weeks of class work. Study reports are to be submitted on immediate completion of analysis, as instructed.

4/...





-:4:-

6. Reading Assignments :

Students are advised to read, collect additional information on the above mentioned topics as per given schedule. Revision of basic principles of anatomy, physiology and pharmacology including medicinal chemistry is necessary for case study related analysis and interpretation.

7. Chamber consultation hours : (2243- G) ; To be announced in class.

8. Notices : Notices concerning the course will be displayed on the Pha. Group N.B. only.

9. Make-Ups :

Make-Ups are not given as a routine. It is solely dependant upon the GENUINENESS OF THE CIRCUMSTANCES under which a student fails to appear in a scheduled evaluation component. In such circumstances, prior permission should be obtained from the Instructor-in-Charge. IN NO CASE THE MAKE-UP APPLICATION BE SLIPPED INSIDE THE CHAMBER OF THE INSTRUCTOR-IN-CHARGE. The decision of the Instructor-in-Charge in the above matter will be final.

**Instructor - in -Charge
PHA G614**



Please Consider Your Environmental Responsibilities
Do Not Print Unless Necessary

