

LESSON PLAN DIPLOMA IN PHARMACY 1ST YEAR

Name of the Faculty		Mr. Vishal Saini		
Discipline		D. Pharmacy		
Year		Ist year		
Subject		Pharmaceutics		
Lesson Plan Duration		75 Hours (2 Dec 2024 to 30 June 2025)		
Work Load/week(In hour)		Lecture- 03; Practical- 03		
Week		Theory	Practical	
	Lecture Day	Topic/test	Practical day	Topic
1st	1st	History of the profession of Pharmacy in India in relation to Pharmacy education, industry, pharmacy practice, and various professional associations.	1st	To study the official pharmacopeias, formularies with their handling and official references.
	2nd	industry, pharmacy practice, and various professional associations		
	3rd	Pharmacy as a career,		
2nd	1st	Pharmacopoeia: Introduction to IP, BP, USP, NF and Extra Pharmacopoeia.	2nd	To prepare and submit liquid oral simple syrup
	2nd	Salient features of Indian Pharmacopoeia		
	3rd	Test of chapter-1		
3rd	1st	Packaging materials: Types, selection criteria	3rd	To prepare and submit castor oil emulsion
	2nd	advantages and disadvantages of glass, plastic		
	3rd	advantages and disadvantages of metal, rubber		
4th	1st	Pharmaceutical aids-Introduction, organoleptic properties- coloring.	4th	To prepare and submit cod liver oil emulsion
	2nd	Organoleptic properties- sweetening and flavouring agent.		
	3rd	Preservatives		
5th	1st	Size reduction- definition, hammer mill and ball mill.	5th	To prepare and submit calamine lotion
	2nd	Size separation, classification of powder according to IP		
	3rd	Cyclone separator		
6th	1st	Sieves and standards of sieves	6th	To prepare and submit simple ointment base.
	2nd	Revision		
	3rd	Test		
7th	1st	Mixing – double cone blender, turbine mixer	7th	To formulate and submit sulphur ointment
	2nd	Triple roller mill and		

		silversonmixer homogenizer.		
	3rd	Assignment		
8th	1st	Filtration- theory of filtration,	8 th	To formulate and submit cetrimide cream
	2nd	Membrane filtration, sintered glass filter		
	3rd	Drying		
9th	1st	Tablets- basics of tablet formation	9 th	To prepare and submit sodium alginate gel
	2nd	Coated and uncoated		
	3rd	Various modified tablets- sustained release		
10th	1st	1 st Sessional Examination	10 th	
	2nd	Extended, fast dissolving tablets	11 th	To prepare and submit turpentine liniment
	3rd	Multilayered		
11th	1st	Revision		
	2nd	Capsules- introduction	12 th	To prepare effervescent powder granules
	3rd	Hard gelatin capsule		
12th	1st	Soft gelatin capsules		
	2nd	Revision	13 th	To prepare and submit simple dusting powder
	3rd	Liquid oral preparations- introduction		
13th	1st	solutions		
	2nd	Syrups and elixirs	14 th	To prepare and submit sterile injection of normal saline
	3rd	Emulsion		
14 th	1st	Suspensions		
	2nd	Dry powder for reconstitution	15 th	To prepare and submit calcium gluconate injection
		Revision		
15 th	1st	Test		
	2nd	Topical preparation- intro and Ointment introduction	16 th	To prepare and submit paracetamol tablet
	3rd	Ointment- types and bases		
16 th	1st	Creams		
	2nd	Paste	17 th	To formulate and submit cold cream
	3rd	Gels		
17 th	1st	Liniments and lotion		
	2nd	2 nd Sessional Examination		

	3rd	Suppositories	19 th	To prepare and submit shampoo
18 th	1st	Pessaries		
	2nd	Nasal preparations		
	3rd	Eye preparations	20 th	To prepare and submit lotion
19 th	1st	Powders and granules- introduction and insufflations		
	2nd	Dusting powders, effervescent powders		
	3rd	Effervescent granules	21 st	To prepare and submit toothpaste
20 th	1st	Sterile formulations- introduction, injectables		
	2nd	Eye drops		
	3rd	Eye ointments	22 nd	To demonstrate various stages of tablet manufacturing processes
21 st	1st	Immunological products- Introduction		
	2nd	Sera and their manufacturing method		
	3rd	Vaccines and their manufacturing method	23 rd	To study the method of usage and storage of inhalers
22 nd	1st	Toxoids and their manufacturing method		
	2nd	Assignments		
	3rd	Revision	24 th	To study the method of usage and storage of spacers
23 rd	1st	Quality control and assurance –definition, concepts		
	2nd	Current cGMP		
	3rd	Introduction to the concept of calibration	25 th	To study the method of usage and storage of insulin pens
24 th	1st	Introduction to the concept of validation		
	2nd	Novel drug delivery systems- introduction,		
	3rd	Classification of NDDS	26 th	To demonstrate quality control test and evaluation of tablets
25 th	1st	Advantages and challenges		
	2nd	3 rd Sessional Examination	28 th	
	3rd	Revision	29 th	To demonstrate quality control test and evaluation of emulsion

LESSON PLAN

Name of the Faculty		Mrs. Shashi		
Discipline		D. Pharmacy		
Year		Ist year		
Subject		Pharmaceutical Chemistry		
Lesson Plan Duration		75 Hours (2 Dec 2024 to 30 June 2025)		
Work Load/week(In hour)		Lecture- 03; Practical- 03		
Week		Theory		Practical
	Lecture Day	Topic/test	Practical Day	Topic
1st	1st	Introduction to pharmaceutical chemistry	1st	To perform the limit test for Chlorides
	2nd	Scope and objectives		
	3rd	Sources and types of error		
2nd	1st	Sources and types of error	2nd	To perform the limit test for Sulphate
	2nd	Impurities in pharmaceuticals		
	3rd	Impurities in pharmaceuticals		
3rd	1st	Impurities in pharmaceuticals	3rd	To perform the limit test for Iron
	2nd	Impurities in pharmaceuticals		
	3rd	Volumetric analysis		
4th	1st	Volumetric analysis	4th	To perform the limit test for Heavy metals
	2nd	Volumetric analysis		
	3rd	Volumetric analysis		
5th	1st	Gravimetric analysis-principle	5th	To perform the identification tests for Anions and Cations as per IP
	2nd	Method of gravimetric analysis		
	3rd	Inorganic pharmaceuticals-haematinics		
6th	1st	Haematinics	6th	To prepare and standardize sodium hydroxide solution
	2nd	Gastrointestinal agents		
	3rd	Gastrointestinal agents		
7th	1st	Topical agents	7th	To prepare and standardize potassium permanganate
	2nd	Dental products		
	3rd	Medicinal gases		
8th	1st	Introduction to nomenclature	8th	To perform assay of ferrous sulphate by redox titration
	2nd	Introduction to nomenclature		
	3rd	Anaesthetics		
9th	1st	Sedative and hypnotics	9th	Viva voce
	2nd	Antipsychotics		
	3rd	Antipsychotics		

10 th	1 st	Sessional	10 th	
	2 nd	Anticonvulsants	11 th	To perform assay of Calcium gluconate by complexometric titration
	3 rd	Anticonvulsants		
11 th	1 st	Antidepressants	12 th	To perform assay of sodium chloride by modified volhard's method
	2 nd	Antidepressants		
	3 rd	Sympathomimetic drugs		
12 th	1 st	Sympathomimetic drugs	13 th	To perform assay of Ascorbic acid by iodimetry
	2 nd	Adrenergic antagonists		
	3 rd	Adrenergic antagonists		
13 th	1 st	Cholinergic drugs	14 th	To perform the assay of Ibuprofen by alkalimetry
	2 nd	Cholinergic drugs		
	3 rd	Cholinergic drugs		
14 th	1 st	Cholinergic blocking agents	15 th	To determine melting point and boiling point of prepared organic compounds
	2 nd	Cholinergic blocking agents		
		Antiarrhythmic drugs		
15 th	1 st	Antiarrhythmic drugs	16 th	File checking
	2 nd	Antihypertensive drugs		
	3 rd	Antihypertensive drugs		
16 th	1 st	Revision	17 th	Viva voce
	2 nd	Test		
	3 rd	Anti-anginal agents		
17 th	1 st	Diuretics	18 th	
	2 nd	Sessional		
	3 rd	Diuretics		
18 th	1 st	Hypoglycemic agents	19 th	To synthesize benzoic acid from benzamide
	2 nd	Hypoglycemic agents		
	3 rd	Hypoglycemic agents		
19 th	1 st	Analgesics, anti-inflammatory agents	20 th	To prepare picric acid from phenol
	2 nd	NSAIDs		
	3 rd	Anti-fungal agents		
20 th	1 st	Revision	21 st	To perform test of identification and purity for aspirin
	2 nd	Test		
	3 rd	Urinary tract anti-infective agents		
21 st	1 st	Anti-tubercular drugs	22 nd	To perform test of identification and purity for caffeine
	2 nd	Antiviral agents		
	3 rd	Anti-malarial drugs		
22 nd	1 st	Anti-malarial drugs	23 rd	Viva voce
	2 nd	Sulphonamides		
	3 rd	Antibiotics		
23 rd	1 st	Tetracyclines	24 th	To perform test of identification and purity for paracetamol
	2 nd	Revision		
	3 rd	Macrolides		
24 th	1 st	Miscellaneous	25 th	To perform test of identification and purity

	2nd	Anti-neoplastic agents		for sulfanilamide
	3rd	Anti-neoplastic agents	26 th	To perform systematic qualitative analysis of unknown substances
25 th	1st	Anti-neoplastic agents		
	2nd	3 rd Sessional		
	3rd	Revision		

LESSON PLAN

Name of the Faculty	Mrs. Sneha Singh
Discipline	D. Pharmacy
Year	I year
Subject	Social Pharmacy
Lesson Plan Duration	75 Hours (2 Dec 2024 to 30 June 2025)
Work Load/week(In hour)	Lecture- 03; Practical- 03

Week		Theory		Practical
	Lecture Day	Topic/test	Practical Day	Topic
	1 st	Introduction to social pharmacy	1 st	To study the national immunization schedule for children and adult
1 st	2 nd	Definition, scope and role of pharmacist in public health		
	3 rd	Concept of health, who-definition and various dimensions		
	1 st	Determinants and health indicators	2 nd	To study the vaccines not included in the national immunization schedules
2 nd	2 nd	National health policy		
	3 rd	Public and private health system		
	1 st	National health mission	3 rd	File check and viva
3 rd	2 nd	Introduction to development goals		
	3 rd	Revision		
	1 st	Demography	4 th	To study about reproductive and child health in regards to nutritional aspects and relevant national health programmes
4 th	2 nd	Family planning		
	3 rd	Methods of family planning		
	1 st	Mother and child health, importance of breast feeding	5 th	To study family planning devices
5 th	2 nd	Effects of infant milk substitute and bottle feeding		
	3 rd	Overview of vaccines		
	1 st	Types of immunity	6 th	To perform microscopical observation of different microbes using readymade slides
6 th	2 nd	Immunization		
	3 rd	Effects of environment on health- introduction		
	1 st	Water pollution and Water borne disease	7 th	To study oral health and hygiene
7 th	2 nd	Air pollution		
	3 rd	Noise pollution		
	1 st	Sevage and solid waste disposal	8 th	To study personal hygiene and etiquettes
8 th	2 nd	Occupational illness		
	3 rd	Environmental pollution due to pharmaceuticals		
	1 st	Assignment	9 th	To study about the use and

9 th	2 nd	Revision		disposal of various types of masks, PPE gear
	3 rd	Test		
	1 st	Sessional Examination	10 th	1 st Sessional Examination
10 th	2 nd	Drugs of misuse and abuse psychotropics, narcotics, alcohol and tobacco products.	11 th	To study the various products used in menstrual hygiene
	3 rd	Social impacts of these habits on social health		
	1 st	Revision		
11 th	2 nd	Basics of nutrition	12 th	To study the theory, basics, demonstrations of first aid for emergency diseases
	3 rd	micronutrients		
	1 st	Macronutrients		
12 th	2 nd	Importance of water and fibres in diet	13 th	To study the emergency treatment for all medical emergency cases
	3 rd	Balance diet, malnutrition		
	1 st	Nutrition deficiency diseases, ill effects of junk food		
13 th	2 nd	Calorific and nutritive value of various food, fortification of food	14 th	To learn the role of pharmacist and disaster management
	3 rd	Introduction to food safety		
	1 st	Dietary supplement, nutraceuticals		
14 th	2 nd	Food supplements and drug food interactions	15 th	To observe the marketed preparations of disinfectants, antiseptics, fumigating agents, antilarval agents and mosquito repellants
		Introduction to microbiology and common microorganisms		
	1 st	Introduction to microbiology and common microorganisms		
15 th	2 nd	Introduction to microbiology and common microorganisms	16 th	To study water purification techniques using water testing kit
	3 rd	Introduction to epidermiology and its applications		
	1 st	Understanding of terms		
16 th	2 nd	Revision	17 th	To stimulate the counseling of children on junk food and balance diet using information education and communication
	3 rd	test		
	1 st	Respiratory infections		
17 th	2 nd	Sessional Examination	18 th	2 nd Sessional Examination
	3 rd	Respiratory infections	19 th	To prepare charts on nutrition and its sources
	1 st	Respiratory infections		
18 th	2 nd	Respiratory infections	20 th	To prepare the calculatory chart of caloric needs of

	3rd	Intestinal infection		different age groups
	1st	Intestinal infection		
19 th	2nd	Intestinal infection		
	3rd	Intestinal infection	21 st	To prepare chart of glycemic index of foods
	1st	Arthropod borne infections		
20 th	2nd	Arthropod borne infections		
	3rd	Arthropod borne infections	22 nd	To identify various tobacco products through charts and pictures
	1st	Arthropod borne infections		
21 st	2nd	Surface infections		
	3rd	Surface infections	23 rd	To study about tobacco cessation and counseling
	1st	STDs		
22 nd	2nd	STDs		
	3rd	STDs	24 th	Viva-voice
	1st	Introduction to health systems		
23 rd	2nd	Introduction to health systems		
	3rd	National health programmes	25 th	File check
	1st	National health programmes		
24 th	2nd	Pharmacoeconomics-introduction		
	3rd	Basic terms and importance	26 th	Viva Voice
	1st	Revision		
25 th	2nd	3 rd Sessional		
	3rd	Revision		

LESSON PLAN

Name of the Faculty		Mr. KetanJeet		
Discipline		D. Pharmacy		
Year		Ist year		
Subject		Pharmacognosy		
Lesson PlanDuration		75 Hours (2 Dec 2024 to 30 June 2025)		
Work Load/week(In hour)		Lecture- 03; Practical- 03		
Week		Theory		Practical
	Lecture Day	Topic/test	Practical Day	Topic
	1 st	Definitions, history and scope	1 st	To perform morphological identification of ispaghula, senna.
1 st	2 nd	Definitions, History and scope		
	3 rd	Test		
	1 st	Classification of drugs	2 nd	To perform morphological identification of corriander, fennel
2 nd	2 nd	Alphabetical and taxonimal		
	3 rd	Morphological and pharmacological	3 rd	File check and viva
	1 st	Chemical and chemotaxonomical		
3 rd	2 nd	Quality control of crude drugs- introduction		
	3 rd	Adulteration of crude drugs- introduction		
	1 st	Methods of adulteration	4 th	To perform morphological identification of cardamom, ginger
4 th	2 nd	Evaluation of crude drugs		
	3 rd	Evaluation of crude drugs	5 th	Viva-voice
	1 st	Alkaloids		
5 th	2 nd	Terpenoids		
	3 rd	Glycosides	6 th	To perform morphological identification of nutmeg, blackpepper
	1 st	Volatile oil		
6 th	2 nd	Tannins		
	3 rd	Resins	7 th	To perform morphological identification of clove, rauwolfia.
	1 st	Revision		
7 th	2 nd	Test		
	3 rd	Laxatives	8 th	Viva voice
	1 st	Cardiotonic		
8 th	2 nd	Carminative and GI regulators		
	3 rd	Carminative and GI regulators	9 th	To perform morphological identification of gokhru, punarnava.
	1 st	Astringents		
9 th	2 nd	Drugs acting on nervous system		
	3 rd	Revision	10 th	1 st Sessional Examination
	1 st	Sessional Examination		
10 th	2 nd	Drugs acting on nervous system	11 th	To perform morphological identification of cinchona, agar
	3 rd	Antihypertensive		
	1 st	Antitussive		

11 th	2 nd	Antirheumatics	12 th	To perform morphological identification of cinchona, agar
	3 rd	Antitumour		
	1 st	Anti-diabetics		
12 th	2 nd	Diuretics	13 th	To perform anatomical studies (transverse section) of ajwain, datura, cinnamon
	3 rd	Antiseptics and disinfectants		
	1 st	Revision		
13 th	2 nd	Test	14 th	To perform anatomical studies (transverse section) of ajwain, datura, cinnamon
	3 rd	Anti-malarials		
	1 st	Oxytocic		
14 th	2 nd	Vitamins	15 th	Viva-voce
		Enzymes		
	1 st	Pharmaceutical aids		
15 th	2 nd	Pharmaceutical aids	16 th	To perform anatomical studies (transverse section) of cinchona, coriander, ashwagandha
	3 rd	Pharmaceutical aids		
	1 st	Miscellaneous		
16 th	2 nd	Miscellaneous	17 th	To perform anatomical studies (transverse section) of cinchona, coriander, ashwagandha
	3 rd	Revision		
	1 st	Test		
17 th	2 nd	Sessional Examination	18 th	2 nd Sessional Examination
	3 rd	Surgical dressings-cotton, silk	19 th	To perform anatomical studies (transverse section) of liquorice, clove
	1 st	Wool and regenerated fibres		
18 th	2 nd	Surgical catgut and ligatures	20 th	To perform anatomical studies (transverse section) of liquorice, clove
	3 rd	Traditional system of medicines-introduction		
	1 st	Ayurveda, siddha		
19 th	2 nd	Unani and homeopathy	21 st	To perform anatomical studies (transverse section) of curcuma, nux-vomica, vasaka
	3 rd	Methods of preparation of arista, ashwa and gutika		
	1 st	Taila, churna, lehya and bhasma		
20 th	2 nd	Role of medicinal plants in national economy and their export potential	22 nd	To perform anatomical studies (transverse section) of curcuma, nux-vomica, vasaka
	3 rd	Role of aromatic plants in national economy and their export potential		
	1 st	Introduction and therapeutic application – neutraceuticals, antioxidants		

21 st	2 nd	Probiotic, prebiotics and dietary fibres		
	3 rd	Omega-3 fatty acids, spirulina	23 rd	To perform physical and chemical test for evaluation for asafoetida, castor oil
	1 st	Carotenoids, soya and garlic		
22 nd	2 nd	Revision		
	3 rd	Introduction to herbal formulations	24 th	Viva-voice
	1 st	Introduction to herbal formulations		
23 rd	2 nd	Introduction to herbal formulations		
	3 rd	Herbal cosmetics- introduction	25 th	To perform physical and chemical test for evaluation for agar, guar gum
	1 st	Alovera gel, almond oil		
24 th	2 nd	Lavender oil, olive oil		
	3 rd	Rosemary oil, sandalwood oil	26 th	Viva Voice
	1 st	Phytochemical investigation of drugs		
25 th	2 nd	Phytochemical investigation of drugs		
	3 rd	3 rd Sessional		

LESSON PLAN

Name of the Faculty		Mrs. Jyoti Yadav		
Discipline		D. Pharmacy		
Year		Ist year		
Subject		HAP		
Lesson Plan Duration		75 Hours (2 Dec 2024 to 30 June 2025)		
Work Load/week(In hour)		Lecture- 03; Practical- 03		
Week		Theory		Practical
	Lecture Day	Topic/test	Practical Day	Topic
1st	1st	Scope of anatomy	1st	Study of microscope
	2nd	Definition of various terms		
	3rd	Structure of cell		
2nd	1st	Function and its composition	2nd	To perform general techniques for blood collection
	2nd	Brief introduction mitochondria and microsomes		
	3rd	Introduction to tissue		
3rd	1st	Classification of tissue	3rd	To perform microscopic examination of epithelial tissues, cardiac muscles, smooth muscles of pre prepared slides
	2nd	Epithelial tissue		
	3rd	Muscular tissue		
4th	1st	Muscular tissue	4th	To perform microscopic examination of epithelial tissues, cardiac muscles, smooth muscles of pre prepared slides
	2nd	Connective tissue		
	3rd	Connective tissue		
5th	1st	Nervous tissue	5th	Viva-voice
	2nd	Nervous tissue		
	3rd	Structure of skeleton system		
6th	1st	Structure of skeleton system	6th	To perform microscopic examination of skeletal muscles, connective tissues and nervous tissues of pre prepared slides
	2nd	Function of skeleton system		
	3rd	Function of skeleton system		
7th	1st	Introduction to joints	7th	Viva-voice
	2nd	Function of joints		
	3rd	Introduction to joints		
8th	1st	Function of joints	8th	To study the human skeletal
	2nd	Joint disorder		
	3rd	Joint disorder		
9th	1st	Introduction to blood	9th	Viva-voice
	2nd	Function of blood		
	3rd	Revision		
10th	1st	Sessional Examination	10th	1st Sessional Examination
	2nd	Blood coagulation	11th	To determine blood group, ESR.
	3rd	Blood coagulation		
11th	1st	Blood coagulation		

	2 nd	Disorder of blood	12 th	Viva-voice
	3 rd	Name and function of lymphatic system		
12 th	1 st	Name and function of lymphatic system		
	2 nd	Structure and function of heart	13 th	To determine haemoglobin content of blood.
	3 rd	Structure and function of heart		
13 th	1 st	Introduction to blood Pressure		
	2 nd	Various parts of respiratory System	14 th	To determine bleeding time clotting time
	3 rd	Function of respiratory System		
14 th	1 st	Physiology of respiration		
	2 nd	Various parts of urinary System	15 th	Viva-voce
		Structure and function of urinary system		
15 th	1 st	Introduction to edema		
	2 nd	Structure of skeletal muscle	16 th	To determine WBC count of blood
	3 rd	Name of attachments and their functions		
16 th	1 st	Name of attachments and their functions		
	2 nd	Name and position of various muscles	17 th	To determine RBC count of blood
	3 rd	physiology of various neuromuscular junctions		
17 th	1 st	physiology of various neuromuscular junctions		
	2 nd	Sessional Examination	18 th	2 nd Sessional Examination
	3 rd	CNS	19 th	To determine and evaluate differential count of blood
18 th	1 st	CNS		
	2 nd	Brain and its parts		
	3 rd	Function and reflex action	20 th	To record the pressure of blood in various postures
19 th	1 st	ANS		
	2 nd	Function and reflex action		
	3 rd	ANS	21 st	To record body temperature, pulse rate, heart rate and respiratory rate
20 th	1 st	Introduction to tongue		
	2 nd	Introduction to tongue		
	3 rd	Smell,ear	22 nd	To record pulse oxygen (before and after exertion)
21 st	1 st	Smell,ear		
	2 nd	Eye and skin physiology of Pain		
	3 rd	Introduction to digestive System	23 rd	To record force of expelled air using peak flow meter
22 nd	1 st	Function of digestive system		
	2 nd	Structure and function of Liver		
	3 rd	Structure and function of Liver	24 th	To measure the height, weight and BMI of the body
23 rd	1 st	Physiology of digestion		
	2 nd	Endocrine glands		

	3rd	Endocrine glands	25 th	To study the various system and organs using chart, models and specimens
24 th	1st	Location of Endocrine crine gland		
	2nd	Their functions		
	3rd	Reproductive system	26 th	Viva-voice
25 th	1st	Reproductive system		
	2nd	Reproductive system		
	3rd	3 rd Sessional		

LESSON PLAN DIPLOMA IN PHARMACY 2nd YEAR

Performa : Jhankar College of Pharmacy				
Lesson Plan				
Name of the faculty	Sneha Singh			
Discipline	Pharmacy			
Semester	2 nd Year			
Subject	Pharmacotherapeutics			
Lesson plan Duration	75 Hours (20 Aug 2024 to 30 June 2025)			
Work Load/week(In hour)	Lecture- 03; Practical- 03			
Week	Theory		Practical	
	Lecture Day	Topic	Practical	Topic
1 st	1 st	Pharmacotherapeutics – Introduction, scope, and objectives	1 st	To study the Preparation and discussion of SOAP on Hypertension
	2 nd	Rational use of Medicines	2 nd	----do----
	3 rd	Evidence Based Medicine	3 rd	----do----
2 nd	1 st	Essential Medicines List	1 st	To study the Preparation and discussion of SOAP on Angina Pectoris.
	2 nd	Standard Treatment Guidelines (STGs)	2 nd	----do----
	3 rd	Revision	3 rd	----do----
3 rd	1 st	Cardiovascular System – Hypertension- Definition, Etiopathogenesis	1 st	To study the Preparation and discussion of SOAP on Myocardial infraction
	2 nd	Hypertension- Clinical manifestations, Management of theDiseases	2 nd	----do----
	3 rd	Angina and Myocardial infarction- Definition, Etiopathogenesis	3 rd	----do----
4 th	1 st	Angina and Myocardial infarction- Clinical manifestations, Management of theDiseases	1 st	Viva voca
	2 nd	Hyperlipidaemia- Definition, Etiopathogenesis	2 nd	----do----
	3 rd	Hyperlipidaemia- Clinical manifestations, Management of theDiseases	3 rd	----do----
5 th	1 st	Congestive Heart Failure- Definition, Etiopathogenesis	1 st	To study the Preparation and discussion of SOAP onHyperlipidemia
	2 nd	Congestive Heart Failure- Clinical manifestations, Management of theDiseases	2 nd	----do----

	3 rd	Revision	3 rd	----do----
6 th	1 st	Respiratory System- Asthma- Definition, Etiopathogenesis	1 st	To study the Preparation and discussion of SOAP on Rheumatoid Arthritis
	2 nd	Asthma- Clinical manifestations, Management of theDiseases	2 nd	----do----
	3 rd	COPD- Definition, Etiopathogenesis	3 rd	----do----
7 th	1 st	COPD- Clinical manifestations, Management of thediseases	1 st	To study the Preparation and discussion of SOAP onAsthma
	2 nd	Endocrine System Diabetes- Definition, Etiopathogenesis	2 nd	----do----
	3 rd	Diabetes- Clinical manifestations, Management of theDiseases	3 rd	----do----
8 th	1 st	Hypothyroidism- Definition, Etiopathogenesis, Clinical manifestations, Management of theDiseases	1 st	Viva Voca
	2 nd	Hyperthyroidism- Definition, Etiopathogenesis, Clinical manifestations, Management of theDiseases	2 nd	----do----
	3 rd	Revision	3 rd	----do----
9 th	1 st	Central Nervous System- Epilepsy- Definition, Etiopathogenesis	1 st	To study the Preparation and discussion of SOAP onCOPD
	2 nd	Epilepsy-, Clinical manifestations, Management of theDiseases	2 nd	----do----
	3 rd	Parkinson's disease- Definition, Etiopathogenesis	3 rd	----do----
10 th	1 st	Parkinson's disease-, Clinical manifestations, Management of theDiseases	1 st	To study the Preparation and discussion of SOAP onDiabetes
	2 nd	Alzheimer's disease- Definition, Etiopathogenesis, Clinical manifestations, Management of theDiseases	2 nd	----do----
	3 rd	Stroke- Definition, Etiopathogenesis, Clinical manifestations, Management of theDiseases	3 rd	----do----
11 th	1 st	Migraine- Definition, Etiopathogenesis, Clinical manifestations, Management of theDiseases	1 st	To study the Preparation and discussion of SOAP onEpilepsy
	2 nd	Revision	2 nd	----do----
	3 rd	Gastro oesophageal reflux	3 rd	----do----

		disease- Definition, Etiopathogenesis		
12 th	1 st	Gastro oesophageal reflux disease- Clinical manifestations, Management of theDiseases	1 st	To study the Preparation and discussion of SOAP on Stroke
	2 nd	Peptic Ulcer Disease- Definition, Etiopathogenesis	2 nd	----do----
	3 rd	Peptic Ulcer Disease- Clinical manifestations, Management of theDiseases	3 rd	----do----
13 th	1 st	Alcoholic liver disease- Definition, Etiopathogenesis	1 st	To study the Preparation and discussion of SOAP onDepression
	2 nd	Alcoholic liver disease- Clinical manifestations, Management of theDiseases	3 rd	----do----
	3 rd	Inflammatory Bowel Diseases- Definition, Etiopathogenesis		----do----
14 th	1 st	Inflammatory Bowel Diseases- Clinical manifestations, Management of theDiseases	1 st	To study the Preparation and discussion of SOAP onTuberculosis
	2 nd	Revision	2 nd	----do----
	3 rd	Iron deficiency anaemia- Etiopathogenesis	3 rd	----do----
15 th	1 st	Iron deficiency anaemia- Clinical manifestations, Management	1 st	To study the Preparation and discussion of SOAP onAnemia
	2 nd	Iron deficiency anaemia- Etiopathogenesis	2 nd	----do----
	3 rd	Iron deficiency anaemia- Clinical manifestations, Management	3 rd	----do----
16 th	1 st	Tuberculosis	1 st	Viva voce
	2 nd	Pneumonia	2 nd	----do----
	3 rd	Urinary tract infections	3 rd	----do----
17 th	1 st	Hepatitis	1 st	To study the Preparation and discussion of SOAP onConjunctivitis viral infection
	2 nd	Gonorrhoea and Syphilis	2 nd	----do----
	3 rd	Malaria	3 rd	----do----
18 th	1 st	Malaria	1 st	To study the Preparation and discussion of SOAP on Psoriasis
	2 nd	HIV and Opportunistic infections	2 nd	----do----
	3 rd	Viral Infections (SARS, CoV2)	3 rd	----do----

19 th	1 st	Revision	1 st	Viva voce
	2 nd	Rheumatoid arthritis	2 nd	----do----
	3 rd	Osteoarthritis	3 rd	----do----
20 th	1 st	Osteoarthritis- Definition, Etiopathogenesis, Clinical manifestations, Management	1 st	To perform the study of medication condition, life style modification, monitoring parameters and maintaining documentation of patient counselling on Rheumatoid Arthritis
	2 nd	Psoriasis- Definition, Etiopathogenesis, Clinical manifestations, Management	2 nd	----do----
	3 rd	Scabies- Definition, Etiopathogenesis, Clinical manifestations, Management	3 rd	----do----
21 st	1 st	Eczema- Definition, Etiopathogenesis, Clinical manifestations, Management	1 st	To perform the study of medication condition, life style modification, monitoring parameters and maintaining documentation of patient counselling on Hypertension
	2 nd	Psychiatric Disorders- Depression, Definition, Etiopathogenesis, Clinical manifestations, Management	2 nd	----do----
	3 rd	Anxiety- Definition, Etiopathogenesis, Clinical manifestations, Management	3 rd	----do----
22 nd	1 st	Psychosis- Definition, Etiopathogenesis, Clinical manifestations, Management	1 st	To perform the study of medication condition, life style modification, monitoring parameters and maintaining documentation of patient counselling on Asthma
	2 nd	Psychosis- Definition, Etiopathogenesis, Clinical manifestations, Management	2 nd	----do----
	3 rd	Revision	3 rd	----do----
23 rd	1 st	Conjunctivitis (bacterial and)- Definition, Etiopathogenesis, Clinical manifestations, Management	1 st	To perform the study of medication condition, life style modification, monitoring parameters and maintaining documentation of patient counselling on Stroke
	2 nd	Conjunctivitis (viral)- Definition, Etiopathogenesis, Clinical manifestations, Management	2 nd	----do----
	3 rd	Glaucoma- Definition, Etiopathogenesis, Clinical manifestations, Management	3 rd	----do----

24 th	1 st	Anti-microbial Resistance	1 st	To perform the study of medication condition, life style modification, monitoring parameters and maintaining documentation of patient counselling on Tuberculosis
	2 nd	Anti-microbial Resistance	2 nd	----do----
	3 rd	Polycystic Ovary Syndrome- Definition, Etiopathogenesis, Clinical manifestations, Management	3 rd	----do----
25 th	1 st	Dysmenorrhe- Definition, Etiopathogenesis, Clinical manifestations, Management a	1 st	To performed the dose calculation for the paediatrics and geriatric patient.
	2 nd	Premenstrual Syndrome- Definition, Etiopathogenesis, Clinical manifestations, Management	2 nd	----do----
	3 rd	Revision	3 rd	----do----

Lesson Plan				
Name of the faculty		Shashi		
Discipline		Pharmacy		
Semester		2 nd Year		
Subject		Biochemistry and Clinical Pathology		
Lesson plan Duration		75 Hours (20 Aug 2024 to 30 June 2025)		
Work Load/week(In hour)		Lecture- 03; Practical- 09 Hrs		
Week	Theory		Practical	
	Lecture Day	Topic	Practical Day	Topic
1 st	1 st	Introduction to biochemistry: Scope of biochemistry in Pharmacy	1 st	1 st
	2 nd	Cell and its biochemical organization.	2 nd	2 nd
	3 rd	Carbohydrates-Definition, classification with examples, chemical Properties	3 rd	3 rd
2 nd	1 st	Monosaccharides - Structure of glucose, fructose, and galactose	1 st	1 st
	2 nd	Disaccharides - structure of maltose, lactose, and Sucrose	2 nd	2 nd

	3 rd	Polysaccharides - chemical nature of starch and Glycogen	3 rd	3 rd
3 rd	1 st	Qualitative tests and biological role of carbohydrates	1 st	1 st
	2 nd	Proteins-Definition, classification of proteins based on composition and solubility with examples	2 nd	2 nd
	3 rd	Definition, classification of amino acids based on chemical nature and nutritional requirements with examples	3 rd	3 rd
4 th	1 st	Structure of proteins (four levels of organization of protein structure)	1 st	1 st
	2 nd	Qualitative tests and biological role of proteins and amino acids	2 nd	2 nd
	3 rd	Diseases related to malnutrition of proteins.	3 rd	3 rd
5 th	1 st	Class Test	1 st	1 st
	2 nd	Lipids- Definition, classification with examples	2 nd	2 nd
	3 rd	Structure and properties of triglycerides (oils and fats)	3 rd	3 rd
6 th	1 st	Fatty acid classification - Based on chemical and nutritional requirements with Examples	1 st	1 st
	2 nd	Structure and functions of cholesterol in the body	2 nd	2 nd
	3 rd	Lipoproteins - types, composition and functions in the Body	3 rd	3 rd
7 th	1 st	Qualitative tests and functions of lipids	1 st	1 st
	2 nd	Nucleic acids-Definition, purine and pyrimidine bases	2 nd	2 nd
	3 rd	Components of nucleosides and nucleotides with examples	3 rd	3 rd

8 th	1 st	Structure of DNA (Watson and Crick model)	1 st	1 st
	2 nd	RNA and their functions	2 nd	2 nd
	3 rd	Enzymes-Definition, properties and IUB and MB classification	3 rd	3 rd
9 th	1 st	Factors affecting enzyme activity	1 st	1 st
	2 nd	Mechanism of action of enzymes, Enzyme inhibitors	2 nd	2 nd
	3 rd	Therapeutic and pharmaceutical importance of Enzymes	3 rd	3 rd
10 th	1 st	Vitamins-Definition and classification with examples	1 st	1 st
	2 nd	Sources, chemical nature, functions	2 nd	2 nd
	3 rd	Coenzyme form, recommended dietary requirements	3 rd	3 rd
11 th	1 st	Deficiency diseases of fat	1 st	1 st
	2 nd	Water-soluble vitamins	2 nd	2 nd
	3 rd	Metabolism (Study of cycle/pathways without chemical structures)	3 rd	3 rd
12 th	1 st	Metabolism of Carbohydrates: Glycolysis	1 st	1 st
	2 nd	TCA cycle and glycogen metabolism, regulation of blood glucose	2 nd	2 nd
	3 rd	Diseases related to abnormal metabolism of Carbohydrates	3 rd	3 rd
13 th	1 st	Metabolism of lipids: Lipolysis, β -oxidation of Fatty acid	1 st	1 st
	2 nd	Palmitic acid, ketogenesis and ketolysis.	3 rd	3 rd
	3 rd	Diseases related to abnormal metabolism of lipids such as Ketoacidosis, Fatty liver, Hypercholesterolemia		
14 th	1 st	Metabolism of Amino acids Proteins: General reactions of amino acids	1 st	1 st
	2 nd	Its significance– Transamination,	2 nd	2 nd

		deamination, Urea cycle		
	3 rd	Decarboxylation. Diseases related to abnormal metabolism of amino acids	3 rd	3 rd
15 th	1 st	Disorders of ammonia metabolism, phenylketonuria,	1 st	1 st
	2 nd	Alkaptonuria	2 nd	2 nd
	3 rd	Biological oxidation:	3 rd	3 rd
16 th	1 st	Oxidative phosphorylation	1 st	1 st
	2 nd	Revision	2 nd	2 nd
	3 rd	Minerals: Types, Functions, Deficiency diseases	3 rd	3 rd
17 th	1 st	Recommended dietary requirements	1 st	1 st
	2 nd	Water and Electrolytes Distribution, functions of water in the body	2 nd	2 nd
	3 rd	Water turnover and balance	3 rd	3 rd
18 th	1 st	Electrolyte composition of the body fluids	1 st	1 st
	2 nd	Dehydration, causes of dehydration and	2 nd	2 nd
	3 rd	Introduction to Biotechnology	3 rd	3 rd
19 th	1 st	Organ function tests Functions of kidney	1 st	1 st
	2 nd	Routinely performed tests to assess the functions of kidney and their clinical significances	2 nd	2 nd
	3 rd	Functions of liver and routinely performed tests to assess the functions of liver	3 rd	3 rd
20 th	1 st	Their clinical significance	1 st	1 st
	2 nd	Lipid profile tests	2 nd	2 nd
	3 rd	Its clinical significances	3 rd	3 rd
21 st	1 st	Revision	1 st	Determination of constituents of blood/serum (simulated) (Creatine, glucose, cholesterol, Calcium, Urea, SGOT/SGPT)
	2 nd	Oral rehydration therapy	2 nd	----do----
	3 rd	Dietary intake of electrolyte and Electrolyte balance	3 rd	----do----
22 nd	1 st	Dietary intake of electrolyte and Electrolyte balance	1 st	Determination of constituents of blood/serum (simulated) (Creatine, glucose, cholesterol, Calcium, Urea, SGOT/SGPT)
	2 nd	Electron transport chain	2 nd	----do----

	3 rd	Jaundice.	3 rd	----do----
23 rd	1 st	Introduction to Pathology of Blood and Urine	1 st	Determination of constituents of blood/serum (simulated) (Creatine, glucose,cholesterol, Calcium, Urea, SGOT/SGPT)
	2 nd	Lymphocytes	2 nd	----do----
	3 rd	Platelets	3 rd	----do----
24 th	1 st	Their role in health and disease	1 st	Determination of constituents of blood/serum (simulated) (Creatine, glucose,cholesterol, Calcium, Urea, SGOT/SGPT)
	2 nd	Erythrocytes	2 nd	----do----
	3 rd	Abnormal cells and their significance	3 rd	----do----
25 th	1 st	Normal and Abnormal constituents of Urine	1 st	Study the hydrolysis of starch from acid and salivary amylase enzyme
	2 nd	TheirSignificance	2 nd	----do----
	3 rd	Revision	3 rd	----do----

Performa : Jhankar College of Pharmacy		
Lesson Plan		
Name of the faculty	Jyoti Yadav	
Discipline	Pharmacy	
Semester	2 nd Year	
Subject	Pharmacy Law & Ethics	
Lesson plan Duration	75 Hours (20 Aug 2024 to 30 June 2025)	
Work Load/week(In hour)	Lecture- 03	
Week	Theory	
	Lecture Day	Topic
1 st	1 st	General Principles of Law, History
	2 nd	Various Acts related to Drugs and Pharmacy profession
	3 rd	Pharmacy Act 1948 and Rules: Objectives, Definitions, Pharmacy Council of India
2 nd	1 st	Its constitution and functions
	2 nd	Education Regulations
	3 rd	Revision
3 rd	1 st	State and Joint state pharmacy councils
	2 nd	Registration of Pharmacists, Offences andPenalties. Pharmacy Practice Regulations 2015
	3 rd	Drugs and Cosmetics Act 1940 and Rules 1945 andNew Amendments: Objectives, Definitions
4 th	1 st	Legal definitions of schedules tothe Act and Rules

	2 nd	Import of drugs ,Classes of drugs andcosmetics
	3 rd	Manufacture of drugs – Prohibition of manufacture andsale of certain drugs
5 th	1 st	Conditions for grant of license
	2 nd	Conditions of license for manufacture of drugs
	3 rd	Revision
6 th	1 st	Manufacture of drugs for test
	2 nd	Examination and analysis,manufacture of new drug
	3 rd	Loan license and repackinglicense.
7 th	1 st	Study of schedule C and C1
	2 nd	Schedule H, H1
	3 rd	Schedule G, K
8 th	1 st	Schedule P, M
	2 nd	Schedule N, and X.
	3 rd	Revision
9 th	1 st	Sale of Drugs – Wholesale, Retail sale and Restrictedlicense
	2 nd	Records to be kept in a pharmacy
	3 rd	Drugs Prohibited for manufacture and sale in India
10 th	1 st	Administration of the Act and Rules Drugs Technical Advisory Board, Central Drugs Laboratory
	2 nd	Drugs Consultative Committee
	3 rd	Government analysts, licensing authorities
11 th	1 st	Controlling authorities, Drug Inspectors
	2 nd	Narcotic Drugs and Psychotropic Substances Act 1985and Rules Objectives, Definitions, Authorities and Officers
	3 rd	Prohibition, Control and Regulation, Offences andPenalties.
12 th	1 st	Drugs and Magic Remedies (ObjectionableAdvertisements) Act 1954 Objectives, Definitions, Prohibition of certainadvertisements,
	2 nd	Classes of Exempted advertisements,Offences and Penalties.
	3 rd	Class Test
13 th	1 st	Prevention of Cruelty to Animals Act-1960: Objectives,Definitions, CPCSEA - brief overview, Institutional Animal Ethics Committee, Breeding and Stocking of Animals
	2 nd	Performance of Experiments, Transfer and Acquisition ofanimals for experiment, Records, Power to suspend or revoke registration, Offences and Penalties.
	3 rd	Poisons Act-1919: Introduction, objective, definition,possession,
14 th	1 st	Possession for sales and sale of any poison,import of poisons
	2 nd	FSSAI (Food Safety and Standards Authority of India)Act and Rules: brief overview and aspects related tomanufacture,
	3 rd	Storage, sale, and labelling of Food Supplements
15 th	1 st	National Pharmaceutical Pricing Authority: Drugs PriceControl Order (DPCO) - 2013. Objectives, Definitions
	2 nd	Sale prices of bulk drugs, Retail price of formulations,
	3 rd	Revision
16 th	1 st	Retail price and ceiling price of scheduled formulations,
	2 nd	Pharmaceutical Policy 2002
	3 rd	National List of Essential Medicines (NLEM)
17 th	1 st	Code of Pharmaceutical Ethics: Definition, ethicalprinciples
	2 nd	Ethical problem solving, registration
	3 rd	Code of ethics for Pharmacist in relation to his job
18 th	1 st	Trade, medical profession and his profession
	2 nd	Pharmacist's oath

	3 rd	Class Test
19 th	1 st	Medical Termination of Pregnancy Act and Rules basic understanding
	2 nd	MTP salient features, and Amendments
	3 rd	Central Drugs Standards Control Organization (CDSCO) Indian Pharmacopoeia Commission (IPC)
20 th	1 st	Good Regulatory practices (documentation, licenses, Renewals, e governance) in Community Pharmacy, Wholesale business,
	2 nd	Hospital pharmacy, Pharma Manufacturing,
	3 rd	Inspections, import, export of drugs and medical devices
21 st	1 st	Introduction to BCS system of classification, Basic concepts of Clinical Trials
	2 nd	ANDA, NDA, New Drug development,
	3 rd	New Drugs and Clinical Trials Rules, 2019.
22 nd	1 st	Brand v/s Generic, Trade name concept,
	2 nd	Introduction to Patent Law and Intellectual Property Rights, Emergency Use Authorization
	3 rd	Revision
23 rd	1 st	Blood bank – basic requirements and functions
	2 nd	Clinical Establishment Act and Rules – Aspects related to Pharmacy
	3 rd	Biomedical Waste Management Rules 2016 Basic Aspects.
24 th	1 st	Aspects related to pharma manufacture to disposal of pharma / medical waste at homes, pharmacies and hospitals
	2 nd	Bioethics - Basic concepts, history and principles. Brief overview of ICMR's
	3 rd	National Ethical Guidelines for Biomedical and Health Research involving human participants
25 th	1 st	Introduction to the Consumer Protection Act
	2 nd	Introduction to the Disaster Management Act
	3 rd	Medical Devices – Categorization, basic aspects related to manufacture and sale

Lesson Plan

Name of the Faculty	Mr. Umesh Yadav
Discipline	D. Pharmacy
Year	IInd year
Subject	Hospital and clinical pharmacy
Lesson Plan Duration	75 Hours (20 Aug 2024 to 30 June 2025)

Work load (Lecture/practical) per week (in hrs):

Week		Theory	Practical	
Week	Theory	Topic/test	Practical Day	Topic
	Lecture Day	Hospitals Definition, Function, Classifications based on various criteria, organization.		Introduction to the HCP
1 st	1 st	Management and Health delivery system in India.		
	2 nd	Hospital Pharmacy: (a) Definition Functions and objectives of Hospital Pharmaceutical services.		
	3 rd	Test		To study the
2 nd	1 st	Location, Layout, Flow chart of		

		material and men.		construction and working of hot air oven
	2 nd	Personnel and facilities requirements including equipments based on individual and basic needs.		
	3 rd	Requirements and abilities required for Hospital pharmacists.		To prepare 100 ml of 5% dextrose injection
3 rd	1 st	Drug Distribution system in Hospitals:(a) Out –patient services. In-patient services –(a) types of services(b)detaileddiscussionofunit Dosesystem		
	2 nd	Floor ward stock system, Satellite pharmacy services, Central sterile services, Bed Side Pharmacy.		
	3 rd	Manufacturing:(a) Economical considerations, estimation ofdemand.		To study the construction and working of autoclave
4 th	1 st	(b) Sterile manufacture-large and small volume parenterals, facilities, requirements, layout production planning, man-power requirements.		
	2 nd	(c)Non-sterile manufacture – Liquid orals, externals-bulk concentrates.		
	3 rd	Test		To design patient and physician information leaflet for the drug salbutamol
5 th	1 st	(d)Procurement of stores and testing of rawmaterials.		
	2 nd	Nomenclature and uses of surgical instrumentsandHospitalEquipments and healthaccessories.		
	3 rd	Revision		To design patient and physician information leaflet for the drug Rifampicin
6 th	1 st	P.T.C (PharmacyTherapeutic Committee),		
	2 nd	Hospital Formulary System and their organization		
	3 rd	Functioning and composition of hospitalformulary.		To design patient and physician information leaflet for the drug Omeprazole
7 th	1 st	Drug Information service		
	2 nd	Drug Information Bulletin		
	3 rd	Revision		Viva Voice
8 th	1 st	Introduction to Clinical Pharmacy Practice –Definition, scope.		
	2 nd	Introduction to Clinical Pharmacy Practice –Definition, scope.		
	3 rd	Modern dispensing aspects		
9 th	1 st	medication history		Sterlization of glasswares and surgical instruments
	2 nd	Revision		
	3 rd	1 st Sessional Examination		
10 th	1 st	Patient counseling		
	2 nd	Advice for the use of common drugs		Testing of water for injection used in the

				preparation of transfusion fluid
	3 rd	Common daily terminology used in the Practice of Medicine.		
11 th	1 st	Common daily terminology used in the Practice of Medicine.		Testing of dextrose as raw material used in the preparation of transfusion fluid.
	2 nd	Surgical dressing like cotton, gauze, bandages and adhesive tapes		
	3 rd	Pharmacopeial tests of surgical dressings		Testing of mannitol as raw material used in the preparation of transfusion fluid.
12 th	1 st	I.V sets B.G sets, Ryals tubes		
	2 nd	Catheters, Syringes		
	3 rd	Test		Testing of potassium as raw material used in the preparation of transfusion fluid.
13 th	1 st	Common terminologies used		
	2 nd	Diseases manifestations and syndromes of Hepatitis		
	3 rd	Diseases manifestations and syndromes of Hypertension		To carry out hydrolytic test on glass bottles
14 th	1 st	Diseases manifestations and syndromes of Angina		
	2 nd	Diseases manifestations and syndromes of Arrhythmia		
		3 rd		
15 th	1 st	Diseases manifestations and syndromes of Tuberculosis		
	2 nd	Diseases manifestations and syndromes of Diabetes		
	3 rd	Peptic ulcer		Viva voice
16 th	1 st	Epilepsy		
	2 nd	Revision		
	3 rd	2 nd Sessional Examination		
17 th	1 st	Diseases manifestations and syndromes of Rheumatoid arthritis		Testing of adsorbent cotton for acidity and alkalinity
	2 nd	Treatment strategies for peptic ulcer and diabetes		
	3 rd	Physiological parameters with their significance		
18 th	1 st	Physiological parameters with their significance		An introduction to the aseptic room and construction and working of laminar air flow
	2 nd	Revision		
	3 rd	Introduction to drug interaction		
19 th	1 st	Drug interactions significance		To perform tests for Sterility testing
	2 nd	Mechanisms involved in drug-drug and drug and food interaction		
	3 rd	Drug-drug interaction with reference to analgesics		

20 th	1 st	Drug –drug interaction with reference to diuretics		Sterility testing by turbidetric method
	2 nd	Drug –drug interaction with reference to Cardiovascular		
	3 rd	Revision		
21 st	1 st	Drug –drug interaction with reference to gastrointestinal agents		Viva Voice
	2 nd	Vitamins and oral hypoglycemic agents		
	3 rd	Adverse Drug Reactions		
22 nd	1 st	Adverse Drug Reactions and their significance		Viva Voice
	2 nd	Drug induced diseases		
	3 rd	Teratogenicity		
23 rd	1 st	Drugs in Clinical Toxicity – Introduction, general treatment of poisoning,		To prepare culture media for microbial growth
	2 nd	Revision		
	3 rd	systematic antidotes		
24 th	1 st	Treatment of insecticide poisoning, heavy metal poison		To prepare saubords agar media for microbial growth
	2 nd	Narcotic drugs		
	3 rd	Barbiturate, Organophosphorus poisons		
25 th	1 st	Drug dependences, Drug abuse, addictive drugs and their treatment, complications		To prepare fluid thioglycollate media for microbial growth
	2 nd	Bio-availability of drugs, including factors		
	3 rd	3 rd Sessional Examination		

Lesson Plan

Name of the Faculty	Mrs. Jyoti Yadav
Discipline	D. Pharmacy
Year	IInd year
Subject	Pharmacology
Lesson Plan Duration	75 Hours (20 Aug 2024 to 30 June 2025)

Work load (Lecture/practical) per week (in hrs):

Week		Theory	Practical	
	Lecture Day	Topic/test	Practical Day	Topic
1 st	1 st	Introduction to Pharmacology, scope of Pharmacology- introduction, pharmacokinetics & pharmacodynamics & scope of pharmacology.		Introduction to pharmacology & toxicology laboratory.
	2 nd	Routes of administration of drugs, their advantages and disadvantages- Enteral route, Parenteral route		
	3 rd	Routes of administration of drugs, their advantages and disadvantages- Topical & other routes		
2 nd	1 st	Various processes of absorption of drugs and the factors affecting them		Introduction of software
	2 nd	Metabolism, Distribution and Excretion of drugs		
	3 rd	Test		
3 rd	1 st	Drug receptor interaction- Ligand Gated Ion channel, G-Protien coupled receptor		To select the animals for experimental use in pharmacology.
	2 nd	Enzyme linked receptor & Intracellular receptor		
	3 rd	General Anaesthetics, adjunction to anesthesia, intravenous Anaesthetics		
4 th	1 st	Analgesic		To study the common

		antipyretics and non-steroidal, anti-Inflammatory drugs and Narcotic analgesics		instrument & equipment and equipments used in experimental pharmacology.
	2 nd	Anti-rheumatic and antigout remedies		
	3 rd	Sedatives and Hypnotics		
5 th	1 st	Psychopharmacological agents		To prepare physiological salt solutions
	2 nd	Anti convulsants, analeptics, Centrally acting muscle relaxants		
	3 rd	Anti- Parkinsonism agents, Local Anesthetics		To study the effect of adrenaline on heart rate & force of contraction on Isolated frog heart by using software.
6 th	1 st	Cholinergic drug		
	2 nd	Revision		
	3 rd	Anti- Cholinergic drugs		To study the effect of acetylcholine on heart rate & force of contraction on isolated frog heart by using software.
7 th	1 st	Adrenergic drugs		
	2 nd	Anti- cholinesterase drugs		
	3 rd	Adrenergic receptor blockers		To study the effect of acetylcholine on isolated rectus abdominus muscle by using software.
8 th	1 st	Neurone blockers and Ganglion blockers		
	2 nd	Neuromuscular blockers		
	3 rd	Drugs used in myasthenia gravis		To study the effect of acetylcholine on ileum of guinea pig by using software.
9 th	1 st	Drugs acting on eye, mydriatics		
	2 nd	1 st Sessional Examination		
	3 rd	Drugs used in glaucoma		To study the effect of mydriatics on rabbit cornea by using software.
10 th	1 st	Drugs acting on respiratory system- Respiratory stimulant		
	2 nd	Bronchodilators, Nasal decongestants		
	3 rd	Expectorants and Antitussive agents		To study the effect of acetylcholine on ileum of guinea pig by using software.
11 th	1 st	Antacids		
	2 nd	Physiological role of histamine and serotonin		
	3 rd	Histamine and Antihistamines		To study the effect of mydriatics on rabbit cornea
12 th	1 st	Prostaglandins		

	2 nd	Cardio Vascular drugs		by using software.
	3 rd	Cardio tonics		To study the effect of
13 th	1 st	Anti-arrhythmic agents		miotics on rabbit cornea
	2 nd	Antianginal agents		by using software.
	3 rd	Antihypertensive agents		To study the effect of digitalis
14 th	1 st	Peripheral vasodilators		on heart rate & force of
	2 nd	Drugs used in atherosclerosis		contraction on isolated frog
		Haematinics		heart by using software.
15 th	1 st	Coagulants and Anti-coagulants		To observe the effect of
	2 nd	Haemostatic		convulsant & anticonvulsant in
	3 rd	Blood substitutes		mice by using CD.
16 th	1 st	Blood expanders		To study the effect of
	2 nd	2 nd Sessional Examination		chlorpromazine
	3 rd	Physiology of renal tract-excretion, urine formation & UTI		To study the various laboratory
17 th	1 st	Diuretics		techniques used in experimental
	2 nd	Antidiuretics		pharmacology.
	3 rd	Hormones – Introduction to Pituitary gland hormones, Thyroid & Adrenal gland hormones		Viva voice
18 th	1 st	Hormone antagonists-hypoglycemic agents		Viva voice
	2 nd	Sex hormones and oral contraceptive		Viva voice
	3 rd	Corticosteroids		Viva voice
19 th	1 st	Car-minatives, Digestants & Bitters		To understand the adverse
	2 nd	Antacids and drugs used in Peptic Ulcer		drug reaction and monitor
	3 rd	Purgative and Laxatives		the same
20 th	1 st	Ant-diarrhoeals & Emetics		To understand the adverse
	2 nd	Anti-emetics, Anti-spasmodic		drug reaction and monitor
	3 rd	Urinary Anti-septic		the same
21 st	1 st	Sulphonamides		To understand the adverse
	2 nd	Penicillin, Streptomycin		drug reaction and monitor
	3 rd	Tetracyclines and other antibiotics		the same
22 nd	1 st	Anti-tubercular agents		To visit a nearby hospital
	2 nd	Antifungal agents, antiviral drugs		Viva voice
	3 rd	Test		Viva voice

23 rd	1 st	Malaria- Introduction, Life cycle of Malaria parasite		
	2 nd	Antimalarials		Viva voice
	3 rd	Anthelmintic drugs		
24 th	1 st	Cancer- introduction & cause of cancer, types of cancer		
	2 nd	Anticancer drugs		Viva voice
	3 rd	Disinfectants		
25 th	1 st	Anti-septic		
	2 nd	3 rd Sessional Examination		
	3 rd	Revision		

Performa : Jhankar College of Pharmacy				
Lesson Plan				
Name of the faculty	Mr. Vishal Saini			
Discipline	Pharmacy			
Semester	2 nd Year			
Subject	Community Pharmacy and Management			
Lesson plan Duration	75 Hours (20 Aug 2024 to 30 June 2025)			
Work Load/week(In hour)	Lecture- 03; Practical- 03			
Week	Theory		Practical	
	Lecture Day	Topic	Practical Day	Topic
1 st	1 st	Community Pharmacy Practice – Definition, history and development of community pharmacy		To perform the study of prescription, handling with professional standards.
	2 nd	International and Indian Scenarios		
	3 rd	Professional responsibilities of community pharmacists		
2 nd	1 st	Introduction to the concept of Good Pharmacy Practice		To perform study on the drug interaction.
	2 nd	Good Pharmacy Practice and SOPs.		
	3 rd	Good Pharmacy Practice and SOPs.		
3 rd	1 st	Prescription and prescription handling Definition, parts of prescriptions brief instructions on medication usage		To perform the study on dispensing and auxiliary Labels
	2 nd	Legality of prescriptions, prescription handling		
	3 rd	Labelling of dispensed medications(Main label, ancillary label, pictograms)		
4 th	1 st	Labelling of dispensed medications(Main label, ancillary label, pictograms)		To perform the screening and recording of blood pressure
	2 nd	Dispensing process, Good Dispensing Practices		
	3 rd	dispensing errors and strategies to minimize them		
5 th	1 st	Class Test		Viva voce
	2 nd	Communication skills Definition, types of communication skills		
	3 rd	Interactions with professionals and patients		
6 th	1 st	Verbal communication skills (one-to-one, over the		To perform the determination of capillary blood glucose level

		telephone)		
	2 nd	Written communication skills And Body language		
	3 rd	Patient interview techniques		Determination of tidal volume vital capacity by using spirometer
7 th	1 st	Patient counseling- Definition and benefits of patient counseling		
	2 nd	Stages of patient counselling- Introduction, counselling Content		
	3 rd	Counselling process, and closing the counselling Session		
8 th	1 st	Barriers to effective counseling - Types and strategies to overcome the barriers		To measure body mass index with the help of BMI formula to identify the actual body weight status and desirable body status
	2 nd	Hypertension, Asthma		
	3 rd	Diabetes, Tuberculosis		
9 th	1 st	Chronic obstructive pulmonary disease		Viva voce.
	2 nd	AIDS		
	3 rd	Patient Package Inserts - Definition, importance and Benefits		
10 th	1 st	Scenarios of PPI use in India and other countries		To perform the patient counselling on asthma
	2 nd	Patient Information leaflets - Definition and uses		
	3 rd	Class test		
11 th	1 st	Medication Adherence Definition, factors influencing non-adherence		To perform the patient counselling on Hypertension
	2 nd	Strategies to overcome non- adherence		
	3 rd	Health Screening Services in Community Pharmacy Introduction, scope		
12 th	1 st	importance of various health screening services		To perform the patient counselling on Diabetes mellitus
	2 nd	Routine monitoring of patients		
	3 rd	Early detection, and referral of undiagnosed cases		
13 th	1 st	Early detection, and referral of undiagnosed cases		Viva voce
	2 nd	Over The Counter (OTC) Medications-Definition, need and role of Pharmacists in OTC medication Dispensing		
	3 rd	OTC medications in India,		
14 th	1 st	Counseling for OTC products		To perform the patient counselling on rheumatoid

				arthritis
	2 nd	Self-medication and role of pharmacists in promoting the safe practices during self-medication		
	3 rd	Self-medication and role of pharmacists in promoting the safe practices during self-medication		
15 th	1 st	Responding to symptoms, minor ailments,		Viva voca
	2 nd	advice for self-care in conditions such as - Pain management, Cough,		
	3 rd	Cold, Diarrhea, Constipation,		
16 th	1 st	Vomiting, Fever, Sore throat,		To perform the patient counselling on hyperlipidemia
	2 nd	Skin disorders		
	3 rd	Skin disorders		
17 th	1 st	Class test		To perform the patient counselling on headache to a patient
	2 nd	Oral health (mouth ulcers)		
	3 rd	Oral health-dental pain, gum swelling		
18 th	1 st	Community Pharmacy Management- Introduction, Community Pharmacy, responsibility of pharmacy manager		To perform the patient counselling on gastrointestinal disturbances
	2 nd	Legal requirements to set up a community pharmacy		
	3 rd	Legal requirements to set up a community pharmacy		
19 th	1 st	Site selection requirements		To perform the patient counselling on worm infection
	2 nd	Pharmacy designs and interiors		
	3 rd	Pharmacy designs and interiors		
20 th	1 st	Pharmacy designs and interiors		Viva voca
	2 nd	Vendor selection		
	3 rd	Ordering in Pharmacy		
21 st	1 st	Ordering in Pharmacy		To study and perform the counselling on pyrexia
	2 nd	Procurement,		
	3 rd	Inventory control methods,		
22 nd	1 st	Inventory control methods,		To perform the study on counselling on Upper respiratory tract infection
	2 nd	Inventory management		
	3 rd	Financial planning and management Accountancy in		

		community pharmacy – Day book,		
23 rd	1 st	Cash book		Viva voce
	2 nd	Introduction to pharmacy operation softwares usefulness and availability		
	3 rd	Customer Relation Management (CRM)		
24 th	1 st	Audits in Pharmacies		To perform the study on counselling on skin infections
	2 nd	SOP of Pharmacy Management		
	3 rd	Introduction to Digital Health		
25 th	1 st	Introduction to mHealth		To perform the study on counselling on Teeth disorder
	2 nd	Online Pharmacies		
	3 rd	Online Pharmacies		