PHARMACOLOGY – II

Including Fundamentals of Prescribing Module

DESCRIPTION: This course is designed to enable students to acquire understanding of Pharmacodynamics, Pharmacokinetics, principles of therapeutics & nursing implications. Further it develops understanding of fundamental principles of prescribing in students.

COMPETENCIES: On completion of the course, the students will be able to

- 1. Explain the drugs used in the treatment of ear, nose, throat and eye disorders.
- 2. Explain the drugs used in the treatment of urinary system disorders.
- 3. Describe the drugs used in the treatment of nervous system disorders.
- 4. Explain the drugs used for hormonal replacement and for the pregnant women during antenatal, intra natal and postnatalperiod.
- 5. Explain the drugs used to treat emergency conditions and immune disorders.
- 6. Discuss the role and responsibilities of nurses towards safe administration of drugs used to treat disorders of various systems with basic understanding of pharmacology.
- 7. Demonstrate understanding about the drugs used in alternative system of medicine.
- 8. Demonstrate understanding about the fundamental principles of prescribing.

Unit	Time	Learning Outcomes	Content	Teaching/ Learning	Assessment
	(Hrs)			Activities	Methods
I	4 (T)		 Drugs used in disorders of ear, nose, throat & Eye Antihistamines Topical applications for eye (Chloramphenicol, Gentamycin eye drops), ear (Soda glycerin, boric spirit ear drops), nose and buccal cavity-chlorhexidine mouthwash Composition, action, dosage, route, indications, contraindications, drug interactions, side effects, adverse effects, toxicity and role of nurse 	 Lecture cum Discussion Drug study/ presentation 	Short answerObjective type
Π	4 (T)	Describe drugs acting on urinary system & nurse's responsibilities	 Drugs used on urinary system Pharmacology of commonly used drugs Renin angiotensin system Diuretics and antidiuretics Drugs toxic to kidney Urinary antiseptics Treatment of UTI – acidifiers and alkalinizers Composition, action, dosage, route, indications, contraindications, Drug interactions, side effects, adverse effects toxicity and role of nurse 	 Lecture cum Discussion Drug study/ presentation 	Short answerObjective type
III	10 (T)	Describe drugs used on nervous system & nurse's responsibilities	 Drugs acting on nervous system Basis & applied pharmacology of commonly used drugs Analgesics and anaesthetics Analgesics: Non-steroidal anti-inflammatory (NSAID) drugs Antipyretics Opioids & other central analgesics ✓ General (techniques of GA, pre anesthetic medication) & local anesthetics ✓ Gases: oxygen, nitrous, oxide, carbon-dioxide & others Hypnotics and sedatives Skeletal muscle relaxants Antipsychotics Mood stabilizers 	 Lecture cum Discussion Drug study/ presentation 	 Short answer Objective type

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
IV	5 (T)	Describe drugs used for hormonal disorder & supplementation,	 Antidepressants Antianxiety Drugs Anticonvulsants Drugs for neurodegenerative disorders & miscellaneous drugs Stimulants, ethyl alcohol and treatment of methyl alcohol poisoning Composition, action, dosage, route, indications, contraindications, drug interactions, side effects, adverse effects toxicity and role of nurse Drugs used for hormonal, disorders and supplementation, contraception and medical termination of pregnancy 	• Lecture cum Discussion	 Short answer Objective type
		contraception & medical termination of pregnancy & nurse's responsibilities		• Drug study/ presentation	
V	3 (T)	Develop understanding about important drugs used for women before, during and after labour	 Drugs used for pregnant women during antenatal, labour and postnatal period Tetanus prophylaxis Iron and Vit K1 supplementation Oxytocin, Misoprostol Ergometrine Methyl prostaglandin F2-alpha Magnesium sulphate Calcium gluconate 	 Lecture cum Discussion Drug study/ presentation 	Short answerObjective type
VI	10 (T)	Describe drugs used in deaddiction, emergency, poisoning, vitamins & minerals supplementation, drugs used for immunization & immune-suppression & nurse's responsibilities		 Lecture cum Discussion Drug study/ presentation 	Short answerObjective type

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
VII	4 (T)	Demonstrate	 Ipecac Antidotes, Anti-snake venom (ASV) Vitamins and minerals supplementation Vaccines & sera (Universal immunization program schedules) Anticancer drugs: Chemotherapeutic drugs commonly used Immuno-suppressants and Immunostimulants Introduction to drugs used in the series of the se	Lecture cum	 Short answer
		awareness of common drugs used in alternative system of medicine	 alternative systems of medicine Ayurveda, Homeopathy, Unani and Siddha etc. Drugs used for common ailments 	DiscussionObservational visit	Objective type
VIII	20 (T)	Demonstrate understanding about fundamental principles of prescribing	 Fundamental principles of prescribing Prescriptive role of nurse practitioners: Introduction Legal and ethical issues related to prescribing Principles of prescribing Steps of prescribing Prescribing competencies 	Completion of module on Fundamental principles of prescribing	 Short answer Assignments evaluation

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PATHOLOGY - II AND GENETICS

PLACEMENT: IV SEMESTER

THEORY: 1 Credit (20 hours) (Includes lab hours also)

DESCRIPTION: This course is designed to enable students to acquire knowledge of pathology of various disease conditions, understanding of genetics, its role in causation and management of defects and diseases and to apply this knowledge in practice of nursing.

COMPETENCIES: On completion of the course, the students will be able to

- 1. Apply the knowledge of pathology in understanding the deviations from normal to abnormal pathology
- 2. Rationalize the various laboratory investigations in diagnosing pathological disorders
- 3. Demonstrate the understanding of the methods of collection of blood, body cavity fluids, urine and feces for varioustests
- 4. Apply the knowledge of genetics in understanding the various pathological disorders
- 5. Appreciate the various manifestations in patients with diagnosed genetic abnormalities
- 6. Rationalize the specific diagnostic tests in the detection of genetic abnormalities.
- 7. Demonstrate the understanding of various services related to genetics.

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
I		Explain pathological changes in disease conditions of various systems	Special Pathology: Pathological changes in disease conditions of selected systems 1. Kidneys and Urinary tract • Glomerulonephritis • Pyelonephritis • Renal calculi • Cystitis • Renal Cell Carcinoma • Renal Failure (Acute and Chronic) 2. Male genital systems • Cryptorchidism • Testicular atrophy • Prostatic hyperplasia • Carcinoma penis and Prostate. 3. Female genital system • Carcinoma of endometrium • Uterine fibroids • Vesicular mole and Choriocarcinoma • Ovarian cyst and tumors 4. Breast • Fibrocystic changes • Fibroadenoma • Carcinoma of the Breast 5. Central nervous system • Meningitis. • Encephalitis • Stroke • Tumors of CNS	 Lecture Discussion Explain using slides, X-rays and scans Visit to pathology lab, endoscopy unit and OT 	 Short answer Objective type
Π	5 (T)	Describe the laboratory tests for examination of body cavity fluids, urine and faeces	 Clinical Pathology Examination of body cavity fluids: Methods of collection and examination of CSF and other body cavity fluids (sputum, wound discharge) specimen for various clinical pathology, biochemistry and microbiology tests 	 Lecture Discussion Visit to clinical lab and biochemistry lab 	Short answerObjective type

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
			 Analysis of semen: Sperm count, motility and morphology and their importance in infertility Urine: Physical characteristics, Analysis, Culture and Sensitivity Faeces: Characteristics Stool examination: Occult blood, Ova, Parasite and Cyst, Reducing substance etc. Methods and collection of urine and faeces for various tests 		

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10. Parakrama Chandrasoma : Concise pathology, III Edition, Hall International, USA, 1998.

11. Lynne's Gracia, M S & David A Brucker : Diagnostic medical parasitology , III Edition ASM press, Washington'2005.

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GENETICS

COURSE OUTLINE

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
Ι	(III3) 2 (T)	Explain nature,	Introduction:	• Lecture	• Short answer
		principles and perspectives of heredity	 Practical application of genetics in nursing 	DiscussionExplain using slides	 Objective type
			• Impact of genetic condition on families		
			• Review of cellular division: mitosis and meiosis		
			Characteristics and structure of genes		
			Chromosomes: sex determination		
			Chromosomal aberrations		
			• Patterns of inheritance		
			Mendelian theory of inheritance		
			 Multiple allots and blood groups 		
			• Sex linked inheritance		
			Mechanism of inheritance		
			• Errors in transmission (mutation)		
Π	prenata influen develo	Explain maternal,	Maternal, prenatal and genetic	• Lecture	Short answer
		prenatal and genetic influences on development of defects and diseases	influences on development of defects and diseases	 Discussion 	 Objective type
			 Conditions affecting the mother: genetic and infections 	• Explain using slides	
			 Consanguinity atopy 		
			 Prenatal nutrition and food allergies 		
			• Maternal age		
			Maternal drug therapy		
			 Prenatal testing and diagnosis 		
			• Effect of Radiation, drugs and chemicals		
			• Infertility		
			Spontaneous abortion		
			 Neural Tube Defects and the role of folic acid in lowering the risks 		
			• Down syndrome (Trisomy 21)		
III	2 (T)	(T) Explain the screening methods for genetic	Genetic testing in the neonates and children	• Lecture	• Short answer
		defects and diseases in neonates and children	 Screening for Congenital abnormalities Developmental delay Dysmorphism 	DiscussionExplain using slides	 Objective type

IV	2 (T)	Identify genetic disorders in adolescents and adults	 Genetic conditions of adolescents and adults Cancer genetics: Familial cancer Inborn errors of metabolism Blood group alleles and hematological disorder Genetic haemochromatosis Huntington's disease Mental illness 	 Lecture Discussion Explain using slides 	Short answerObjective type
V	2 (T)	Describe the role of nurse in genetic services and counselling	 Services related to genetics Genetic testing Gene therapy Genetic counseling Legal and Ethical issues Role of nurse 	LectureDiscussion	Short answerObjective type

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PROFESSIONALISM, PROFESSIONAL VALUES & ETHICS INCLUDING BIOETHICSPLACEMENT:

IV SEMESTER

THEORY: 1 Credit (20 hours)

DESCRIPTION: This course is designed to help students to develop an understanding of professionalism and demonstrate professional behavior in their workplace with ethics and professional values. Further the students will be able to identify ethical issues in nursing practice and participate effectively in ethical decision making along with health team members.

COMPETENCIES: On completion of this course, the students will be able to

- 1. Describe profession and professionalism.
- 2. Identify the challenges of professionalism.
- 3. Maintain respectful communication and relationship with other health team members, patients and society.
- 4. Demonstrate professional conduct.
- 5. Describe various regulatory bodies and professional organizations related to nursing.
- 6. Discuss the importance of professional values in patient care.
- 7. Explain the professional values and demonstrate appropriate professional values in nursing practice.
- 8. Demonstrate and reflect on the role and responsibilities in providing compassionate care in the healthcare setting.
- 9. Demonstrate respect, human dignity and privacy and confidentiality to self, patients and their caregivers and otherhealth team members.
- 10. Advocate for patients 'wellbeing, professional growth and advancing the profession.
- 11. Identify ethical and bioethical concerns, issues and dilemmas in nursing and healthcare.
- 12. Apply knowledge of ethics and bioethics in ethical decision making along with health team members.
- 13. Protect and respect patient 's rights.

Unit	Time	Learning Outcomes	Content	Teaching/ Learning	Assessment
	(Hrs)			Activities	Methods
Ι	5 (T)	U	PROFESSIONALISM	• Lecture cum	Short answer
		profession	Profession	Discussion	• Essay
			 Definition of profession 		• Objective type
			Criteria of a profession		
		Describe the concepts	 Nursing as a profession 		
		and attributes of	Professionalism		
		professionalism	 Definition and characteristics of professionalism 		
			• Concepts, attributes and indicators of professionalism		
			Challenges of professionalism		
		Identify the challenges of professionalism	 Personal identity vs professional identity 		
		Maintain respectful communication and	 Preservation of self-integrity: threat to integrity, Deceiving patient: withholding information and falsifying records 	• Debate	
		relationship with other health team members, patients and society	 Communication & Relationship with team members: Respectful and open communication and relationship pertaining to relevant interests for ethical decision making 	• Role play	
		-	\circ Relationship with patients and society		
		Demonstrate professional conduct	Professional Conduct		
		-	 Following ethical principles 		
		Respect and maintain professional	• Adhering to policies, rules and regulation of the institutions	• Case based	
		boundaries between patients, colleagues	• Professional etiquettes and behaviours	 Case based discussion 	
		and society	• Professional grooming: Uniform, Dress code		
		Describe the roles and	• Professional boundaries: Professional relationship with the patients, caregivers and team members		
		responsibilities of regulatory bodies and	Regulatory Bodies & Professional Organizations: Roles & Responsibilities		
		professional organizations	<i>Regulatory bodies</i> : Indian Nursing Council, State Nursing Council	Lecture cum Discussion	
			• <i>Professional Organizations:</i> Trained Nurses Association of India (TNAI), Student Nurses Association (SNA), Nurses League of Christian Medical Association of India, International Council of Nurses (ICN) and International Confederation of Midwives	• Visit to INC, SNC, TNAI	• Visit reports

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
II		Discuss the importance of professional values Distinguish between personal values and professional values Demonstrate appropriate professional values in nursing practice	 PROFESSIONAL VALUES Values: Definition and characteristics of values Value clarification Personal and professional values Professional socialization: Integration of professional values with personal values Professional values in nursing Importance of professional values in nursing and health care Caring: definition, and process Compassion: Sympathy Vs empathy, Altruism Conscientiousness 		
			 Dedication/devotion to work Respect for the person- Human dignity Privacy and confidentiality: Incidental disclosure Honesty and integrity: Truth telling Trust and credibility: Fidelity, Loyalty Advocacy: Advocacy for patients, work environment, nursing education and practice, and for advancing the profession 		
ш	10 (T)	Define ethics & bioethics Explain ethical principles Identify ethical concerns Ethical issues and dilemmas in health care	 ETHICS & BIOETHICS Definitions: Ethics, Bioethics and Ethical Principles Beneficence Non-maleficence: Patient safety, protecting patient from harm, Reporting errors Justice: Treating each person as equal Care without discrimination, equitable access to care and safety of the public Autonomy: Respects patients' autonomy, Self-determination, Freedom of choice Ethical issues and ethical dilemma: Common ethical problems Conflict of interest Paternalism Deception Privacy and confidentiality 	 Lecture cum discussion Group discussion with examples Flipping/ self- directed learning Role play Story telling Sharing experiences Case based Clinical discussion Role modeling Group exercise on ethical decision- making following steps on a given scenario Assignment 	 Short answer Essay Quiz Reflective diary Case report Attitude test Assessment of assignment

Unit	Time	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment
	(Hrs)			Acuvities	Methods
			Valid consent and refusal		
			Allocation of scarce nursing resources		
			• Conflicts concerning new technologies		
			Whistle-blowing		
			• Beginning of life issues		
			• Abortion		
			o Substance abuse		
			\circ Fetal therapy		
			\circ Selective deduction		
			 Intrauterine treatment of fetal conditions 		
			 Mandated contraception 		
			○ Fetal injury		
			○ Infertility treatment		
			• End of life issues		
			◦ End of life		
			\circ Euthanasia		
			\circ Do Not Resuscitate (DNR)		
			 Issues related to psychiatric care 		
			\circ Non compliance		
			 Restrain and seclusion 		
			• Refuse to take food		
		Explain process of ethical decision making and apply knowledge of ethics and bioethics in making ethical decisions			
		Explain code of ethics stipulated by ICN and INC			

Un	it Time	Outcomes	Content	Teaching/ Learning	Assessment
	(Hrs)			Activities	Methods

Discuss the rights of the patients and families to make decisions about health careProcess of ethical decision making• Assess the situation (collect information)• Assess the situation (collect information)• Identify the ethical problem • Identify the alternative decisions• Protect and respect patients' rights• Choose the solution to the ethical decision• Implement the decision • Evaluate the decision • Evaluate the decision	
Image: Information decisions about health careinformation)Identify the ethical problemIdentify the alternative decisionsProtect and respect patients' rightsImage: Information decisionImage: Information decision <td></td>	
care• Identify the ethical problemProtect and respect patients' rights• Identify the alternative decisions• Choose the solution to the ethical decision• Implement the decision • Evaluate the decision Ethics committee: Roles and	
 Protect and respect patients' rights Choose the solution to the ethical decision Implement the decision Evaluate the decision Ethics committee: Roles and 	
decision • Implement the decision • Evaluate the decision Ethics committee: Roles and	
 Implement the decision Evaluate the decision Ethics committee: Roles and 	
Ethics committee: Roles and	
responsibilities	
Clinical decision making	
• Research	
Code of Ethics	
International Council of Nurses (ICN)	
Indian Nursing Council	
Patients' Bill of Rights-17 patients' rights (MoH&FW, GoI)	
1. Right to emergency medical care	
2. Right to safety and quality care according to standards	
3. Right to preserve dignity	
4. Right to nondiscrimination	
5. Right to privacy and confidentiality	
6. Right to information	
7. Right to records and reports	
8. Right to informed consent	
9. Right to second opinion	
10. Right to patient education	
11. Right to choose alternative treatment options if available	
12. Right to choose source for obtaining medicines or tests	
13. Right to proper referral and transfer, which is free from perverse commercial influences	
14. Right to take discharge of patient or receive body of deceased from hospital	
15. Right to information on the rates to be charged by the hospital for each type of service provided and facilities available on a prominent display board and a brochure	
16. Right to protection for patients involved in clinical trials, biomedical and health research	
17. Right to be heard and seek redressal	

ADULT HEALTH NURSING - II WITH INTEGRATED PATHOPHYSIOLOGY including Geriatric Nursing AND PALLIATIVE CARE MODULE

PLACEMENT: IV SEMESTER

THEORY: 7 Credits (140 hours)

PRACTICUM: Lab/Skill Lab (SL): 1 Credit (40 hours) Clinical: 6 Credits (480 hours)

DESCRIPTION: This course is designed to equip the students to review and apply their knowledge of Anatomy, Physiology, Biochemistry and Behavioral sciences in caring for adult patients with Medical/Surgical disorders using nursingprocess approach. It also intends to develop competencies required for assessment, diagnosis, treatment, nursing management, and supportive/palliative and rehabilitative care to adult patients with various Medical Surgical disorders.

COMPETENCIES: On completion of the course the students will apply nursing process and critical thinking in deliveringholistic nursing care with selected Medical and Surgical conditions.

At the completion of Adult Health Nursing II course, students will

- 1. Explain the etiology, pathophysiology, manifestations, diagnostic studies, treatments and complications of selected common medical and surgical disorders.
- 2. Perform complete health assessment to establish a data base for providing quality patient care and integrate theknowledge of diagnostic tests in the process of data collection.
- 3. Identify diagnoses, list them according to priority and formulate nursing care plan.
- 4. Perform nursing procedures skillfully and apply scientific principles while giving comprehensive nursing care topatients.
- 5. Integrate knowledge of anatomy, physiology, pathology, nutrition and pharmacology in caring for patients experiencing various medical and surgical disorders.
- 6. Identify common diagnostic measures related to the health problems with emphasis on nursing assessment and responsibilities.
- 7. Demonstrate skill in assisting/performing diagnostic and therapeutic procedures.
- 8. Demonstrate competencies/skills to patients undergoing treatment for medical surgical disorders.
- 9. Identify the drugs used in treating patients with selected medical surgical conditions.
- 10. Plan and provide relevant individual and group education on significant medical surgical topics.
- 11. Maintain safe environment for patients and the health care personnel in the hospital.

T – Theory, L/SL – Lab/Skill Lab

Unit	Time	Learning Outcomes	Content	Teaching/ Learning	Assessment
	(Hrs)			Activities	Methods
Ι	12 (T) 4 (SL)	Explain the etiology, pathophysiology, clinical manifestations, diagnostic measures and medical, surgical, nutritional and nursing management of patients with ENT disorders	 Nursing management of patient with disorders of Ear, Nose and Throat (Includes etiology, pathophysiology, clinical manifestations, diagnostic measures and medical, surgical, nutritional and nursing management) Review of anatomy and physiology of the ear, nose and throat History, physical assessment, and diagnostic tests Ear External ear: deformities otalgia, foreign bodies and tumors Middle ear: impacted wax, tympanic, membrane perforation, otitis media, and tumors Inner ear: Meniere's disease, labyrinthitis, ototoxicity tumors Upper respiratory airway infections: Rhinitis, sinusitis, tonsillitis, laryngitis Epistaxis, Nasal obstruction, laryngeal obstruction Deafness and its management 	 Lecture and discussion Demonstration of hearing aids, nasal packing, medication administration Visit to audiology and speech clinic 	 MCQ Short answer Essay OSCE Assessment of skill (using checklist) Quiz Drug book
Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
Π	(Hrs) 12 (T) 4 (SL)	of eye	 Nursing management of patient with disorder of eye Review of anatomy and physiology of the eye History, physical assessment, diagnostic assessment Eye Disorders Refractive errors Eyelids: infection, deformities Conjunctiva: inflammation and infection bleeding Cornea: inflammation and infection Lens: cataract Glaucoma Retinal detachment Blindness Eye donation, banking and transplantation 	 Lecture and discussion Demonstration of visual aids, lens, medication administration Visit to eye bank 	 MCQ Short Essay OSCE Drug book

III	15 (T) 4 (L/SL)	Explain the etiology, pathophysiology, clinical manifestations, diagnostic tests, and medical, surgical, nutritional, and nursing management of Kidney and urinary system disorders Demonstrate skill in genitourinary assessment Prepare patient for genitourinary investigations Prepare and provide health education on prevention of renal calculi	 Nursing management of patient with Kidney and Urinary problems Review of Anatomy and physiology of the genitourinary system History, physical assessment, diagnostic tests Urinary tract infections: acute, chronic, lower, upper Nephritis, nephrotic syndrome Renal calculi Acute and chronic renal failure Disorders of ureter, urinary bladder and Urethra Disorders of prostate: inflammation, infection, stricture, obstruction, and Benign Prostate Hypertrophy 	 Lecture cum Discussion Demonstration Case Discussion Health education Drug book Field visit – Visits hemodialysis unit 	 MCQ Short Note Long essay Case report Submits health teaching on prevention of urinary calculi
IV	6 (T)	clinical manifestations, diagnostic tests, and medical, surgical,	 Nursing management of disorders of male reproductive system Review of Anatomy and physiology of the male reproductive system History, Physical Assessment, Diagnostic tests Infections of testis, penis and adjacent structures: Phimosis, Epididymitis, and 	 Lecture, Discussion Case Discussion Health education 	• Short essay

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
			Orchitis		
			 Sexual dysfunction, infertility, contraception 		
			 Male Breast Disorders: gynecomastia, tumor, climacteric changes 		
V	10 (T) 4 (SL)	Explain the etiology, pathophysiology, clinical manifestations, types, diagnostic measures and management of patients with disorders of burns/cosmetic surgeries and its significance	 Nursing management of patient with burns, reconstructive and cosmetic surgery Review of anatomy and physiology of the skin and connective tissues History, physical assessment, assessment of burns and fluid & electrolyte loss Burns Reconstructive and cosmetic surgery for burns, congenital deformities, injuries and cosmetic purposes, gender reassignment Legal and ethical aspects Special therapies: LAD, vacuumed dressing. Laser, liposuction, skin health rejuvenation, use of derma filters 	 Lecture and discussion Demonstration of burn wound assessment, vacuum dressing and fluid calculations Visit to burn rehabilitation centers 	OSCEShort notes
VI	16 (T) 4 (L/SL)	Explain the etiology, pathophysiology, clinical manifestations, diagnostic measures and management of patients with neurological disorders	 Nursing management of patient with neurological disorders Review of anatomy and physiology of the neurological system History, physical and neurological assessment, diagnostic tests Headache, Head injuries Spinal injuries: Paraplegia, Hemiplegia, Quadriplegia Spinal cord compression: herniation of in vertebral disc Intra cranial and cerebral aneurysms Meningitis, encephalitis, brain, abscess, neuro-cysticercosis Movement disorders: Chorea, Seizures & Epilepsies Cerebrovascular disorders: CVA Cranial, spinal neuropathies: Bell's palsy, trigeminal neuralgia Peripheral Neuropathies Degenerative diseases: Alzheimer's disease, Parkinson's disease <i>Guillain-Barré syndrome</i>, Myasthenia gravis & Multiple sclerosis 	 Lecture and discussion Demonstration of physiotherapy, neuro assessment, tracheostomy care Visit to rehabilitation center, long term care clinics, EEG, NCV study unit, 	 OSCE Short notes Essay Drug book

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
			Rehabilitation of patient with neurological deficit		
VII	12 (T) 4 (L/SL)	Explain the etiology, pathophysiology, clinical manifestations, diagnostic tests, and medical, surgical, nutritional, and nursing management of immunological disorders Prepare and provides health education on prevention of HIV infection and rehabilitation Describe the national infection control programs	 Nursing management of patients with Immunological problems Review of Immune system Nursing Assessment: History and Physical assessment HIV & AIDS: Epidemiology, Transmission, Prevention of Transmission and management of HIV/AIDS Role of Nurse; Counseling, Health education and home care consideration and rehabilitation National AIDS Control Program – NACO, various national and international agencies for infection control 	 Lecture, discussion Case Discussion/ seminar Refer Module on HIV/AIDS 	
VIII	12 (T) 4 (L/SL)	Explain the etiology, pathophysiology, types, clinical manifestations, staging, diagnostic measures and management of patients with different cancer, treatment modalities including newer treatments	 Nursing management of patient with Oncological conditions Structure and characteristics of normal and cancer cells History, physically assessment, diagnostic tests Prevention screening early detections warning sign of cancer Epidemiology, etiology classification, Pathophysiology, staging clinical manifestations, diagnosis, treatment modalities and medical and surgical nursing management of Oncological condition Common malignancies of various body system eye, ear, nose, larynx, breast, cervix, ovary, uterus, sarcoma, renal, bladder, kidney, prostate Brain, Spinal cord. Oncological emergencies Modalities of treatment: Chemotherapy, Radiotherapy: Radiation safety, AERB regulations, Surgical intervention, Stem cell and bone marrow transplant, Immunotherapy, Gene therapy Psychological aspects of cancer: anxiety, depression, insomnia, anger Supportive care 	 Lecture and discussion Demonstration of chemotherapy preparation and administration Visit to BMT, radiotherapy units (linear accelerator, brachytherapy, etc.), nuclear medicine unit 	 OSCE Essay Quiz Drug book Counseling, health teaching
			Hospice care	 Completion of palliative care 	

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
				module during clinical hours (20 hours)	
IX	15 (T) 4 (L/SL)	Explain the types, policies, guidelines, prevention and management of disaster and the etiology, pathophysiology, clinical manifestations, diagnostic measures and management of patients with acute emergencies	 Nursing management of patient in Emergency and Disaster situations Disaster Nursing Concept and principles of disaster nursing, Related Policies Types of disaster: Natural and manmade Disaster preparedness: Team, guidelines, protocols, equipment, resources Etiology, classification, Pathophysiology, staging, clinical manifestation, diagnosis, treatment modalities and medical and surgical nursing management of patient with medical and surgical emergencies – Poly trauma, Bites, Poisoning and Thermal emergencies Principles of emergency management Medico legal aspects 	 Lecture and discussion Demonstration of disaster preparedness (Mock drill) and triaging Filed visit to local disaster management centers or demo by fire extinguishers Group presentation (role play, skit, concept mapping) on different emergency care Refer Trauma care management/ ATCN module Guided reading on National Disaster Management Authority (NDMA) guidelines 	 OSCE Case presentations and case study
X	10 (T)	Explain the Concept, physiological changes, and psychosocial problems of ageing Describe the nursing management of the elderly	 Nursing care of the elderly History and physical assessment Aging process and age-related body changes and psychosocial aspects Stress and coping in elder patient Psychosocial and sexual abuse of elderly Role of family and formal and nonformal caregivers Use of aids and prosthesis (hearing aids, dentures) Legal and ethical issues National programs for elderly, privileges, community programs and health services Home and institutional care 	 Lecture and discussion Demonstration of communication with visual and hearing impaired Field visit to old age homes 	 OSCE Case presentations Assignment on family systems of India focusing on geriatric population
XI	15 (T) 8 (L/SL)	Explain the etiology, pathophysiology, clinical manifestations, diagnostic measures and management of patients in critical care units	 Nursing management of patients in critical Care units Principles of critical care nursing Organization: physical set-up, policies, staffing norms Protocols, equipment and supplies 	 Lecture and discussion Demonstration on the use of mechanical ventilators, cardiac monitors etc. Clinical practice in 	 Objective type Short notes Case presentations Assessment of skill on monitoring of

Unit	Time (Hrs)	Learning Outcomes	Content	Teaching/ Learning Activities	Assessment Methods
			 Use and application of critical care biomedical equipment: ventilators, cardiac monitors, defibrillators, infusion pump, Resuscitation equipment and any other Advanced Cardiac Life support Nursing management of critically ill patient Transitional care Ethical and Legal Aspects Breaking Bad News to Patients and/or their families: Communication with patient and family End of life care 	different ICUs	 patients in ICU. Written assignment on ethical and legal issues in critical care
XII	5 (T)	Describe the etiology, pathophysiology, clinical manifestations, diagnostic measures and management of patients with occupational/ industrial health disorders	 Nursing management of patients occupational and industrial disorders History, physical examination, Diagnostic tests Occupational diseases and management 	 Lecture and discussion Industrial visit 	 Assignment on industrial health hazards

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CLINICAL PRACTICUM

CLINICAL PRACTICUM: 6 Credits (480 Hours) - 20 weeks × 24 hours

PRACTICE COMPETENCIES: On completion of the clinical practicum, the students will develop proficiency in applying nursing process and critical thinking in rendering holistic nursing care including rehabilitation to the adult/geriatric patients admitted in Critical Care Units, undergoing cosmetic and reconstructive surgery and with selected medical & surgical disorders of ear, nose, throat, eye, Genitourinary, reproductive, immunologic, nervous systems and in emergency/disaster conditions.

The students will be competent to

- 1. Utilize the nursing process in providing care to the sick adults in the hospital
 - a. Perform complete health assessment to establish a data base for providing quality patient care.
 - b. Integrate the knowledge of diagnostic tests in patient assignment.
 - c. Identify nursing diagnoses and list them according to priority.
 - d. Formulate nursing care plan, using problem solving approach.
 - e. Apply scientific principles while giving nursing care to patients.
 - f. Develop skill in performing nursing procedures applying scientific principle.
 - g. Establish/develop interpersonal relationship with patients and family members.
 - h. Evaluate the expected outcomes and modify the plan according to the patient needs.
- 2. Provide comfort and safety to adult patients in the hospital.
- 3. Maintain safe environment for patients during hospitalization.
- 4. Explain nursing actions appropriately to the patients and family members.
- 5. Ensure patient safety while providing nursing procedures.
- 6. Assess the educational needs of the patient and their family related to medical and surgical disorders and provide appropriate health education to patients.
- 7. Provide pre, intra and post-operative care to patients undergoing surgery.
- 8. Integrate knowledge of pathology, nutrition and pharmacology for patients experiencing selected medical and surgical disorders.
- 9. Integrate evidence-based information while giving nursing care to patients.
- 10. Demonstrate the awareness of legal and ethical issues in nursing practice.

I. Nursing Management of Patients with ENT Disorders

A. Skill Lab

Use of manikins and simulators

- Tracheostomy care
- Instilling Ear and Nasal medications
- Bandage application

B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/	Clinical	Assessment
area/unit	(weeks)	Outcomes	Clinical Skills	Requirements	Methods
ENT Ward and OPD	2	Provide care to patients with ENT disorders Educate the patients and their families	 Examination of ear, nose, throat and History taking Applying bandages to Ear, Nose Tracheostomy care Preparation of patient, assisting and monitoring of patients undergoing diagnostic procedures Auditory screening tests Audiometric tests Preparing the patient and assisting in special procedures like Anterior/ posterior nasal packing, Ear Packing and Syringing Preparation and after care of patients undergoing ENT surgical procedures Instillation of drops/medication 	 ENT assessment -1 Case study/ Clinical presentation – 1 	 Clinical evaluation OSCE Case report study/ Clinical presentation

II. Nursing Management of Patients with Eye Conditions

A. Skill Lab

Use of manikins and simulators

- Instilling Eye medications
- Eye irrigation
- Eye bandage

B. Clinical Postings

Clinical area/unit	Duration (weeks)	Learning Outcomes	Procedural Competencies/ Clinical Skills	Clinical Requirements	Assessment Methods
Ophthalmology unit	2	Develop skill in providing care to patients with Eye disorders Educate the patients and	 History taking, Examination of eyes and interpretation Assisting procedures Visual acuity Fundoscopy, retinoscopy, ophthalmoscopy, tonometry, Refraction tests 	 Eye assessment – 1 Health teaching Case study/ Clinical Presentation– 1 	 Clinical evaluation OSCE Clinical presentation
		their families	 Pre and post-operative care Instillation of drops/ medication Eye irrigation Application of eye bandage Assisting with foreign body removal 		

III. Nursing Management of Patients with Kidney and Urinary System Disorders

A. Skill Lab

Use of manikins and simulators

- Assessment: kidney & urinary system
- Preparation: dialysis
- Catheterization and care
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B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/	Clinical	Assessment
area/unit	(weeks)	Outcomes	Clinical Skills	Requirements	Methods
Renal ward/ nephrology ward including Dialysis unit	2	Develop skill in Management of patients with urinary, male reproductive problems	 Assessment of kidney and urinary system History taking Physical examination Testicular self-examination digital rectal exam Preparation and assisting with diagnostic and therapeutic procedures Cystoscopy, Cystometrogram, Contrast studies: IVP etc. Peritoneal dialysis Hemodialysis, Lithotripsy Specific tests: Semen analysis, gonorreoea test, Renal/ Prostate Biopsy etc. Catheterization: care Bladder irrigation I/O recording and monitoring Ambulation and exercise 	 Assessment – 1 Drug presentation – 1 Care study/ Clinical presentation – 1 Preparing and assisting in hemodialysis 	 Clinical evaluation Care plan OSCE Quiz Drug Presentation

IV. Nursing Management of Patients with Burns and Reconstructive Surgery

A. Skill Lab

Use of manikins and simulators

- Assessment of burns wound
- Wound dressing

B. Clinical Postings

Clinical	Duration	Learning Outcomes	Procedural Competencies/	Clinical	Assessment
area/unit	(weeks)		Clinical Skills	Requirements	Methods
Burns unit/ reconstructive surgical unit	2	Develop skill in burns assessment and providing care to patients with different types of burns Develop skill in providing care to patients with different types of cosmetic and reconstructive surgeries	 Assessment of burns First aid of burns Fluid & electrolyte replacement therapy Skin care Care of Burn wounds Bathing Dressing Pre-operative and post-operative care of patients Caring of skin graft and post cosmetic surgery Rehabilitation 	 burn wound assessment – 1 care study/case presentation – 1 	 Clinical evaluation, Care study/case report

V. Nursing Management of Patients with neurological disorders

A. Skill Lab

Use of manikins and simulators

- Range of motion exercises
- Muscle strengthening exercises
- Crutch walking

B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/ Clinical	Clinical	Assessment
area/unit	(weeks)	Outcomes	Skills	Requirements	Methods
Neurology- medical/ Surgery wards	3	Develop skill in Management of patients with Neurological problems	 Examination Patient monitoring Prepare and assist for various invasive and non-invasive diagnostic 	 euro- assessment -1 Case study/ case presentation - 1 Drug presentation - 1 	 Clinical evaluation Neuro assessment OSCE Case report/ presentations

VI. Nursing Management of Patients with Immunological Disorders

A. Skill Lab

- Barrier Nursing
- Reverse Barrier Nursing

B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/ Clinical	Clinical	Assessment
area/unit	(weeks)	Outcomes	Skills	Requirements	Methods
Isolation ward/ Medical ward	1	Develop skill in the Management of patients with immunological disorders	 Immunological status assessment (e.g. HIV) and Interpretation of specific tests Caring of patients with low immunity Practicing of standard safety measures, precautions/barrier nursing/reverse barrier/isolation skills 	immune statusTeaching of	 Care note Quiz Health Teaching

VII. Nursing Management of Patients with disorders of Oncological conditions

A. Skill Lab

Use of manikins and simulators

- Application of topical medication
- Administration of chemotherapy

B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/ Clinical	Clinical	Assessment
area/unit	(weeks)	Outcomes	Skills	Requirements	Methods
Oncology wards (including day care radiotherapy unit)	3	Develop skill in providing care to patients with oncological disorders	 History taking & physical examination of cancer patients Screening for common cancers: TNM classification Preparation, assisting and after care patients undergoing diagnostic procedures Biopsies/FNAC Pap smear Bone-marrow aspiration Various modalities of treatment Chemotherapy Radiotherapy Pain management Stoma therapy Gene therapy Alternative therapy Stoma care and feeding Caring of patients treated with nuclear medicine 	 Assessment – 1 Care study/ clinical presentation – 1 Pre and post- operative care of patient with various modes of cancer treatment Teaching on BSE to family members Visit to palliative care unit 	 Clinical evaluation Care study Quiz Drug book

VIII. Nursing Management of Patients in emergency conditions

A. Skill Lab

Use of manikins and simulators

- Assessment: primary and secondary survey
- Trauma care: bandaging, wound care, splinting, positions

B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/ Clinical Skills	Clinical	Assessment
area/unit	(weeks)	Outcomes		Requirements	Methods
Emergency room/ Emergency unit	2	Develop skill in providing care to patients with emergency health problems	 Practicing _triage' Primary and secondary survey in emergency Examination, investigations & their interpretations, in emergency & disaster situations Emergency care of medical and traumatic injury patients Documentations, assisting in legal procedures in emergency unit Managing crowd Counseling the patient and family in dealing with grieving & bereavement 	 Triage Immediate care Use of emergency trolley 	Clinical evaluationQuiz

IX. Nursing Management of geriatric patients

A. Skill Lab

Use of manikins and simulators

• Use of assistive safety devices

B. Clinical Postings

Clinical area/unit	Learning Outcomes	Procedural Competencies/ Clinical Skills	Clinical Requirements	Assessment Methods
Geriatric ward	Develops skill in geriatric assessment and providing care to patients with geriatric illness	and assessment of Geriatric patient	 Geriatric assessment – 1 Care of normal and geriatric patient with illness Fall risk assessment – 1 Functional status assessment – 1 	 Clinical evaluation Care plan

X. Nursing Management of Patients in critical care units

A. Skill Lab

Use of manikins and simulators

- Assessment critically ill
- ET tube set up -suction
- TT suction
- Ventilator set up
- Chest drainage
- Bag mask ventilation
- Central & Peripheral line
- Pacemaker

B. Clinical Postings

Clinical	Duration	Learning	Procedural Competencies/ Clinical Skills	Clinical	Assessment
area/unit	(weeks)	Outcomes		Requirements	Methods
Critical Care Unit	2	Develop skill in assessment of critically ill and providing care to patients with critical health conditions	 Assessment of critically ill patients Assisting in arterial puncture, ET tube intubation & extubation ABG analysis & interpretation - respiratory acidosis, respiratory alkalosis, metabolic acidosis, metabolic alkalosis Setting up of Ventilator modes and settings and care of patient on a ventilator Set up of trolley with instruments Monitoring and maintenance of Chest drainage system Bag and mask ventilation Assisting and maintenance of Central and peripheral lines invasive Setting up of infusion pump, defibrillator, Drug administration-infusion, intracardic, intrathecal, epidural, Monitoring pacemaker ICU care bundle Management of the dying patient in the ICU 	 Hemodynamic monitoring Different scales used in ICU Communicating with critically ill patients 	 Clinical evaluation OSCE RASS scale assessment Use of VAE bundle VAP, CAUTI, BSI Case Presentation