

# **MALWANCHAL UNIVERSITY, INDORE**

Curriculum implemented by statutory body (INC) for MSc NURSING Programme name: - MSc NURSING

Programme name	Programme code
MSc (MEDICAL SURGICAL NURSING )	MUNP-08MS
MSc OBG (OBSTRETICS AND GYNECOLOGY)	MUNP-08OB
MSc (MENTAL HEALTH NURSING)	MUNP-08MH
MSc (CHILD HEALTH )	MUNP-08CH
MSc (COMMUNITY HEALTH NURSING)	MUNP-08CO

#### **Philosophy**

National Health Policy(NHP) 2002 emphasizes the need to prepare nurses to function in super-speciality areas who are required in tertiary care institutions, entrusting some limited public health functions to nurses after providing adequate training, and increase the ratio of degree holding vis a vis diploma holding nurses.

It is observed that there is an acute shortage of nursing faculty in under graduate and post graduate nursing programme in India

Indian Nursing Council believes that:

Post Graduate programme is essential to prepare nurses to improve the quality of nursing education and practice in India. .

Post graduate programme in nursing builds upon and extends competence acquired at the graduate levels, emphasizes application of relevant theories into nursing practice, education, administration and development of research skills.

The programme prepares nurses for leadership position in nursing and health fields who can function as nurse specialists, consultants, educators, administrators and researchers in a wide variety of professional settings in meeting the National priorities and the changing needs of the society.

This programme provides the basis for the post masteral programme in nursing. Further the programme encourages accountability and commitment to life long learning which fosters improvement of quality care.

#### Aim

The aim of the postgraduate program in nursing is to prepare graduates to assume responsibilities as nurse specialists, consultants, educators, administrators in a wide variety of professional settings

#### **Objectives**

On Completion of the two year M.Sc Nursing programme, the graduate will be able to:-

- 1. Utilize/apply the concepts, theories and principles of nursing science
- 2. Demonstrate advance competence in practice of nursing
- 3. Practice as a nurse specialist.
- 4. Demonstrate leadership qualities and function effectively as nurse educator and manager.
- 5. Demonstrate skill in conducting nursing research, interpreting and utilizing the findings from health related research.

- 6. Demonstrate the ability to plan and effect change in nursing practice and in the health care delivery system.
- 7. Establish collaborative relationship with members of other disciplines
- 8. Demonstrate interest in continued learning for personal and professional advancement.

## **CURRICULUM**

### Duration

Duration of the course is 2 years for M.Sc. (N)

Available 52 weeks
Vacation 4 weeks
Examination 2 weeks
Gazetted holidays 3 weeks

Total weeks available 43 weeks 40 hours per week 1720 hours

**Total hours for 2 years** 

**3440 hours** 

## **Course of Instruction**

Course of Instruction	Theory (hrs)	Practical (hrs)
1st year		
Nursing education	150	150
Advance nursing practice	150	200
Nursing Research and statistics	150	100
*Clinical speciality –I	150	650

Educational visit 2 weeks

\*Clinical Speciality – Medical Surgical Nursing (Cardio Vascular & Thoracic Nursing, Critical care Nursing, Oncology Nursing, Neurosciences Nursing, Nephro-Urology Nursing, Orthopedic Nursing, Gastro Ente rology Nursing,)Obste tric & Gynae cological Nursing, Child Health (Paediatric) Nursing, Mental Health(Psychiatric) Nursing, Community Health Nursing, Psychiatric (Mental Health) Nursing etc.

## **Scheme of Examination**

		Theory			Practical	
1st year	Hours	Internal	External	Hours	Internal	External
Nursing education	3	25	75		50	50
Advance nursing practice	3	25	75			
Nursing Research and statistics	3	25**	75*			
Clinical speciality -I	3	25	75		100	100
Total		100	300		150	150
II nd Year						
Nursing Management	3	25	75			4
Dissertation & Viva					100	100
Clinical Speciality-II	3	25	75		100	100
Total		50	150		200	200

<sup>\*</sup> Nursing research=50 and statistics=25

- 1. Minimum pass marks shall be 50 % in each of the Theory and practical papers separately.
- 2. A candidate must have minimum of 80% attendance (irrespective of the kind of absence) in theory and practical in each subject for appearing for examination.
- 3. A candidate must have 100% attendance in each of the practical areas before award of degree
- 4. A candidate has to pass in theory and practical exam separately in each of the paper.
- 5. Candidate must pass in internal and external examinations in each of the papers separately.
- 6. If a candidate fails in either theory or practical paper he/she has to re-appear for both the papers (Theory and practical).
- 7. Maximum no. of attempts permitted for each paper is 3 including first attempt.
- 8. The maximum period to complete the course successfully should not exceed 4 (four) years
- 9. A candidate failing in more than two subjects will not be promoted to the IInd year.
- 10. No candidate shall be admitted to the subsequent IInd year examination unless the candidate has passed the Ist year examination.
- 11. Maximum number of candidates for all practical examination should not exceed 10 per day.
- 12. Provision of Supplementary examination should be made.
- 13. All practical examinations must be held in the respective clinical areas.
- 14. One internal and One external examiners(outside the University) should jointly conduct practical examination for each student
- 15. An examiner should be M.Sc (N) in concerned subject and have minimum of 3 (three) years post graduate teaching experience.
- 16. One internal and One external examiners(outside the University) should evaluate dissertation and jointly conduct viva-voce for each student
- 17. For Dissertation Internal examiner should be the guide and external examiner should be Nursing faculty / nursing expert in the same clinical speciality holding Ph.D./M.Phil/M.Sc. Nursing with a minimum of 3 years experience in guiding the research projects for Post Graduate students of Nursing.

<sup>\*\*</sup>Nursing research=15 and statistics=10

#### NURSING EDUCATION

Placement : Ist Year Hours of Instruction
Theory 150 Hours
Practical 150 Hours

Total: 300Hours

## **Course Description**

This course is designed to assist students to develop a broad understanding of Fundamental Principles, concepts, trends and issues related to education and nursing education. Further, it would provide opportunity to students to understand, appreciate and acquire skills in teaching and evaluation, curriculum development, implementation, maintenance of standards and accreditation of various nursing educational programs.

#### **Objectives**

At the end of the course, students will be able to:

- 1. Explain the aims of education, philosophies, trends in education and health: its impact on nursing education.
- 2. Describe the teaching learningprocess.
- 3. Prepare and utilize various instructional media and methods in teaching learning process.
- 4. Demonstrate competency in teaching, using various instructional strategies.
- 5. Critically analyze the existing nursing educational programs, their problems, issues and future trends.
- 6. Describe the process of curriculum development, and the need and methodology of curriculum change, innovation and integration.
- 7. Plan and conduct continuing nursing education programs.
- 8. Critically analyze the existing teacher preparation programs in nursing.
- 9. Demonstrate skill in guidance and counseling.
- 10. Describe the problems and issues related to administration of nursing curriculum including selection and organization of clinical experience.
- 11. Explain the development of standards and accreditation process in nursing education programs.
- 12. Identify research priorities in nursingeducation.
- 13. Discuss various models of collaboration in nursing education and services.
- 14. Explain the concept, principles, steps, tools and techniques of evaluation.
- 15. Construct, administer and evaluate various tools for assessment of knowledge, skill, and attitude

## **Course Content**

Units	Hours		Course Content
	Theory	Practical	
I	10		Introduction:  Education: Definition, aims, concepts, philosophies & their education implications,  Impact of Social, economical, political & technological changes oneducation:  • Professional education  • Current trends and issues ineducation  • Educational reforms and National Educational policy, various educational commissions-reports  • Trends in development of nursing education in India
II	20	30	Teaching – Learning Process  Concepts of teaching and learning: Definition, theories of teaching and learning, relationship between teaching and learning.  Educational aims and objectives; types, domains, levels, elements and writing of educational objectives  Competency based education(CBE) and outcome based education(OBE)  Instructional design: Planning and designing the lesson, writing lesson plan: meaning, its need and importance, formats.  Instruction strategies – Lecture, discussion, demonstration, simulation, laboratory, seminar, panel, symposium, problem solving, problem based learning (PBL), workshop, project, roleplay(socio- drama), clinical teaching methods, programmed instruction, self directed learning(SDL), micro teaching, computer assisted instruction(CAI), computer assisted learning (CAL)

Units	Hours		Course Content
	Theory	Practical	
III	10	10	<ul> <li>Instructional media and methods</li> <li>□ Key concepts in the selection and use of media in education</li> <li>□ Developing learning resource material using different media</li> <li>□ Instructional aids - types, uses, selection, preparation, utilization.</li> <li>□ Teacher's role in procuring and managing instructional Aids - Project and non-projected aids, multi media, video-tele conferencing etc</li> </ul>
IV	10		<ul> <li>Measurement and evaluation:</li> <li>Concept and nature of measurement and evaluation, meaning, process, purposes, problems in evaluation and measurement.</li> <li>Principles of assessment, formative and summative assessment-internal assessment external examination, advantages and disadvantages.</li> <li>Criterion and norm referencedevaluation,</li> </ul>
V	12	10	Standardized and non-standardized tests:  Meaning, characteristics, objectivity, validity, reliability, usability, norms, construction of tests-  Essay, short answer questions and multiple choice questions.  Rating scales, checklist, OSCE/OSPE(Objective structured clinical/practical examination)  Differential scales, and summated scales, sociometry, anecdotal record, attitude scale, critical incident technique Question bank-preparation, validation, moderation by panel, utilization  Developing a system for maintaining confidentiality
VI	8	5	Administration, Scoring and Reporting  Administering a test; scoring, grading versus marks  Objective tests, scoring essay test, methods of scoring, Item analysis.
VII	12	6	Standardized Tools  ☐ Tests of intelligence aptitude, interest, personality, achievement, socio-economic status scale, tests for special mental and physical abilities and disabilities.

Units	Hours		Course Content
	Theory	Practical	
VIII	5	6	<ul> <li>Nursing Educational programs</li> <li>□ Perspectives of nursing education: Global and national.</li> <li>□ Patterns of nursing education and training programmes in India. Non-university and University programs: ANM, GNM, Basic B.Sc. Nursing, Post Certificate B.Sc. Nursing, M.Sc(N) programs, M.Phil and Ph.D) in Nursing, post basic diploma programs, nurse practitioner programs.</li> </ul>
IX	12	25	<ul> <li>Continuing Education in Nursing</li> <li>Concepts - Definition, importance, need scope, principles of adult learning, assessments of learning needs, priorities, resources.</li> <li>Program planning, implementation and evaluation of continuingeducation programs.</li> <li>Research in continuing education.</li> <li>Distance education in nursing.</li> </ul>
X	10	10	<ul> <li>Curriculum Development</li> <li>Definition, curriculum determinants, process and steps of curriculum development, Curriculum models, Types and framework.</li> <li>Formulation of philosophy, objectives, selection and organization of learning experiences; master plan, course plan, unit plan.</li> <li>Evaluation strategies, process of curriculum change, role of students, faculty, administrators, statutory bodies and other stakeholders.</li> <li>Equivalency of courses: Transcripts, credit system.</li> </ul>
XI	8		Teacher preparation  □ Teacher − roles & responsibilities, functions, characteristics, competencies, qualities,  □ Preparation of professional teacher  □ Organizing professional aspects of teacher preparation programs  □ Evaluation: self and peer  □ Critical analysis of various programs of teacher education in India.

Units	Hours		Course Content
	Theory	Practical	
XII	10	5	Guidance and counseling  □ Concept, principles, need, difference between guidance and counseling, trends andissues.  □ Guidance and counseling services: diagnostic and remedial.  □ Coordination and organization of services.  □ Techniques of counseling: Interview, case work, characteristics of counselor, problems in counseling.  □ Professional preparation and training for counseling.
XIII	15	10	Administration of Nursing Curriculum  □ Role of curriculum coordinator — planning, implementation and evaluation.  □ Evaluation of educational programs in nursing-course and program.  □ Factors influencing faculty staff relationship and techniques of working together.  □ Concept of faculty supervisor (dual) position.  □ Curriculum research in nursing.  □ Different models of collaboration between education and service
XIV	10		Management of nursing educational institutions  □ Planning, organizing, staffing, budgeting, recruitment, discipline, public relation, performance appraisal, welfare services, library services, hostel,
XV	5	5	<ul> <li>Development and maintenance of standards and accreditation in nursing education programs.</li> <li>Role of Indian Nursing Council, State Registration Nursing Councils, Boards and University.</li> <li>Role of Professional associations and unions.</li> </ul>

## **Activities:**

- Framing philosophy, aims and objectives.
- Lesson Planning.
- Micro teaching-2.
- Conduct practice teachings using different teaching strategies -10 (like lecture cum discussion, demonstration- lab method, fieldtrips, seminars, project, role play, panel discussion, clinical methodsetc)
- Preparation and utilization of instructional Aids using differentmedia.
- Develop course plans, unit plans, rotation plans.
- Conduct a continuing education workshop.
- Annotated bibliography.
- Critical evaluation of any nursing education program offered by a selected institution.
- Planning and Organizing field visits.

- Educational visits.
- Field visits (INC/SNRC) to get familiar with recognition/registration process.
- Construct, administer and evaluate tools (objective & essay type test, observation checklist, rating scale etc.)
- Observe and practice application of various non-standardized tests (intelligence, Aptitude, Personality, Sociometry, physical & mental disabilities tests.)

### **Methods of Teaching**

- Lecture cum discussion
- Demonstration/ Return demonstration
- Seminar / Presentations
- Project work
- Field visits
- Workshop

### Methods of evaluation

- Tests
- Presentation
- Project work
- Written assignments

#### **Internal Assessment**

Techniques	Weightage
Test- (2 tests)	50
Assignment	25
Seminar/presentation	25
	100
Practical – Internal assessment	
Looming recovery metarial	25
Learning resource material	25
Practice Teaching	50
Conduct Workshop	25
/Short Term Course	
Practical – external assessment	50
Practice teaching- 1-	30
Preparation/use of learning resource material-1	25
Construction of tests/rotation plan.	25

#### ADVANCE NURSINGPRACTICE

Placement: 1st Year

Hours of Instruction Theory 150 Hours Practical 200 Hours Total: 350 Hours

#### **Course Description**

The course is designed to develop an understanding of concepts and constructs of theoretical basis of advance nursing practice and critically analyze different theories of nursing and other disciplines.

## **Objectives:**

At the end of the course the students will be able to:

- 1. Appreciate and analyze the development of nursing as aprofession.
- 2. Describe ethical, legal, political and economic aspects of healthcare delivery and nursing practice.
- 3. Explain bio- psycho- social dynamics of health, life style and health care delivery system.
- 4. Discuss concepts, principles, theories, models, approaches relevantto nursing and their application.
- 5. Describe scope of nursing practice.
- 6. Provide holistic and competent nursing care following nursing process approach.
- 7. Identify latest trends in nursing and the basis of advance nursing practice.
- 8. Perform extended and expanded role of nurse.
- 9. Describe alternative modalities of nursing care.
- 10. Describe the concept of quality control in nursing.
- **1**. Identify the scope of nursing research.
- 12. Use computer in patient care delivery system and nursing practice.
- 13. Appreciate importance of self development and professional advancement.

## **Course Content**

Unit	Hours	Content
I	10	<ul> <li>Nursing as a Profession</li> <li>History of development of nursing profession, characteristics, criteria of the profession, perspective of nursing profession-national, global</li> <li>Code of ethics(INC), code of professional conduct(INC), autonomy and accountability, assertiveness, visibility of nurses, legal considerations,</li> <li>Role of regulatory bodies</li> <li>Professional organizations and unions-self defense, individual and collective bargaining</li> <li>Educational preparations, continuing education, career opportunities, professional advancement &amp; role and scope of nursing education.</li> <li>Role of research, leadership and management.</li> <li>Quality assurance in nursing (INC).</li> <li>Futuristic nursing.</li> </ul>
II	5	Health care delivery  Health care environment, economics, constraints, planning process, policies, political process vis a vis nursing profession.  Health care delivery system- national, state, district and local level.  Major stakeholders in the health care system-Government, non-govt, Industry and other professionals.  Patterns of nursing care delivery in India.  Health care delivery concerns, national health and family welfare programs, inter-sectoral coordination, role of non- governmental agencies.  Information, education and communication (IEC).  Tele-medicine.
Ш	10	Genetics  □ Review of cellular division, mutation and law of inheritance, human genome project ,The Genomic era.  □ Basic concepts of Genes, Chromosomes & DNA.  □ Approaches to common genetic disorders.  □ Genetic testing — basis of genetic diagnosis, Pre symptomatic and predisposition testing, Prenatal diagnosis & screening, Ethical, legal & psychosocial issues in genetic testing.  □ Genetic counseling.  □ Practical application of genetics in nursing.
IV	10	Epidemiology  □ Scope, epidemiological approach and methods, □ Morbidity, mortality, □ Concepts of causation of diseases and their screening, □ Application of epidemiology in health care delivery, Health survelliance and health informatics □ Role of nurse

11

Unit	Hours	Content
V	20	Bio-Psycho social pathology Pathophysiology and Psychodynamics of disease causation Life processes, homeostatic mechanism, biological and psycho-social dynamics in causation of disease, life style Common problems: Oxygen insufficiency, fluid and electrolyte imbalance, nutritional problems, hemorrhage] and shock, altered body temperature, unconsciousness, sleep pattern andits disturbances, pain, sensory deprivation. Treatment aspects: pharmacological and pre- postoperative care aspects, Cardio pulmonary resuscitation. End of life Care Infection prevention (including HIV) and standardsafety measures, bio-medical waste management. Role of nurse- Evidence based nursing practice; Best practices Innovations in nursing Overview of COVID-19 infections. Epidemiology, infection process, clinical manifestations, diagnosis, treatment and dietetics. Nursing Assessment –History and Physical assessment Control and eradication of COVID-19
VI	20	<ul> <li>Philosophy and Theories of Nursing</li> <li>Values, Conceptual models, approaches.</li> <li>Nursing theories: Nightingale's, Hendersons's, Roger's, Peplau's, Abdella's, Lewine's, Orem's, Johnson's, King's, Neuman's, Roy's, Watson parsce, etc and their applications,</li> <li>Health belief models, communication and management, etc</li> <li>Concept of Selfhealth.</li> <li>Evidence based practice model.</li> </ul>
VIII	10	<ul> <li>Nursing process approach</li> <li>□ Health Assessment- illness status of patients/clients (Individuals, family, community), Identification of health- illness problems, health behaviors, signs and symptoms of clients.</li> <li>□ Methods of collection, analysis and utilization of data relevant to nursing process.</li> <li>□ Formulation of nursing care plans, health goals, implementation, modification and evaluation of care.</li> </ul>

IX	30	Psychological aspects and Human relations  Human behavior, Life processes & growth and development, personality development, defense mechanisms,  Communication, interpersonal relationships, individual and group, group dynamics, and organizationalbehavior,  Basic human needs, Growth and development, (Conception through preschool, School age through adolescence, Young & middle adult, and Older adult)  Sexuality and sexual health.  Stress and adaptation, crisis and its intervention,  Coping with loss, death and grieving,  Principles and techniques of Counseling.
	V	

Unit	Hours	Content
X	10	Nursing practice  Framework, scope and trends.  Alternative modalities of care, alternative systems of health and complimentary therapies.  Extended and expanded role of the nurse, in promotive, preventive, curative and restorative health care delivery system in community and institutions.  Health promotion and primary health care.  Independent practice issues,- Independent nurse-midwifery practitioner.  Collaboration issues and models-within and outside nursing.  Models of Prevention,  Family nursing, Home nursing,  Gender sensitive issues and womenempowerment.  Disaster nursing.  Geriatric considerations in nursing.  Evidence based nursing practice- Best practices  Trans-cultural nursing.
XI	25	Computer applications for patient care delivery system and nursing practice  Use of computers in teaching, learning, research nursing practice.  Windows, MS office: Word, Excel, Power Point, Internet, literature search, Statistical packages, Hospital management information system: softwares.

## Practical

Clinical posting in the following areas:

Specialty area- in-patient unit
 Community health center/PHC
 Emergency/ICU
 2 weeks
 2 weeks

## Activities

- Prepare Case studies with nursing process approach and theoretical basis
- Presentation of comparative picture oftheories
- Family case- work using model of prevention
- Annotated bibliography
- Report of field visits (5)

### **Methods of Teaching**

- Lecture cum discussion
- Seminar
- Panel discussion
- Debate
- Case Presentations
- Exposure to scientific conferences
- Field visits

### **Methods of evaluation:**

- Tests
- Presentation
- Seminar
- Written assignments

## **Advance nursing Procedures**

Definition, Indication and nursing implications;

 CPR, TPN, Hemodynamic monitoring, Endotrcheal intubation, Tracheostoma, mechanical ventilation, Pacemaker, Hemodialysis, Peritonial dialysis, LP, BT Pleural and abdominal parecentasis OT techniques, Health assessment, Triage, Pulse oxymetry

#### **Internal Assessment**

Techniques	Weightage
Test- (2 tests) Assignment Seminar/presentation	50 25 25
	100

#### CLINICAL SPECIALITY - I

#### MEDICAL SURGICAL NURSING

Placement: 1st Year

Hours of instruction Theory: 150 Hours Practical: 650 Hours Total: 800Hours

#### **Course Description**

This course is common for the students undergoing clinical speciality-II in neuro science nursing/cardiovascular & thoracic nursing/critical care nursing/oncology nursing/orthopaedic and rehabilitation nursing/nephro & urology nursing, gastroenterology nursing/ geriatric nursing.

It is designed to assist students in developing expertise and in depth knowledge in the field of medical Surgical Nursing. It will help students to appreciate the patient as a holistic individual and develop skill to function as a specialized Medical-Surgical Nurse. It will further enable the student to function as educator, manager and researcher in the field of Medical – Surgical Nursing.

## **Objectives**

At the end of the course the students will be able to:

- 1. Appreciate the trends & issues in the field of Medical Surgical Nursing as a speciality.
- 2. Apply concepts & theories related to health promotion.
- 3. Appreciate the client as a holistic individual.
- 4. Perform physical, psychosocial assessment of Medical Surgical patients.
- 5. Apply Nursing process in providing care to patients.
- 6. Integrate the concept of family centered nursing care with associated disorder such as genetic, congenital and long-term illness.
- 7. Recognize and manage emergencies with Medical-Surgical patients.
- 8. Describe various recent technologies & treatment modalities in the management of critically ill patients.
- 9. Appreciate the legal & ethical issues relevant to Medical Surgical Nursing.
- 10. Prepare a design for layout and management of Medical Surgical Units.

- 11. Appreciate the role of alternative systems of Medicine in care of patients.
- 12. Incorporate evidence based Nursing practice and identify the areas of research in the field of Medical Surgical Nursing.
- 13. Recognize the role of Nurse practitioner as a member of the Medical Surgical health team.
- 14. Teach Medical Surgical Nursing to undergraduate nursing students & in-service nurses.

#### **COURSE CONTENT:**

	COURSE CONTENT:		
Unit	Hours	Content	
I	5	Introduction:  Historical development of Medical- Surgical Nursing in India.  Current status of health and disease burden in India.  Current concept of health.  Trends & issues in Medical – Surgical Nursing.  Ethical & cultural issues in Medical – Surgical Nursing.  Rights of patients.  National health policy, special laws & ordinances relating to older people.  National goals.  Five yearplans.  National health programs related to adult health.	
II	20	Health Assessment of patients  History taking. Physical examination of various systems. Nutritional assessment. Related investigations and diagnosticassessment.	
III	5	Care in hospital settings:  Ambulatory care.  Acute and Critical care.  Long term care.  Home Health Care.  Characteristics, care models, practice settings, interdisciplinary team.  Hospitalization- effects of hospitalization on the patient &family.  Stressors & reactions related to disease process.  Nursing care using Nursing process approach.	
IV	10	<ul> <li>Management of patients with disorders of Gastro intestinal tract</li> <li>Review of anatomy and physiology.</li> <li>Common Disorders-etiology, Patho physiology, Clinical manifestations, complications, prognosis.</li> <li>Health assessment- History taking, physical examination, investigation and diagnostic assessment.</li> <li>Treatment modalities and trends.</li> <li>Nursing management.</li> <li>Related research studies.</li> <li>Evidence based nursing practice.</li> <li>Rehabilitation and follow-up.</li> </ul>	

Unit	Hours	Content	
		Management of patients with disorders of nervous system	
V	10	<ul> <li>Review of anatomy and physiology.</li> <li>Common Disorders- etiology, Patho physiology, Clinical manifestations, complications, prognosis.</li> <li>Health assessment-History taking, physical examination, investigation and diagnostic assessment.</li> <li>Treatment modalities and trends.</li> <li>Nursing management.</li> <li>Related research studies.</li> <li>Evidence based nursing practice.</li> <li>Rehabilitation and follow-up.</li> </ul>	
VI	10	Management of patients with disorders of respiratory system  Review of anatomy and physiology. Common Disorders- etiology, Patho physiology, Clinical manifestations, complications, prognosis. Health assessment-History taking, physical examination, investigation and diagnostic assessment. Treatment modalities and trends. Nursing management. Related research studies. Evidence based nursing practice. Rehabilitation and follow-up.	
VII	10	<ul> <li>Management of patients with disorders of cardio vascular system</li> <li>Review of anatomy and physiology.</li> <li>Common Disorders- etiology, Patho physiology, Clinical manifestations, complications, prognosis.</li> <li>Health assessment-History taking, physical examination, investigation and diagnostic assessment.</li> <li>Treatment modalities and trends.</li> <li>Nursing management.</li> <li>Related research studies.</li> <li>Evidence based nursing practice.</li> <li>Rehabilitation and follow-up.</li> </ul>	
VIII	5	Management of patients with disorders of blood Review of anatomy and physiology. Common Disorders- etiology, Patho physiology, Clinical manifestations, complications, prognosis. Health assessment-History taking, physical examination, investigation and diagnostic assessment. Treatment modalities and trends. Nursing management. Related research studies Evidence based nursing practice Rehabilitation and follow-up	
IX	10	Management of patients with disorders of genito urinary system  □ Review of anatomy and physiology. □ Common Disorders- etiology, Patho physiology, Clinical manifestations, complications, prognosis.	

Unit	Hours	Content	
		□ Health assessment-History taking, physical examination,	
		investigation and diagnostic assessment.	
		□ Treatment modalities and trends.	
		□ Nursing management.	
		□ Related research studies.	
		□ Evidence based nursing practice.	
		□ Rehabilitation and follow-up.	
		Management of patients with disorders of endocrine system	
		□ Review of anatomy and physiology.	
		□ Common Disorders- etiology, Patho physiology, Clinical	
		manifestations, complications, prognosis.	
		□ Health assessment-History taking, physical examination,	
X	10	investigation and diagnostic assessment.	
		□ Treatment modalities and trends.	
		□ Nursing management.	
		Related research studies.	
		Evidence based nursing practice.  - Rehabilitation and follows up	
		□ Rehabilitation and follow-up.	
		Management of patients with disorders of musculo-skeletal	
		system	
		Review of anatomy and physiology.	
		Common Disorders- etiology, Patho physiology, Clinical	
		manifestations, complications, prognosis.	
		□ Health assessment-History taking, physical examination,	
XI	10	investigation and diagnostic assessment.	
111	10	□ Treatment modalities and trends.	
		□ Nursing management.	
		□ Related research studies.	
		□ Evidence based nursing practice.	
		□ Rehabilitation and follow-up.	
		Management of patients with disorders of integumentory system	
		Review of anatomy and physiology.	
		□ Common Disorders- etiology, Patho physiology, Clinical	
		manifestations, complications, prognosis.  Health assessment-History taking, physical examination,	
	4	investigation and diagnostic assessment.	
XII	8	Treatment modalities and trends.	
		Nursing management.	
		□ Related research studies.	
-	( )	□ Evidence based nursing practice.	
	1 1 m	Rehabilitation and follow-up.	
	•	T.	
		Management of patients with disorders of Eye and ENT	
		□ Review of anatomy and physiology.	
		□ Common Disorders-etiology, Patho physiology, Clinical	
XIII	5	manifestations, complications, prognosis.	
		□ Health assessment-History taking, physical examination,	
		investigation and diagnostic assessment.	
		□ Treatment modalities and trends.	

Unit	Hours	Content	
		□ Nursing management.	
		□ Related research studies.	
		□ Evidence based nursing practice.	
		□ Rehabilitation and follow-up.	
		Management of patients with disorders of reproductive system	
		□ Review of anatomy and physiology.	
		□ Common Disorders- etiology, Patho physiology, Clinical	
		manifestations, complications, prognosis.	
		☐ Health assessment-History taking, physical examination,	
*/**/	0	investigation and diagnostic assessment.	
XIV	8	□ Treatment modalities and trends.	
		□ Nursing management.	
		□ Related research studies.	
		□ Evidence based nursing practice.	
		□ Rehabilitation and follow-up.	
		Geriatric nursing	
		□ Nursing Assessment-History and Physical assessment.	
		□ Ageing;	
		Demography; Myths andrealities.	
		□ Concepts and theories ofageing.	
		□ Cognitive Aspects of Ageing.	
		Normal biological ageing.	
		☐ Age related body systems changes.	
		Psychosocial Aspects of Aging.	
		☐ Medications and elderly.	
		□ Stress & coping in older adults. □ Common Health Problems & Nursing Management;	
XV	8	□ Psychosocial and Sexual.	
AV	0	□ Abuse of elderly.	
		Role of nurse for care of elderly: ambulation, nutritional,	
		communicational, psychosocial and spiritual.	
		□ Role of nurse for caregivers of elderly.	
		□ Role of family and formal and non formal caregivers.	
		□ Use of aids and prosthesis (hearing aids, dentures,	
		□ Legal & Ethical Issues.	
		Provisions and Programmes for elderly; privileges, Community Programs	
		and health services;	
		Home and institutional care.	
		Issues, problems and trends.	
4			
	1	Management of patients with communicable and sexually	
A Total	•	transmitted diseases:	
		Review of immune system.	
		□ Common Disorders of immune system − HIV/AIDS. □ Review of infectious disease process	
XVI	8	□ Review of infectious disease process. □ Communicable Diseases- etiology, Patho physiology, Clinical	
		manifestations, complications, prognosis.	
		☐ Health assessment-History taking, physical examination,	
		investigation and diagnostic assessment.	
		□ Treatment modalities and trends.	

Unit	Hours	Content
		<ul> <li>Nursing management.</li> <li>Related research studies.</li> <li>Evidence based nursing practice.</li> <li>Rehabilitation and follow-up.</li> </ul>
XVII	8	Emergency, trauma and multi-system organ failure  DIC (disseminated intravascular coagulation)  Trauma, burns, poisoning  Etiology, Patho physiology, Clinical manifestations, complications, prognosis.  Health assessment-History taking, physical examination, investigation and diagnostic assessment.  Treatment modalities and trends.  Nursing management.  Related research studies.  Evidence based nursing practice.  Rehabilitation and follow-up.
		MANCHALUNIVERSIN

### **Practical**

Total = 660 Hours 1 Week = 30 Hours

S.No.	Dept/Unit	No. of Week	Total Hours
	General Medical Ward	4	120 Hours
	General Surgical Ward	4	120 Hours
	ICUs	4	120 Hours
	Oncology	2	60 Hours
	Ortho	2	60 Hours
	Cardio	2	60 Hours
	Emergency Department	2	60 Hours
	Neuro	2	60 Hours
	Total	22 Weeks	660 Hours

## **Student Activities:**

- Clinical presentations
- History taking
- Health Assessment
- Nutritional Assessment
- Health Education related to disease conditions
- Case studies
- Project work
- Field visits

#### CLINICAL SPECIALITY-I

#### OBSTETRIC AND GYNAECOLOGICALNURSING

Placement: 1st year

Hours of Instruction Theory: 150 Hours. Practical: 650 Hours. Total: 800 Hours.

#### **Course Description**

This course is designed to assist students in developing expertise and in- depth understanding in the field of Obstetric and Gynaecological Nursing. It will help students to appreciate the client as a holistic individual and develop skill to function as an independent midwifery practitioner. It will further enable the student to function as educator, manager, and researcher in the field of Obstetric and Gynaecological nursing

#### **Objectives**

At the end of the course the students will be able to:

- 1. Appreciate the trends in the field of midwifery, obstetrics and gynaecology as a speciality.
- 2. Describe the population dynamics and indicators of maternal and child health
- 3. Describe the concepts of biophysical, psychological and spiritual aspects of normal pregnancy, labor and puerperium.
- 4. Provide comprehensive nursing care to women during reproductive period and newborns.
- 5. Integrate the concepts of family centered nursing care and nursing process approach in obstetric and gynaecological nursing.
- 6. Identify and analyze the deviations from normal birth process and refer appropriately.
- 7. Describe the pharmacological agents, their effects during pregnancy, child birth, puerperium, lactation and the role ofnurse
- 8 Counsel adolescents, women and families on issues pertaining to pregnancy, child birth and lactation
- 9. Describe the role of various types of complementary and alternative therapies in obstetric and gynaecological nursing.
- 10. Incorporate evidence based nursing practice and identify the areas of research in the field of obstetric and gynaecological nursing.
- **1**. Describe the recent advancement in contraceptive technology and birth control measures
- 12. Appreciate the legal and ethical issues pertaining to obstetric and gynaecological nursing

Units	Hours	Content	
I	10	Introduction  Historical and contemporary perspectives Epidemiological aspects of maternal and child health Magnitude of maternal and child health problems Issues of maternal and child health : Age, Gender, Sexuality, psycho Socio cultural factors Preventive obstetrics National health and family welfare programmes related to maternal and child health: health care delivery system- National Rural health mission, Role of NGO's Theories, models and approaches applied to midwifery practice Role and scope of midwifery practice: IndependentNurse midwifery practitioner Legal and Ethical issues: Code of ethics and standardsof midwifery practice, standing orders Evidence based midwifery practice Research priorities in obstetric and gynaecological nursing.	
п	15	Human reproduction  Review of anatomy and physiology of human reproductive system: male and female Hormonal cycles Embryology Genetics, teratology and counseling Clinical implications	
III	25		

Units	Hours	Content	
		Normal Labour and nursing management:  Essential factors of labour  Stages and onset	
		<ul> <li>First stage: Physiology of normallabour</li> <li>Use of partograph: Principles, use and critical analysis, evidence based studies</li> <li>Analgesia and anaesthesia in labour</li> <li>Nursing management</li> </ul>	
IV	25	<ul> <li>Second stage</li> <li>Physiology, intrapartum monitoring</li> <li>Nursing management.</li> <li>Resuscitation, immediate newborn care and initiate breast feeding (Guidelines of National neonatalogy forum of India)</li> </ul>	
		Third stage  • Physiology and nursing management	
		Fourth stage – Observation, critical analysis and Nursing management.  • Various child birth practice: water birth, position change etc • Evidence based practice in relation to labour intervention  Role of nurse midwifery practitioner • Alternative/complementary therapies	
V	20	Normal puerperium and nursing management  Physiology of puerperium  Physiology of lactation, lactation management, exclusive breast feeding ,Baby friendly hospitalintitative(BFHI)  Assessment of postnatal women .  Minor discomforts and complications of puerperium  Management of mothers during puerperium: Postnatal exercises Rooming in, bonding, warm chain  Evidence based studies  Role of nurse midwifery practitioner  Alternative/complementary therapies	
	Normal Newborn  Physiology and characteristics of normalnewborn  Physical and Behavioural assessment of newborn  Needs of newborn		
VI	20	<ul> <li>Essential newborn care: Exclusive breast feeding, Immunization,         Hygiene measures, Newbornnutrition</li> <li>Organization of neonatal care, services(Levels), transport, neonatal intensive care unit, organization and management of nursing services in NICU</li> <li>Observation and care of newborn</li> </ul>	
		□ Parenting process	

Units	Hours	Content	
VII	10	Pharmoco dynamics in obstetrics  □ Drugs used in pregnancy, labour, post partum andnewborn  □ Calculation of drug dose and administration  □ Effects of drugs used  □ Anaesthesia and analgesia in obstetrics  □ Roles and responsibilities of midwifery nurse practitioner  □ Standing orders and protocols and use of selected life saving drugs and interventions of obstetric emergencies approved by the MOHFW	
VIII	10	Family welfare services  Population dynamics Demography trends: vital statistics, calculation of indicators especially maternal and neonatal mortality rates and problems and other health problems Recent advancement in contraceptive technology Role of nurses in family welfare programmes in all settings Role of independent nurse midwiferypractitioner Family life education Evidence based studies Information, Education and Communication(IEC) Management information and evaluationsystem(MIES) Teaching and supervision of health team members	
IX	5	Infertility  Primary and secondary causes  Diagnostic procedures  Counseling: ethical and legal aspects of assistedreproductive technology(ART)  Recent advancement in infertilitymanagement.  Adoption procedures  Role of nurses in infertilitymanagement.	
X	5	Menopause  Physiological, psychological and social aspects Hormone Replacement Therapy Surgical menopause Counseling and guidance  Role of midwifery nurse practitioner	
XI	5	Abortion  Types, causes Legislations, Clinical rights and professional responsibility Abortion procedures Complications Nursing management  Role of midwifery nurse practitioner	

S.No.	Deptt./Unit	No. of Week	Total Hours
1	Anetenatal Wards & OPDs	4	120
2	Labour Room	5	150
3	Postnatal Ward	2	60
4	Family Planning Clinics	2	60
5	PHC/Rural maternity settings	4	120
6	Gynae	2	60
7	Maternity OT	2	60
8	NICU	1	30
	Total	22 Weeks	660Hours

#### **Procedures observed**

- Diagnostic investigations: amniotcentecis, chordocentecis, chorionic villi sampling
- Infertility management: artificial reproduction : artificial insemination, invitro fertilization, and related procedures

#### **Procedures assisted**

Medical termination of pregnancy

## **Procedures performed**

- Antenatal assessment-20
- Postnatal assessment-20
- Assessment during labour: use of partograph 20
- Per vaginal examination-20
- Conduct of normal delivery-20
- Episiotomy and suturing-10
- Setting up of delivery areas
- Insertion of intra uterine devices( copper T)

#### **Others**

- Identification of high risk women and referral
- Health education: to women and their families
- Motivation of couples for planned parenthood

#### CLINICAL SPECIALTY -I

#### CHILD HEALTH (PAEDIATRIC) NURSING

Placement : Ist Year

Hours of Instruction Theory 150 Hours Practical 650 Hours Total: 800Hours

### **Course Description**

This course is designed to assist students in developing expertise and in-depth understanding in the field of Pediatric Nursing. It will help students to appreciate the child as a holistic individual and develop skill to function as neonatal and pediatric nurse specialist. It will further enable the student to function as educator, manager, and researcher in the field of Paediatric nursing

#### **Objectives**

At the end of the course the students will be ableto:

- 1. Appreciate the history and developments in the field of pediatrics and pediatric nursing as a specialty
- 2. Apply the concepts of growth and development in providing care to the pediatric clients and their families.
- 3. Appreciate the child as a holistic individual
- 4. Perform physical, developmental, and nutritional assessment of pediatric clients
- 5. Apply nursing process in providing nursing care to neonates & children
- 6. Integrate the concept of family centered pediatric nursing care with related areas such as genetic disorders, congenital malformations and long term illness.
- 7. Recognize and manage emergencies in neonates
- 8. Describe various recent technologies and treatment modalities in the management of high riskneonates
- 9. Appreciate the legal and ethical issues pertaining to pediatric and neonatal nursing
- 10. Prepare a design for layout and management of neonatal units
- 11. Incorporate evidence based nursing practice and identify the areas of research in the field of pediatric/neonatalnursing
- 12. Recognize the role of pediatric nurse practitioner and as a member of the pediatric and neonatal healthteam
- 13. Teach pediatric nursing to undergraduate students & in-service nurses.

## **Course Content**

Unit	Hours	Content	
I	10	<ul> <li>Introduction</li> <li>Historical development of Pediatrics and Pediatric Nursing in India;</li> <li>Current status of child health in India;</li> <li>Trends in Pediatrics and Pediatric Nursing,</li> <li>Ethical and cultural issues in pediatric care</li> <li>Rights of children</li> <li>National health policy for children, special laws and ordinances relating to children.</li> <li>National goals,</li> <li>Five yearplans,</li> <li>National health programs related to childhealth.</li> </ul>	
п	10 Hrs	Assessment of pediatric clients  History taking Developmental assessment Physical assessment Nutritional assessment Family assessment	
III	10	Hospitalized child  Meaning of hospitalization of the child, preparation for hospitalization, effects of hospitalization on the child and family  Stressors and reactions related to developmental stages, play activities for ill hospitalized child.  Nursing care of hospitalized child and family -principles and practices	
IV	15	<ul> <li>Pre-natal Pediatrics</li> <li>Embryological and fetal development, Prenatal factors influencing growth and development offetus,</li> <li>Genetic patterns of common pediatric disorders, chromosomal aberrations, genetic assessment and counseling legal and ethical aspects of genetic, screening and counseling role of nurse in genetic counseling, Importance of prenatal care and role of pediatric nurse.</li> </ul>	
M	15	Growth and Development of children  □ Principles of growth and development,  □ Concepts and theories of growth and development,  □ Developmental tasks and special needs from infancyto adolescence, developmentalmilestones,  □ Assessment of growth and development of pediatricclients,  □ Factors affecting growth and development.	
VI	15	Behavioral Pediatrics and Pediatric Nursing  Parent child relationship,  Basic behavioral pediatric principles and specific behavioral pediatric concepts/disorders- maternal deprivation, failure	

Unit	Hours	Content	
		to thrive, child abuse, the battered child,  Common behavioral problems and their management,  Child guidance clinic.	
VII	15	Preventive Pediatrics and Pediatric Nursing  Concept, aims and scope of preventive pediatrics,  Maternal health and its influence on child health antenatal aspects of preventive pediatrics,  Immunization, expanded program on immunization/ universal immunization program and cold chain,  Nutrition and nutritional requirements of children, changing patterns of feeding, baby- friendly hospital initiative and exclusive breast feeding,  Health education, nutritional education forchildren  Nutritional programs  National and international organizations related to child health,  Role of pediatric nurse in the hospital and community.	
VIII	30	New born baby- profile and characteristics of the newborn,  Assessment of the new born,  Nursing care of the new born at birth, care of the new born and family,  High risk newborn- pre term and term neonate andgrowth retarded babies,  Identification and classification of neonates with infections, HIV & AIDS, Ophthalmia neonatorum, congenital syphilis.  High risk new born- Identification, classification and nursing management  Organization of neonatal care, services(Levels), transport, neonatal intensive care unit, organization and management of nursing services in NICU.	
IX	30	IMNCI (Integrated management of neonatal and childhood illnesses)	

### **Practical**

Total = 660Hours 1 Week = 30Hours

S.No.	Deptt./Unit	No. of Week	Total Hours
1	Pediatric Medicine Ward	4	120 Hours
2	Pediatric Surgery Ward	4	120 Hours
3	Labor Room/Maternity Ward	2	60 Hours
4	Pediatric OPD	2	60 Hours
5	NICU	4	120 Hours
6	Creche	1	30 Hours
7	Child Guidance Clinic	1	30 Hours
8	Community	4	120 Hours
	Total	22 Weeks	660 Hours

## **Student Activities**

- Clinical presentations
- Growth & developmental assessment
- Assessment & prescription of nursing interventions for sick children
- Health education related to disease conditions
- Nutritional assessment
- Project work
- Field visits

#### CLINICAL SPECIALITY - I

#### MENTAL HEALTH (PSYCHIATRIC) NURSING

Placement: 1st Year

Hours of Instruction Theory 150 hours Practical 650 hours Total 800hours

### **Course Description**

This course is designed to assist students in developing expertise and in-depth understanding in the field of Psychiatric Nursing. It will help students to appreciate the client as a holistic individual and develop skill to function psychiatric nurse specialist. It will further enable the student to function as educator, manager, and researcher in the field of Psychiatric nursing

#### **Objectives**

At the end of the course the students will be able to:

- 1. Appreciate the trends and issues in the field of psychiatry and psychiatric nursing.
- 2. Explain the dynamics of personality development and human behaviour.
- 3. Describe the concepts of psychobiology in mental disorders and its implications for psychiatric nursing
- 4. Demonstrate therapeutic communications skills in all interactions
- 5. Demonstrate the role of psychiatric nurse practitioner in various therapeutic modalities
- 6. Establish and maintain therapeutic relationship with individual and groups
- 7. Uses assertive techniques in personal and professional actions
- 8. Promotes self-esteem of clients, others and self
- 9. Apply the nursing process approach in caring for patients with mental disorders
- 10. Describe the psychopharmacological agents, their effects and nurses role
- 11. Recognize the role of psychiatric nurse practitioner and as a member of the psychiatric and mental health team
- 12. Describe various types of alternative system of medicines used in psychiatric settings
- 13. Incorporate evidence based nursing practice and identify the areas of research in the field of psychiatric nursing

## **Course Content**

Units	Hours	Content
I	15	Introduction  Mental Health and Mental Illness Historical perspectives Trends, issues and magnitude Contemporary practices Mental health laws/Acts National mental health program -National mental health authority, state mental health authority Human rights of mentally ill Mental Health/Mental Illness Continuum Classification of mental illnesses-ICD, DSM Standards of Psychiatric nursing Challenges and Scope of psychiatricnursing Multi-disciplinary team and role of nurse  Role of psychiatric nurse- extended and expanded
II	10	Concepts ofPsychobiology  The Nervous System: An Anatomical Review The Brain and limbic system Nerve Tissue Autonomic Nervous system Neurotransmitters Neuroendocrinology Pituitary, Thyroid Gland Circadian Rhythms Genetics Neuro psychiatric disorders Psychoimmunology Normal Immune response Implications for psychiatric Illness Implications for Nursing
III	10	Theories of Personality Development and relevance to nursing practice  Psychoanalytic Theory- Freud's Interpersonal Theory-Sullivan's Theory of Psychosocial Development-Erikson's Theory of object relations Cognitive Development Theory Theory of Moral Development A Nursing Model-Hildegard E.Peplau
IV	5	Stress and its management  An introduction to the concepts of stress  Psychological Adaptation to stress  Stress as a Biological Response.  Stress as an Environmental Event.

Units	Hours	Content	
		<ul> <li>Stress as Transaction between the Individual andthe Environment.</li> <li>Stress management.</li> </ul>	
V	10	Therapeutic communication and interpersonal relationship  Review communication process, factors affecting communication  Communication with individuals and in groups  Techniques of therapeutic communication-touch therapy  Barrier of communication with specific reference to psychopathology  Therapeutic attitudes  Dynamics of a therapeutic Nurse-client relationship;  Therapeutic use of self Gaining self-awareness  Therapeutic nurse-patient relationship its phases; Conditions essential to development of a therapeutic relationship  Therapeutic impasse and its management	
VI	10	Assertive Training  Assertive Communication  Basic Human Rights  Response Patterns  (Nonassertive Behavior  Assertive Behavior  Aggressive Behavior  Passive-Aggressive Behavior)  Behavioral Components of Assertive Behavior  Techniques that Promote Assertive Behavior  Thought-Stopping Techniques Method  Role of The Nurse	
VII	10	Promoting Self-Esteem  Components of Self-Concept  The Development of Self-Esteem  The Manifestations of Low-Self-Esteem  Boundaries  Role of The Nurse	
N	5	Women and Mental Health  Normal reaction to conception, pregnancy and puerperium Problems related to conception, pregnancy and puerperium and its management.  Counselling – Premarital, marital and genetic	

Units	Hours	Content
VIII	10	The nursing process in psychiatric/mental health nursing  □ Mental health assessment- History taking, mental status examination  □ Physical and neurological examination  □ Psychometric assessment  □ Investigations, Diagnosis and Differential diagnosis  □ Interpretation of investigations  □ Nurse's role  □ Nursing case management
IX	35	Psycho soc al and physical therapies  Individual therapy Behavioural Therapy- Relaxation therapy, cognitive therapy, positive- negative reinforcement, bio-feedback, guided imagery, ab-reactive therapy Group Therapy Family Therapy Milieu Therapy The Therapeutic Community Occupational therapy Recreational therapy Play therapy Music therapy Light therapy Color therapy Aroma therapy
XI	5	Electroconvulsive Therapy  Historical Perspectives  Indications Contraindications Mechanisms of Action Side Effects Risks Associated with Electroconvulsive Therapy The Role of The Nurse in Electroconvulsive Therapy
X	10	Psychopharmacology  Historical Perspectives  Role of a Nurse in Psychopharmacological Therapy  Antianxiety Agents  Antidepressants Agents  Mood stabilizers  Antipsychotics  Sedative-Hypnotics  Central Nervous System Stimulants  Future developments

Units	Hours	Content		
XII	15	Alternative systems of medicine in mental health  Types of Therapies Herbal Medicine Unani Siddha Homeopathic Acupressure and Acupuncture Diet and Nutrition Chiropractic Medicine Therapeutic Touch and Massage Yoga Pet Therapy		

### **Practical**

# Total = 660 Hours 1 Week = 30 Hours

S.No.	Area of Posting	No. of Week	Total Hours
1	Acute Psychiatric Ward	4	120 Hours
2	Chronic Psychiatric ward	4	120 Hours
3	Psychiatric Emergency Unit	2	60 Hours
4	O.P.D	2	60 Hours
5	Family Psychiatric Unit	2	60 Hours
6	Community Mental Health Unit	4	120 Hours
7	Rehabilitation / Occupational Therapy	4	120 Hours
/	Unit/Half way home/ Day care centre	4	120 Hours
	Total	22 Weeks	660 Hours

### **Student Activities**

- History taking
- Mental health assessment
- Psychometric assessment
- Personality assessment
- Process recording
- Therapies- Group Therapy
- Family Therapy
- Psychotherapy
- Milieu Therapy
- The Therapeutic Community
- Occupational therapy
- Recreational therapy
- Play therapy
- music therapy
- Pet therapy
- Counselling
- Assisted ECT
- Assisted EEG
- Case studies
- Case presentation
- Project work
- Socio and psycho drama
- Field visits

#### CLINICAL SPECIALITY- I

#### **COMMUNITY HEALTH NURSING**

Total 800hours

Placement: 1st Year

Hours of Instructions
Theory 150 hours
Practical 650hours

#### **Course Description**

The course is designed to assist students in developing expertise and in- depth understanding in the field of Community Health Nursing. It would help students to appreciate holistic life style of individuals, families & groups and develop skills to function as Community Health Nurse specialist/practitioner. It would further enable student to function as an educator, manager and researcher in the field of Community Health nursing.

### **Objectives**

At the end of the course, the student will be ableto:

- 1. Appreciate the history and development in the field of Community Health and Community Health Nursing.
- 2. Appreciate role of individuals and families in promoting health of the Community.
- 3. Perform physical, developmental and nutritional assessment of individuals, families and groups.
- 4. Apply the concepts of promotive, preventive, curative and rehabilitative aspects of health while providing care to the people.
- 5. Apply nursing process approach while providing care to individuals, families, groups and community.
- 6. Integrate the concepts of family centered nursing approach while providing care to the community.
- 7. Recognize and participate in the management of emergencies, epidemics and disasters.
- 8. Apply recent technologies and care modalities while delivering community health nursing care.
- 9. Appreciate legal and ethical issues pertaining to communityhealth nursing care.
- 10. Conduct community health nursing care projects.
- 1. Participate in planning, implementation and evaluation of various national health and family welfare programmes at local, state and the national level.
- 12. Incorporate evidence based nursing practice and identify the areas of research in the community settings.

- 13. Participate effectively as a member of Community Health team.
- 14. Coordinate and collaborate with various agencies operating in the community by using inter-sectoral approach.
- 15. Teach community health nursing to undergraduates, in-service nurses and the community health workers.
- 16. Demonstrate leadership and managerial abilities in community health nursing practice

# **Course Content**

Unit	Hours	Content		
I	10	Introduction  Historical development of Community Health and Community health Nursing-World and India, various health and family welfare committees  Current status, trends and challenges of CommunityHealth Nursing  Health status of the Community-community diagnosis  Scope of Community health Nursingpractice  Ethical and legal issues  Socio-cultural issues in Community health Nursing  National Policies, plans and programmes  National Population policy  National Population policy  National Health and welfare Programmes  National Health goals/ indicators/ Millenniumdevelopmental goals(MDG)/ Strategies  Planning process: Five year plans  National Rural Health Mission  Panchayat raj institutions		
II	10	Health  Concepts, issues  Determinants  Measurements  Alternate systems for health promotion and management of health problems  Health economics  Health technology  Genetics and health  Waste disposal  Eco system		
Ш	15	Population dynamics and control  Demography Transition and theories of population National population policy National population programmes Population control and related programmes Methods of family limiting andspacing Research, Census, National Family Health Survey		

Unit	Hours	Content			
IV	30	Community health Nursing  Philosophy, Aims, Objectives, Concepts, Scope, Principles, Functions  Community health Nursing theoriesand models  Quality assurance: Community health Nursing standards, competencies, Monitoring community health nursing, nursing audits  Family nursing and Family centered nursingapproach  Family health nursing process  Family health assessment  Diagnosis  Planning  Intervention  Evaluation  Nursing care for special groups: children, adolescents, adults, women, elderly, physically and mentally challenged- Urban and rural population at large  Community nutrition  Concept, role and responsibilities of community health Nurse practitioners/nurse midwifery practitioners-decision making skills, professionalism, legal issues			
V	45	Maternal and neonatal care  □ IMNCI(Integrated Management of Neonatal And Childhood Illnesses) module  □ Skilled Birth Attendant (SBA)module			
VI	15	□ Disaster nursing (INC module on Reaching out: Nursing Care in emergencies)			
VII	10	Information, education and communication  □ IEC/BCC: Principles and strategies □ Communication Skills □ Management information and evaluation system: Recordsand reports □ Information technology □ Tele-medicine and tele-nursing □ Journalism □ Mass media □ Folk media			
VIII	15	Health care delivery system: Urban, rural, tribal anddifficult areas  ☐ Health organization: National, State, District, CHC, PHC, Sub Centre, Village - Functions, Staffing, pattern of assistance, layout, drugs, equipments and supplies,Roles and Responsibilities of DPHNO  ☐ Critical review of functioning of various levels, evaluation studies, recommendations and nursing perspectives  ☐ Alternative systems of medicine  ☐ Training and supervision of health workers			

Unit	Hours	Content		
		<ul> <li>Health agencies: NGO's, Rolesand functions</li> <li>Inter-sectoral coordination</li> <li>Public private partnership</li> <li>Challenges of health care deliverysystem</li> </ul>		

S.No.	Deptt./Unit	No. of Week	Total Hours
1	Sub-centre, PHC, CHC	12	360 Hours
2	District family welfare bureau	1	30 Hours
3	Urban centers	6	180 Hours
4	Field visits	3	90 Hours
	Total	22 Weeks	660 Hours

#### **Student Activities**

- Identification of community leaders and resource persons(community mapping)
- Community health survey
- Community health nursing process- individual, family and special groups and community
- Counseling
- Health education campaign, exhibition, folk media, preparation of IEC materials
- Organising and participating in special clinics/camps and national health and welfare programmes-Organise atleast one health and family welfare mela/fair (all stalls of national health and family welfare activities should be included)
- Estimation of Vital health statistics -Exercise
- Drill for disaster preparedness
- Organise atleast one in-service education to ANM's/LHV/PHN/HW
- Nutrition Exercise on nutritional assessment on dietary planning, demonstration and education for various age groups
- Filling up of Records, reports and registers maintained at SC/PHC/CHC
- Assist women in self breast examination
- Conduct antenatal examination
- Conduct vaginal examination
- Conduct deliveries
- Post natal visits
- Perform Episiotomy and suturing
- Prepare Pap smear
- Conduct Insertion/Removal of IUD
- Blood Slide preparation
- Field visits
- Maintenance of log book for various activities

#### NURSING RESEARCH ANDSTATISTICS

Placement: 1st Year

Hours of Instruction Theory 150 Hours Practical 100 Hours Total: 250Hours

## Part-A: Nursing Research

Theory 100 Hours Practical 50 Hours Total: 250Hours

## **Course Description:**

The course is designed to assist the students to acquire an understanding of the research methodology and statistical methods as a basis for identifying research problem, planning and implementing a research plan. It will further enable the students to evaluate research studies and utilize research findings to improve quality of nursing practice, education and management.

# **General Objectives:**

At the end of the course, the students will be able to:

- 1. Define basic research terms and concepts.
- 2. Review literature utilizing various sources
- 3. Describe research methodology
- 4. Develop a research proposal.
- 5. Conduct a research study.
- 6. Communicate research findings
- 7. Utilize research findings
- 8. Critically evaluate nursing research studies.
- 9. Write scientific paper for publication.

# **Content Outline**

TT *4	Hours		Course Content	
Unit	Theory	Practical	Course Content	
I	10		<ul> <li>Introduction:</li> <li>Methods of acquiring knowledge – problem solving and scientific method.</li> <li>Research – Definition, characteristics, purposes, kindsof research</li> <li>Historical Evolution of research in nursing</li> <li>Basic research terms</li> <li>Scope of nursing research: areas, problems in nursing, health and social research</li> <li>Concept of evidence based practice</li> <li>Ethics in research</li> <li>Overview of Research process</li> </ul>	
п	5	5	Review of Literature  □ Importance, purposes, sources, criteria for selection of resources and steps in reviewing literature.	
Ш	12		Research Approaches and designs  Type: Quantitative and Qualitative Historical, survey and experimental – Characteristics, types advantages and disadvantages Qualitative: Phenomenology, grounded theory, ethnography	
IV	10	5	Research problem:  Identification of research problem Formulation of problem statement and research objectives Definition of terms Assumptions and delimitations Identification of variables Hypothesis – definition, formulation andtypes.	
V	5	5	<ul> <li>Developing theoretical/conceptual framework.</li> <li>Theories: Nature, characteristics, Purpose and uses</li> <li>Using, testing and developing conceptual framework, models and theories.</li> </ul>	
VI	6		Sampling  Population and sample  Factors influencing sampling  Sampling techniques  Sample size  Probability and sampling error  Problems of sampling	

44

TI*4	Hours		G	
Unit	Theory	Practical	Course Content	
VII	20	10	Tools and methods of Data collection:  □ Concepts of data collection  □ Data sources, methods/techniques quantitative and qualitative.  □ Tools for data collection – types, characteristics and their development  □ Validity and reliability of tools  □ Procedure for data collection	
VIII	5		Implementing research plan  □ Pilot Study, review research plan (design)., planning for data collection, administration of tool/interventions, collection of data	
IX	10	10	Analysis and interpretation of data  Plan for data analysis: quantitative and qualitative Preparing data for computer analysis and presentation. Statistical analysis Interpretation of data Conclusion and generalizations Summary and discussion	
X	10		Reporting and utilizing research findings:  Communication of research results; oral and written  Writing research report purposes, methods and style- vancouver, American Psychological Association(APA), Campbell etc  Writing scientific articles for publication: purposes & style	
XI	3	8	Critical analysis of research reports and articles	
XII	4	7	Developing and presenting a research proposal	

## **Activities:**

- Annotated Bibliography of research reports andarticles.
- Review of literature of selected topic and reporting
- Formulation of problem statement, objective and hypothesis
- Developing theoretical/conceptualframework.
- Preparation of a sample research tool
- Analysis and interpretation of given data
- Developing and presentingresearch proposal
- Journal club presentation
- Critical evaluation of selected research studies
- Writing a scientific paper.

# **Method of Teaching**

- Lecture-cum-discussion
- Seminar/Presentations
- Project
- Class room exercises
- Journal club

### **Methods of Evaluation**

- Quiz, Tests (Term)
- Assignments/Term paper
- Presentations
- Project work

### **Internal Assessment**

Techniques	Weightage (15marks)
Term Test(2 tests)	40%
Assignment	20%
Presentation	20%
Project work	20%
Total	100%

#### Part -B: Statistics

Hours of Instruction Theory 50 Hours Practical 50 Hours Total: 100Hours

# **Course Description**

At the end of the course, the students will be able to develop an understanding of the statistical methods and apply them in conducting research studies in nursing.

### **General Objectives**

At the end of the course the students will be able to:

- 1. Explain the basic concepts related to statistics
- 2. Describe the scope of statistics in health and nursing
- 3. Organize, tabulate and present data meaningfully.
- 4. Use descriptive and inferential statistics to predictresults.
- 5. Draw conclusions of the study and predict statistical significance of the results.
- 6. Describe vital health statistics and their use in health related research.
- 7. Use statistical packages for data analysis

Unit	Hours		Course Content
Onit	Theory	Practical	Course Content
I	7	4	<ul> <li>Introduction:</li> <li>Concepts, types, significance and scope of statistics, meaning of data,</li> <li>sample, parameter</li> <li>type and levels of data and their measurement</li> <li>Organization and presentation of data – Tabulation of data;</li> <li>Frequency distribution</li> <li>Graphical and tabular presentations.</li> </ul>
II	4	4	Measures of central tendency:  □ Mean, Median, Mode
Ш	14	5	Measures of variability;  □ Range, Percentiles, average deviation, quartile deviation, standard deviation
IV	3	2	Normal Distribution:  □ Probability, characteristics and application of normal probability curve; sampling error.

TT •4	Hours			
Unit	Theory	Practical	Course Content	
V	6	8	Measures of relationship:  Correlation – need andmeaning Rank order correlation; Scatter diagram method Product moment correlation Simple linear regression analysis and prediction.	
VI	5	2	Designs and meaning:  Experimental designs Comparison in pairs, randomized block design, Latin squares.	
VII	8	10	Significance of Statistic and Significance of difference between two Statistics (Testing hypothesis)  □ Non parametric test − Chi-square test, Sign, median test, Mann Whitney test.  □ Parametric test − 't' test, ANOVA, MANOVA, ANCOVA	
VIII	5	5	Use of statistical methods in psychology and education:  □ Scaling – Z Score, Z Scaling  □ Standard Score and T Score  □ Reliability of test Scores: test-retest method, parallel forms, split half method.	
IX	4	2	Application of statistics in health:  Ratios, Rates, Trends Vital health statistics – Birth and death rates.  Measures related to fertility, morbidity and mortality	
X	4	8	Use of Computers for data analysis  Use of statistical package.	

# **Activities**

- Exercises on organization and tabulation of data,
- Graphical and tabular presentation of data
- Calculation of descriptive and inferential statistics(chi square,t-test, correlation)
- Practice in using statistical package
- Computing vital health statistics

# **Methods of Teaching:**

- Lecture-cum-discussion
- Demonstration on data organization, tabulation, calculation of statistics, use of statistical package, Classroom exercises, organization and tabulation of data,

• Computing Descriptive and inferential statistics; vital and health statistics and use of computer for data entry and analysis using statistical package.

# **Methods of Evaluation**

• Test, Classroom statistical exercises.

#### **Internal Assessment**

Techniques Weightage 10 marks

Test – (2 tests) 100%

#### **NURSING MANAGEMENT**

Placement: II Year

Hours of Instruction Theory 150 Hours Practical 150 Hours Total: 300Hours

### **Course Description**

This course is designed to assist students to develop a broad understanding of Principles, concepts, trends and issues related to nursing management. Further, it would provide opportunity to students to understand, appreciate and acquire skills in planning, supervision and management of nursing services at different levels to provide quality nursing services.

## **Objectives**

At the end of the course, students will be able to:

- 1. Describe the philosophy and objectives of the health care institutions at various levels.
- 2. Identify trends and issues innursing
- 3. Discuss the public administration, health care administration vis a vis nursing administration
- 4. Describe the principles of administration applied to nursing
- 5. Explain the organization of health and nursing services at the various levels/institutions.
- 6. Collaborate and co-ordinate with various agencies by using multi- sectoral approach
- 7. Discuss the planning, supervision and management of nursing workforce for various health care settings.
- 8. Discuss various collaborative models between nursing education and nursing service to improve the quality of nursingcare
- 9. Identify and analyse legal and ethical issues in nursing administration
- 10. Describe the process of quality assurance in nursing services.
- 11. Demonstrate leadership in nursing at various levels

# **Course Content**

Unit	Hours	Content	
I	10	<ul> <li>Introduction</li> <li>□ Philosophy, purpose, elements, principles and scope of administration</li> <li>□ Indian Constitution, Indian Administrative system vis a vis health care delivery system: National, State and Local</li> <li>□ Organisation and functions of nursing services and education at National, State, District and institutions: Hospital and Community</li> <li>□ Planning process: Five year plans, Various Committee Reports on health, State and National Health policies, national population policy, national policy on AYUSH and plans,</li> </ul>	
II	10	Management  Functions of administration  Planning and control  Co-ordination and delegation  Decision making – decentralization basic goals of decentralization.  Concept of management  Nursing management  Concept, types, principles and techniques  Vision and Mission Statements  Philosophy, aims and objective  Current trends and issues in NursingAdministration  Theories and models  Application to nursing service and education	
III	15	Planning  Planning process: Concept, Principles, Institutional policies  Mission, philosophy, objectives,  Strategic planning  Operational plans  Management plans  Programme evaluation and review technique(PERT), Gantt chart,  Management by objectives(MBO)  Planning new venture  Planning for change  Innovations in nursing  Application to nursing service and education	
IV	Organisation  Concept, principles, objectives, Types and theories, Minimum requirements for organisation, Developing an organizational Structure, levels, organizational Effectiveness andorganizational Climate,  Organising nursing services and patient care: Methods of patient assignment-Advantages and disadvantages, primary nursingcare,  Planning and Organising: hospital, unit and ancillary services(specifically central sterile supply department, laundry, kitchen, laboratory services, emergency etc)		

Unit	Hours	Content	
		☐ Disaster management: plan, resources, drill, etc Application to nursing	
		bisaster management, plan, resources, arm, etc Application to harsing	
		service and education	
		Human Resource for health	
		<ul> <li>Staffing</li> <li>Philosophy</li> <li>Norms: Staff inspection unit(SIU), Bajaj Committee, High power committee,</li> </ul>	
		Indian nursing council (INC)	
		<ul><li>Estimation of nursing staff requirement- activity analysis</li><li>Various research studies</li></ul>	
V	15	Recruitment: credentialing, selection, placement, promotion	
		□ Retention □ Personnel policies	
		□ Termination	
		<ul> <li>Staff development programme</li> <li>Duties and responsibilities of various category of nursing personnel Applications</li> </ul>	
		Duties and responsibilities of various category of nursing personnel Applications	
		to nursing service and education	
		Directing	
		□ Roles and functions	
	15	☐ Motivation: Intrinsic, extrinsic, Creating motivating climate,  Motivational theories	
		□ Communication: process, types, strategies, Interpersonal	
		communication, channels, barriers, problems, Confidentiality, Public	
VI		relations  Delegation; common delegationerrors	
V I		Managing conflict: process, management, negotiation, consensus	
		Collective bargaining: health care labour laws, unions, professional associations,	
		role of nurse manager   Cocupational health and safety Application to	
		nursing service and education	
		Material management	
		Concepts, principles and procedures	
	4	<ul> <li>Planning and procurement procedures: Specifications</li> <li>ABC analysis,</li> </ul>	
		□ VED (very important and essential daily use) analysis	
VII	10	Planning equipments and supplies for nursing care: unit and hospital	
		<ul><li>□ Inventory control</li><li>□ Condemnation</li></ul>	
		Application to nursing service and education	
		Controlling	
<b>37111</b>	15	<ul> <li>Quality assurance – Continuous Quality Improvement</li> <li>Standards</li> </ul>	
VIII	15	<ul><li>Standards</li><li>Models</li></ul>	
		Nursing audit	

Unit	Hours	Content			
		□ Performance appraisal: Tools, confidential reports, formats,			
		Management, interviews			
		□ Supervision and management: concepts and principles			
		<ul> <li>Discipline: service rules, self discipline, constructive versus destructive discipline, problem employees, disciplinary proceedings- enquiry etc</li> <li>Self evaluation or peer evaluation, patient satisfaction, utilization review</li> </ul>			
		Application to nursing service and education			
		Fiscal planning Stone			
		□ Steps □ Plan and non plan zero budgeting mid term enpreised, cenited and revenue			
		<ul> <li>Plan and non-plan, zero budgeting, mid-term appraisal, capital and revenue</li> <li>Budget estimate, revised estimate, performancebudget</li> </ul>			
		A 11/2			
		□ Audit □ Cost effectiveness			
		Cost effectiveness     Cost accounting			
		□ Critical pathways			
IX	15	□ Health care reforms			
IA	13	□ Health economics			
		□ Health insurance			
		□ Budgeting for various units and levels Application			
		to nursing service and education			
		Nursing informatics			
		□ Trends			
		□ General purpose			
		□ Use of computers in hospital and community			
		Patient record system			
X	10	Nursing records and reports			
		Management information and evaluation system(MIES)			
		<ul> <li>E- nursing, Telemedicine, telenursing</li> <li>Electronic medical records</li> </ul>			
		Electronic medical records			
		Leadership			
	<u> </u>	Concepts, Types, Theories			
	A 1	□ Styles			
		Manager behaviour			
		□ Leader behaviour			
	M.	□ Effective leader: Characteristics, skills			
VI	10	□ Group dynamics			
XI	10	□ Power and politics			
		□ Critical thinking and decision making			
		□ Stress management			
		Applications to pursing service and advection			
		Applications to nursing service and education			

Unit	Hours	Content	
Legal and ethical issues		Legal and ethical issues	
		Laws and ethics	
		□ Ethical committee	
		□ Code of ethics and professional conduct	
		□ Legal system: Types of law, tort law, and liabilities	
		□ Legal issues in nursing: negligence, malpractice, invasion of privacy, defamation of	
		character	
XII	10	□ Patient care issues, management issues, employmentissues	
		□ Medico legal issues	
		□ Nursing regulatory mechanisms: licensure, renewal,accreditation	
		□ Patients rights, Consumer protectionact(CPA)	
		□ Rights of special groups: children, women, HIV, handicap, ageing	
		<ul> <li>Professional responsibility and accountability</li> </ul>	
		□ Infection control	
		□ Standard safety measures	

#### **PRACTICALS**

- 1. Prepare prototype personal files for staff nurses, faculty and cumulative records.
- 2. Preparation of budget estimate, Revised estimate and performance budget.
- 3. Plan and conduct staff development programme.
- 4. Preparation of Organisation Chart
- 5. Developing nursing standards/protocols for various units.
- 6. Design a layout plan for speciality units /hospital, community and educational institutions
- 7. Preparation of job description of various categories of nursing personnel
- 8. Prepare a list of equipments and supplies for specialityunits
- 9. Assess and prepare staffing requirement for hospitals, community and educational institutions
- 10. Plan of action for recruitment process
- 11. Prepare a vision and mission statement for hospital, community and educational institutions
- 12. Prepare a plan of action for performance appraisal
- 13. Identify the problems of the speciality units and develop plan of action by using problem solving approach
- 14. Plan a duty roster for speciality units/hospital, community and educational institutions
- 15. Prepare: anecdotes, incident reports, day and night reports, handing and taking over reports, enquiry reports, nurses notes, Official letters, curriculum vitae, presentations etc

- 16. Prepare a plan for disaster management
- 17. Group work
- 18. Field appraisal report

MALWANCHALUMINERSITY

#### CLINICAL SPECIALITY – II

#### MEDICAL SURGICAL NURSING

#### SUB SPECIALITY - CARDIO VASCULAR AND THORACIC NURSING

Placement : II year Hours of Instruction

Theory: 150 hours. Practical: 950 hours. Total: 1100hours.

### **Course Description**

This course is designed to assist students in developing expertise and in- depth understanding in the field of cardiovascular and thoracic nursing. It will help students to develop advanced skills for nursing intervention in various cardio medical and surgical conditions. It will enable the student to function as Cardio vascular and Thoracic Nurse practitioner/specialist. It will further enable the student to function as educator, manager and researcher in the field of cardio vascular and thoracic nursing.

## **Objectives**

At the end of the course the students will be able to:

- 1. Appreciate trends and issues related to cardio vascular and thoracic Nursing.
- 2. Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of cardio vascular and thoracicconditions
- 3. Participate in national health programs for health promotion, prevention and rehabilitation of patients with cardio vascular and thoracic conditions
- 4. Perform physical, psychosocial & spiritual assessment
- 5. Assist in various diagnostic, therapeutic and surgical procedures
- 6. Apply nursing process in providing comprehensive care to patients with cardio vascular and thoracic conditions
- 7. Demonstrate advance skills/competence in managing patients with cardio vascular and thoracic conditions including Advance Cardiac Life Support.
- 8. Describe the various drugs used in cardio vascular and thoracic conditions and nurses responsibility
- 9. Demonstrate skill in handling various equipments/gadgets used for critical care of cardio vascular and thoracic patients
- 10. Appreciate team work & coordinate activities related to patient care.
- 11. Practice infection control measures.
- 12. Identify emergencies and complications & take appropriate measures

- 13. Discuss the legal and ethical issues in cardio vascular and thoracic nursing
- 14. Assist patients and their family to cope with emotional distress, grief, anxiety and spiritual needs.
- 15. Appreciate the role of alternative system of medicine in care of patient
- 16. Incorporate evidence based nursing practice and identify the areas of research in the field of cardio vascular and thoracic nursing
- 17. Identify the sources of stress and manage burnout syndrome among health care providers.
- 18. Teach and supervise nurses and allied health workers.
- 19. Design a layout of ICCU and ICTU and develop standards for cardio vascular and thoracic nursing practice.

### **Content Outline**

Unit	Hours	Content	
I	5	Introduction  Historical development, trends and issues in the field of cardiology.  Cardio vascular and thoracic conditions – major healthproblem.  Concepts, principles and nursingperspectives  Ethical and legal issues  Evidence based nursing and its application in cardio vascular and thoracic nursing( to be incorporated in all the units)	
II	5	Epidemiology  Risk factors: hereditary, psycho social factors, hypertension, smoking, obesity, diabetes mellitusetc  Health promotion, disease prevention, Life stylemodification  National health programs related to cardio vascular and thoracic conditions  Alternate system of medicine  Complementary therapies	
III	5	Review of anatomy and physiology of cardio vascular and respiratory system  Review of anatomy and physiology of heart, lung, thoraciccavity and blood vessels. Embryology of heart and lung.  Coronary circulation Hemodynamics and electro physiologyof heart. Bio-chemistry of blood in relation to cardio pulmonary function.	
IV	20	Assessment and Diagnostic Measures:  History taking Physical assessment  Heart rate variability: Mechanisms, measurements, pattern, factors, impact of interventions on HRV  Diagnostic tests Hemodynamic monitoring: Technical aspects, monitoring, functional hemodynamic indices, ventricular function indices,	

Unit	Hours	Content	
		output measurements (Arterial and swan Ganz monitoring).	
		Blood gases and its significance, oxygen supply and demand	
		Radiologic examination of the chest: interpretation, chest film findings	
		• Electro cardiography(ECG): electrical conduction through the heart, basic	
		electrocardiography, 12 lead electrocardiogram, axis determination	
		- ECG changes in: intraventricular conduction abnormalities- Arrhythmias, ischemia, injury and infarction, atrial and ventricular enlargement, electrolyte imbalance,	
		<ul> <li>Echocardiography: technical aspects, special techniques, echocardiography of cardiac structures in health and disease, newer techniques</li> </ul>	
		<ul> <li>Nuclear and other imaging studies of the heart: Magnetic Resonance Imaging.</li> </ul>	
		<ul> <li>Cardio electrophysiology procedures: diagnostic studies, interventional and catheter ablation, nursing care</li> </ul>	
		Exercise testing: indications and objectives, safety and personnel, pretest	
		<ul> <li>considerations, selection, interpretation, test termination, recovery period</li> <li>Cardiac catheterization: indications, contraindications, patient preparation,</li> </ul>	
		procedure, interpretation of data	
		Pulmonary function test: Bronchoscopy and graphies	
		Interpretation of diagnostic measures	
		Nurse's role in diagnostic tests	
		Laboratory tests using blood: Blood specimen collection, Cardiac markers, Blood lipids, Hematologic studies, Blood cultures, Coagulation studies,	
		Arterial blood gases, Blood Chemistries, cardiac enzyme studies, Serum	
	Concentration of Selected drugs.  Interpretation and role of nurse		
		interpretation and role of harse	
		Cardiac disorders and nursing management:	
		<ul> <li>Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, treatment modalities and nursing managementof:</li> </ul>	
		Hypertension	
		Coronary Artery Disease.	
	•	Angina of various types.	
	1	Cardiomegaly	
		Myocardial Infarction, Congestive cardiac failure  Heart Fribus Polyman Thomas Charles  On the Congestive Charles  On the Co	
V	25	<ul> <li>Heart Failure, Pulmonary Edema, Shock.</li> <li>Rheumatic heart disease and other Valvular Diseases</li> </ul>	
		Inflammatory Heart Diseases, Infective Endocarditis,	
	₽	Myocarditis, Pericarditis.	
		Cardiomyopathy, dilated, restrictive, hypertrophic.	
		Arrhythmias, heart block	
		Associated illnesses	
		L	

Unit	Hours	Content	
VI	Hours 10	Altered pulmonary conditions  Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, treatment modalities and nursing managementof:  Bronchitis Bronchietasis Pneumonias Lung abscess, lung tumour Pulmonary tuberculosis, fibrosis, pneumoconiosis etc Pleuritis, effusion Pneumo, haemo and pyothorax Interstitial Lung Disease Cystic fibrosis Acute and Chronic obstructive pulmonary disease (conditions leading to) Cor pulmonale Acute respiratory failure Adult respiratory distress syndrome	
		<ul> <li>Pulmonary embolism</li> <li>Pulmonary Hypertension</li> <li>Vascular disorders and nursing management</li> <li>□ Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, treatment modalities and nursing managementof:</li> <li>● Disorders of arteries</li> <li>● Disorders of the aorta</li> </ul>	
VII	10	<ul> <li>Aortic Aneurysms,</li> <li>Aortic dissection</li> <li>Raynaud's phenomenon</li> <li>Peripheral arterial disease of the lowerextremities</li> <li>Venous thrombosis</li> <li>Varicose veins</li> <li>Chronic venous insufficiency and venous legulcers</li> <li>Pulmonary embolism</li> </ul>	
VIII	10	Cardio thoracic emergency interventions  CPR- BLS and ALS  Use of ventilator, defibrillator, pacemaker  Post resuscitation care.  Care of the critically ill patients  Psychosocial and spiritual aspects of care  Stress management; ICU psychosis  Role of nurse	
IX	10	Nursing care of a patient with obstructive airway  Assessment  Use of artificial airway  Endotracheal intubation, tracheostomy and its care  Complication, minimum cuff leak, securing tubes  Oxygen delivery systems.  Nasal Cannula	

Unit	Hours	Content	
		□ Oxygen mask, Venturi mask	
		□ Partial rebreathing bag	
		□ Bi-PAP and C-PAP masks	
		□ Uses, advantages, disadvantages, nursing implications of each.	
		Mechanical Ventilation	
		Principles of mechanical ventilation	
		□ Types of mechanical ventilation and ventilators.	
		□ Modes of ventilation, advantage, disadvantage, complications.	
		<ul> <li>PEEP therapy, indications, physiology, and complications. Weaning off the ventilator.</li> </ul>	
		□ Nursing assessment and interventions of ventilated patient.	
		Congenital Heart Diseases,	
		□ Etiology, clinical manifestations, diagnois, prognosis, related pathophysiology,	
		treatment modalities and nursing managementof:	
		Embryological development of heart.	
		<ul> <li>Classification – cyanotic and acyanotic heart disease.</li> </ul>	
		Tetralogy of Fallots.	
		<ul> <li>Atrial Septal Defect, Ventricular Septal Defect., Eisenmenger's complex.</li> </ul>	
		Patent ductus arteriosus, AP window	
v	10	Truncus Arteriosus.	
X	10	Transposition of great arteries.	
		<ul> <li>Total Anomaly of Pulmonary Venous Connection.</li> </ul>	
		Pulmonary stenosis, atresia.	
		Coarctation of aorta.	
		Ebstein's anomaly	
		Double outlet right ventricle, Single ventricle, Hypoplastic left heart	
		syndrome.	
		Pharmacology	
		□ Review	
		□ Pharmacokinetics	
		□ Analgesics/Anti inflammatory agents	
		□ Antibiotics, antiseptics	
		□ Drug reaction & toxicity	
		□ Drugs used in cardiac emergencies	
		□ Blood and blood components	
	4	Antithrombolytic agents	
		• Inotropic agents	
XI	10	Beta-blocking agents	
_		Calcium channel blockers.	
	9.	Vaso constrictors	
	<b>•</b>	Vaso dilators	
		ACE inhibitors.	
		• Anticoagulents	
		Antiarrhythmic drugs.	
		Anti hypertensives	
		• Diuretics	
		Sedatives and tranquilizers.	
		Digitalis.	

Unit	Hours	Content	
		<ul> <li>Antilipemics</li> <li>Principles of drug administration, role and responsibilities of nurses and care of drugs</li> </ul>	
XII	20	Nursing Care of patient undergoing cardio thoracic surgery Indications, selection of patient Preoperative assessment and preparation; counselling. Intraoperative care: Principles of open heart surgery, equipment, anaesthesia, cardiopulmonary by pass.  Surgical procedures for Coronary Artery Bypass Grafting, recent advances an types of grafts, Valve replacement or reconstruction, cardiac transplant, Palliativ surgery and different Stents, vascular surgery, other recent advances.  Thoracic surgery: lobectomy, pneumonectomy, tumour excisionetc Immediate postoperative care: assessment, post operative problems an interventions: Bleeding, Cardiac tamponade, Low cardiac output, Infarction Pericardial effusion, Pleural effusion, Pneumothorax, Haemothorax, Coagulopathy Thermal imbalance, Inadequate., ventilation/perfusion, Neurological problems renal problems, Psychological problems.  Chest physiotherapy Nursing interventions- life style modification, complementary therapy/alternative systems of medicine.  Intermediate and late post operative care after CABG, valve surgery, others.	
XIII	5	Cardiac rehabilitation  Process  Physical evaluation  Life style modification  Physical conditioning for cardiovascular efficiency through exercise  Counseling  Follow up care	
XIV	5	Intensive Coronary Care Unit/intensive cardio thoracic unit:  Quality assurance Standards, Protocols, Policies, Procedures Infection control; Standard safety measures Nursing audit Design of ICCU/ICTU Staffing; cardiac team Burn out syndrome Nurse's role in the management of I.C.C.U and ICTU. Mobile coronary care unit. Planning inservice educational programme and teaching	

S.No.	Deptt/ Unit	No. of Week	Total Hours
1	Cardio thoracic -Medical	4	120 Hours
1	-Surgical	4	120 Hours
2.	OTs (Cardiac and thoracic)	4	120 Hours
3.	Casualty	2	60 Hours
4.	Diagnostic labs including cath lab	2	60 Hours
5.	ICCU	4	120 Hours
6.	ICU	4	120 Hours
7.	CCU	4	120 Hours
8.	Paediatric Intensive	2	60 Hours
9.	OPD	2	60 Hours
	Total	32 Weeks	960 Hours

# **Essential Nursing Skills**

#### **Procedures Observed**

- 1. Echo cardiogram
- 2. Ultrasound
- 3. Monitoring JVP, CVP
- 4. CT SCAN
- 5. MRI
- 6. Pet SCAN
- 7. Angiography
- 8. Cardiac cathetrisation
- 9. Angioplasty
- 10. Various Surgeries
- 11. Any other

# I. Procedures Assisted

- 1. Arterial blood gas analysis
- 2. Thoracentesis
- 3. Lung biopsy
- 4. Computer assisted tomography (CAT Scan)
- 5. M.R.I.
- 6. Pulmonary angiography
- 7. Bronchoscopy
- 8. Pulmonary function test
- 9. ET tube insertion
- 10. Tracheostomy tube insertion
- 11. Cardiac catheterisation
- 12. Angiogram
- 13. Defibrillation
- 14. Treadmill test

- 15. Echo cardiography
- 16. Doppler ultrasound
- 17. Cardiac surgery
- 18. Insertion of chest tube
- 19. CVP Monitoring
- 20. Measuring pulmonary artery pressure by Swan-Ganz Catheter
- 21. Cardiac Pacing

#### **II.** Procedures Performed

- 1. Preparation of assessment tool for CT client (Cardiac, thoracic and vascular).
- 2. ECG Recording, Reading, Identification of abnormalities
- 3. Oxygen therapy Cylinder, central supply,

Catheter, nasal canula, mask, tent Through ET and Tracheostomy tube Manual resuscitation bag

- 4. Mechanical ventilation
- 5. Spirometer
- 6. Tuberculen skin test
- 7. Aerosal therapy
- 8. Nebulizer therapy
- 9. Water seal drainage
- Chest physiotheray including Breathing Exercises Coughing Exercises
  - Percussion & Vibration
- 11. Suctioning Oropharyngeal, nasotracheal, Endotrachieal Through tracheostomy tube
- 12. Artificial airway cuff maintenance
- 13. CPR
- 14. Care of client on ventilator
- 15. Identification of different Arrhythmias Abnormal pulses, respirations
  - B.P. Variation

Heart sounds

Breath sounds

- 16. Pulse oxymetry
- 17. Introduction of intracath
- 18. Bolus I.V. Injection
- 19. Life line
- 20. Maintenance of "Heplock"
- 21. Subcutaneous of Heparin
- 22. Obtaining leg measurements to detect early swellingin thrombophlebetes
- 23. Identification of Homans signs
- 24. Buergen Allenexercises

#### CLINICAL SPECIALITY – II

#### MEDICAL SURGICAL NURSING - CRITICAL CARE NURSING

Placement: II Year

Hours of instruction Theory: 150 hours Practical: 950 hours Total: 1100hours

## **Course Description**

This course is designed to assist students in developing expertise and in- depth knowledge in the field of Critical care Nursing. It will help students to develop advanced skills for nursing intervention in caring for critically ill patients. It will enable the student to function as critical care nurse practitioner/ specialist. It will further enable the student to function as educator, manager and researcher in the field of Critical Care Nursing.

### **Objectives**

At the end of the course the students will be able to

- 1. Appreciate trends and issues related to Critical Care Nursing.
- 2. Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of critically ill patients
- 3. Describe the various drugs used in critical care and nurses responsibility
- 4. Perform physical, psychosocial & spiritual assessment
- 5. Demonstrate advance skills/competence in managing critically ill patients including Advance Cardiac Life Support.
- 6. Demonstrate skill in handling various equipments/gadgets used for critical care
- 7. Provide comprehensive care to critically illustients.
- 8. Appreciate team work & coordinate activities related to patient care.
- 9. Practice infection control measures.
- 10. Assess and manage pain.
- 11. Identify complications & take appropriate measures.
- 12. Discuss the legal and ethical issues in critical care nursing
- 13. Assist patients and their family to cope with emotional distress, spiritual, grief and anxiety
- 14. Assist in various diagnostic, therapeutic and surgical procedures
- 15. Incorporate evidence based nursing practice and identify the areas of research in the field of critical care nursing

- 16. Identify the sources of stress and manage burnout syndrome among health care providers.
- 17. Teach and supervise nurses and allied health workers.
- 18. Design a layout of ICU and develop standards for critical care nursing practice.

# **Course Content**

Unit	Hours	Content		
I	5	Introduction to Critical Care Nursing  Historical review- Progressive patient care(PPC)  Review of anatomy and physiology of vital organs, fluid and electrolyte balance  Concepts of critical care nursing  Principles of critical care nursing  Scope of critical care nursing  Critical care unit set up including equipments supplies, useand care of various type of monitors &ventilators  Flow sheets		
II	10	<ul> <li>Concept of Holistic care applied to critical care nursing practice</li> <li>Impact of critical care environment on patients:-         <ul> <li>Risk factors, Assessment of patients, Critical care psychosis, prevention nursing care for patients affected with psychophysiological &amp; psychosoci problems of critical care unit, Caring for the patient's family, family teaching</li> <li>The dynamics of healing in critical care unit:-therapeutic touch, Relaxation, Music therapy, Guided Imagery, acupressure</li> <li>Stress and burnout syndrome among health team members</li> </ul> </li> </ul>		
III	14	Review  Pharmacokinetics  Analgesics/Anti inflammatory agents  Antibiotics, antiseptics  Drug reaction & toxicity  Drugs used in critical care unit (inclusive of ionotropic, life saving drugs)  Drugs used in various body systems  IV fluids and electrolytes  Blood and blood components  Principles of drug administration, role of nurses and care of drugs		
IV	5	Pain Management  □ Pain & Sedation in Critically ill patients □ Theories of pain, Types of pain, Pain assessment, Systemic responses to pain □ pain management-pharmacological and non-pharmacological measures □ Placebo effect		

Unit	Hours	Content			
V	5	Infection control in intensive care unit  □ Nosocomial infection in intensive care unit; methyl resistant staphylococcus aureus (MRSA), Disinfection, Sterilization, Standard safety measures, Prophylaxis for staff			
VI	10	Gastrointestinal System  □ Causes, Pathophysiology, Clinical types, Clinical features, diagnosis, Prognosis, Management: Medical, Surgical and Nursing management of:-Acute Gastrointestinal Bleeding, Abdominal injury, Hepatic Disorders:-Fulminent hepatic failure, Hepatic encephalopathy, Acute Pancreatitis, Acute intestinal obstruction, perforative peritonitis			
VII	10	Renal System  Causes, pathophysiology, Clinical types, Clinical features, diagnosis, Prognosis, Management: Medical, Surgical and Nursing management of:-Acute Renal Failure, Chronic Renal Failure, Acute tubular necrosis, Bladder trauma  Management Modalities: Hemodialysis, Peritoneal Dialysis, Continuous Ambulatory Peritoneal Dialysis, Continuous arterio venus hemodialysis, Renal Transplant,			
VIII  Management: Medical, Surgical and Nursing management Neurological Disorders:-Cerebrovascular disease, Cerebrovascu Seizure disorders, GuilleinBarre-Syndrome, Myasthenia Gr Persistent vegetative state, Encephalopathy, Head injury, Spinal Cor Management Modalities: Assessment of Intracranial pressure, M intracranial hypertension, Craniotomy		<ul> <li>Causes, pathophysiology, Clinical types, Clinical features, diagnosis, Prognosis, Management: Medical, Surgical and Nursing management of:-Common Neurological Disorders:-Cerebrovascular disease, Cerebrovascular accident, Seizure disorders, GuilleinBarre-Syndrome, Myasthenia Gravis, Coma, Persistent vegetative state, Encephalopathy, Head injury, Spinal Cordinjury</li> <li>Management Modalities: Assessment of Intracranial pressure, Management of intracranial hypertension, Craniotomy</li> <li>Problems associated with neurological disorders: Thermo regulation,</li> </ul>			
IX	5	Endocrine System  Causes, Pathophysiology, Clinical types, Clinical features, diagnosis, Progno Management: Medical, Surgical and Nursing Management of :-Hypoglycer Diabetic Ketoacidosis, Thyroid crisis, Myxoedema, Adrenal crisis, Syndrome Inappropriate/ hypersecretion of Antidiuretic Hormone (SIADH)			
X	15	Management of other Emergency Conditions         □ Mechanism of injury, Thoracic injuries, Abdominal injuries, pelvic fractures, complications of trauma, Head injuries         □ Shock: Shock syndrome, Hypovolemic, Cardiogenic, Anaphylactic, Neurogenic and Septicshock         □ Systemic inflammatory Response: The inflammatory response, Multiple organ dysfunction syndrome         □ Disseminated Intravascular Coagulation         □ Drug Overdose and Poisoning,         □ Acquired Immunodeficiency Syndrome (AIDS)			

Unit	Hours	Content				
		<ul> <li>Ophthalmic: Eye injuries, Glaucoma, retinal detachment</li> <li>Ear Nose Throat: Foreign bodies, stridor, bleeding, quincy, acute allergic conditions</li> <li>Psychiatric emergencies;, suicide,</li> <li>crisis intervention</li> </ul>				
		Cardiovascular emergencies				
XI	20	<ul> <li>Principles of Nursing in caring for patient's with Cardiovascular disorders</li> <li>Assessment: Cardiovascular system: Heart sounds, Diagnostic studies:-         <ul> <li>Cardiac enzymes studies, Electrocardiographic monitoring, Holter</li> <li>monitoring, Stress test. Echo cardiography, Coronary angiography, Nuclear medicinestudies</li> </ul> </li> <li>Causes, Pathophysiology, Clinical types, Clinical features, Diagnostic Prognosis, Management: Medical, Surgical &amp; Nurisng management of:-Hypertensive crisis, Coronary artery disease, Acute Myocardial infarction, Cardiomyopathy, Deep vein thrombosis, Valvular diseases, Heart block, Cardiac arrhythmias &amp; conduction disturbances, Aneurysms, Endocarditis, Heart failure Cardio pulmonary resuscitation BCLS/ ACLS</li> <li>Management Modalities: Thrombolytic therapy, Pacemaker – temporary &amp; permanent, Percutaneous transluminal coronary angioplasty, Cardioversion, Intra Aortic Balloon pump monitoring, Defibrillations, Cardiac surgeries, Coronary Artery Bypass Grafts (CABG/MICAS), Valvular surgeries, Heart Transplantation, Autologous blood transfusion, Radiofrequency Catheter Ablation</li> </ul>				
XII	15	Respiratory System Acid-base balance & imbalance Assesment: History & Physical Examination Diagnostic Tests:Pulse Oximetry, End –Tidal Carbon Dioxide Monitoring, Arterial blood gas studies, chest radiography, pulmonary Angiography, Bronchoscopy, Pulmonary function Test, Ventilation perfusion scan, Lung ventilation scan Causes Pathophysiology, Clinical types, Clinical features, Prognosis, Management: Medical, Surgical and Nursing management of Common pulmonary disorders:-Pneumonia, Status asthmaticus, interstitial drug disease, Pleural effusion, Chronic obstructive pulmonary disease, Pulmonary tuberculosis, Pulmonary edema, Atelectasis, Pulmonary embolism, Acute respiratory failure, Acute respiratory distress syndrome (ARDS), Chest Trauma Haemothorax, Pneumothorax Management Modalities:-Airway Management Ventilatory Management:-Invasive, non- invasive, long term mechanical ventilations Bronchial Hygiene:-Nebulization, deep breathing exercise, chest physiotherapy, postural drainage, Inter Costal Drainage, Thoracic surgeries				

Unit	Hours	Content
XIII	7	Burns Clinical types, classification, pathophysiology, clinical features, assessment, diagnosis, prognosis, Management: Medical, Surgical & Nursing management of burns Fluid and electrolyte therapy – calculation of fluids and its administration Pain management Wound care Infection control Prevention and management of burncomplications Grafts and flaps Reconstructive surgery Rehabilitation
XIV	5	Obstetrical Emergencies  □ Causes, Pathophysiology, Clinical types, clinical features, diagnostic Prognosis, Management: Medical, Surgical and Nursing management of : Antepartum haemorrhage, Preeclampsia, eclampsia, Obstructed labour and ruptured uterus, Post partum haemorrhage, Peurperal sepsis, Obstetricalshock
XV	10	<ul> <li>Neonatal Paediatric emergencies</li> <li>□ Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis, Management: medical, surgical and Nursing management of</li> <li>• Neonatal emergencies</li> <li>□ Asphyxia Neonatarum, Pathological Jaundice in Neonates, Neonatal seizures, Metabolic disorders, Intra cranial Hemorrhage, Neonatal Sepsis, RDS/HMD (Respiratory Distress Syndrome/Hyaline Membrane Disease), Congenital disorders:</li> <li>• Cyanotic heart disease, tracheo oesophageal fistula, congenital hypertropic pyloric stenosis, imperforateanus</li> <li>• Pediatric emergencies</li> <li>□ Dehydration, Acute broncho pneumonia, Acute respiratory distress syndrome, Poisoning, Foreign bodies, seizures, traumas, Status asthmaticus</li> </ul>
XVI	2	Legal and ethical issues in critical care-Nurse's role  Brain death Organ donation & Counselling Do Not Resuscitate(DNR) Euthanasia Living will
XVII	2	Quality assurance  Standards, Protocols, Policies, Procedures  Infection control; Standard safety measures  Nursing audit  Staffing  Design of ICU/CCU

#### **Practical**

Total = 960 Hours 1 Week = 30 Hours

S.No.	Deptt./Unit	No. of Week	Total Hours
3	Burns ICU	2	60 Hours
5	Medical ICU	8	240 Hours
6	Surgical ICU	12	360 Hours
9	CCU	2	60 Hours
10	Emergency Department	3	90 Hours
12	Dialysis Unit	1	30 Hours
13	Transplant Room	2	60 Hours
14	Paediatric/ NICU	2	60 Hours
	Total	32 Weeks	960 Hours

### ESSENTIAL CRITICAL CARE NURSING SKILLS

#### I. Procedures Observed

- 1. CT Scan
- 2. MRI
- 3. EEG
- 4. Hemodialysis
- 5. Endoscopic Retrograde cholangio Pancreaticogram(ERCP)
- 6. Heart/ Neuro/GI./ Renal Surgeries

# **II. Procedures Assisted**

- 1. Advanced life support system
- 2. Basic cardiac life support
- 3. Arterial line/arterial pressure monitoring/bloodtaking
- 4. Arterial blood gas
- 5. ECG recording
- 6. Blood transfusion
- 7. IV cannulation therapy
- 8. Arterial Catheterization
- 9. Chest tube insertion
- 10. Endotracheal intubations
- 11. Ventilation

- 12. Insertion of central line/cvp line
- 13. Connecting lines fordialysis

#### **III. Procedure Performed**

- 1. Airway management
  - a. Application of oropharyngeal airway
  - b. Oxygen therapy
  - c. CPAP (Continuous Positive Airway pressure)
  - d. Care of tracheostomy
  - e. Endotracheal extubation
- 2. Cardiopulmonary resuscitation, Basic cardiac life support, ECG
- 3. Monitoring of critically ill patients clinically with monitors, capillary refill time (CRT) assessment of jaundice, ECG.
- 4. Gastric lavage
- 5. Assessment of critically ill patients

Identification & assessment of risk factors, Glasgow coma scale, and dolls eye movement, arterial pressure monitoring, cardiac output/pulmonary artery pressure monitoring, and detection of life threatening abnormalities

- 6. Admission & discharge of critically ill patients
- 7. Nutritional needs gastrostomy feeds, pharyngeal feeds, jejunostomy feeds, TPN, formula preparation & patient education.
- 8. Assessment of patient for alteration in blood sugar levels monitoring blood sugar levels periodically & administering insulinperiodically.
- 9. Administration of drugs: IM, IV injection, IV cannulation & fixation of infusion pump, calculation of dosages, use of insulin syringes/ tuberculin, monitoring fluid therapy, blood administration.
- 10. Setting up dialysis machine and starting, monitoring and closing dialysis
- 11. Procedures for prevention of infections:

Hand washing, disinfection & sterilization surveillance, and fumigation universal precautions.

- 12. Collection of specimen.
- 13. Setting, use & maintenance of basic equipment, ventilator, O2 analyzer, monitoring equipment, transducers, defibrillator, infusion & syringe pumps, centrifuge machine.

#### IV Other Procedures:

#### CLINICAL SPECIALITY-II

#### MEDICAL SURGICAL NURSING- ONCOLOGY NURSING

Placement: II Year Hours of Instruction

Theory:150 hours Practicals:950 hours Total:1100 hours

### **Course Description**

This course is designed to assist students in developing expertise and in-depth understanding in the field of oncology Nursing. It will help students to develop advanced skills for nursing intervention in various oncological conditions. It will enable the student to function as oncology nurse practitioner/specialist and provide quality care. It will further enable the student to function as educator, manager, and researcher in the field of oncology nursing

## **Objectives**

- 1. Explain the prevention, screening and early detection of cancer
- 2. Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of oncological disorders of various body systems
- 3. Describe the psychosocial effects of cancer on patients and families.
- 4. Demonstrate skill in administering/assisting in various treatment modalities used for patients with cancer
- 5. Apply nursing process in providing holistic care to patients with cancer.
- 6. Apply specific concepts of pain management
- 7. Appreciate the care of death and dying patients and value of bereavement support.
- 8. Describe the philosophy, concept and various dimensions of palliative care
- 9. Appreciate the role of alternative systems of medicine in care of cancer patients
- 10. Appreciate the legal & ethical issues relevant to oncologynursing
- 11. Recognize and manage Oncologicalemergencies
- 12. Counsel the patients with cancer and their families
- 13. Incorporate evidence based nursing practice and identify the areas of research in the field of oncologynursing
- 14. Recognize the role of oncology nurse practitioner as a member of oncology team
- 15. Collaborate with other agencies and utilize resources in caring for cancer patients.
- 16. Teach and supervise nurses and allied health workers.

  Design a layout and develop standards for management of oncology units/hospitals and nursing care.

# **Content outline**

Unit	Hours.	Content				
I	4	Introduction         □ Epidemiology-Incidence, Prevalence – Global, National, State and Local         □ Disease burden, concept of cancer, risk factors         □ Historical perspectives         □ Trends and issues         □ Principles of cancer management         □ Roles and responsibilities of oncology nurse				
II	5	The Nature of Cancer  Normal cell biology The Immune system Pathological and pathophysiological changes intissues Biology of the cancer cell Clone formation Transformation Tumor stem lines Structure of a solid tumor Products produced by the tumor Systemic effects of tumor growth				
III	4	Etiology of Cancer  Carcinogenesis, Theories of cancer causation Risk factors Carcinogens – genetic factors, chemical carcinogens, radiation, viruses, Immune system failure, rapid tissue proliferation Hormone changes, diet, emotional factors.				
IV	10	Diagnostic Evaluation  Health assessment: History taking, physical examination,  Staging and grading of tumors,  TNM Classification  Common diagnostic tests  Blood investigation: Haemetological, Bio-chemical, Tumor markers, Hormonal assay  Cytology: Fine needle aspirationcytology(FNAC)  Histopathology: Biopsy  Radiological assessment: MRI, Ultrasound, Computed tomography, Mammography, Positron emission tomography(PET), Radio nuclide imaging, Functional metabolism imaging  Endoscopies  Nurses responsibilities in diagnosticmeasures				

Unit	Hours.	Content			
V	10	Levels of prevention and care  □ Primary prevention – Guidelines for cancer detection, general measures, Warning signs of cancer, □ Self examination-Oral, Breast, Testicular □ Secondary prevention – early diagnosis. □ Screening □ Tertiary prevention – disability limitation, □ Rehabilitation: Mobility, Speech, Bowel and bladder, Ostomies etc □ Patient and family education, □ Discharge instruction, follow-up care and use of community resources.			
VI	25	Cancer Treatment Modalities and Nurse's Role    Surgery			

Unit	Hours.	Content
		<ul> <li>Bone Marrow Transplantation /Stem CellTransplantation</li> <li>Types, indications, transplantation procedure, complications and nursing managment</li> <li>Types and donor sources</li> <li>Preparation and care of donor and recipient</li> <li>Bone marrow bank</li> <li>Legal and ethical issues</li> </ul>
		<ul> <li>Immunotherapy (Biotherapy)</li> <li>Concepts and principles</li> <li>Classification of agents</li> <li>Treatment and applications</li> </ul>
		<ul> <li>Gene Therapy</li> <li>Current Concepts and practices</li> </ul>
		<ul> <li>Alternative and Complementary Therapies</li> <li>Current practices</li> </ul>
VII	10	<ul> <li>□ Pain management:- Theories, typesand         <ul> <li>Nature of cancer pain</li> <li>Pathophysiology of pain</li> <li>Pain threshold</li> </ul> </li> <li>□ Assessment of pain         <ul> <li>Principles of cancer pain control</li> <li>Pharmacological: Opioid and non-opioid analgesictherapy</li> <li>Patient controlled analgesia(PCA)</li> <li>Other invasive techniques of pain control</li> <li>Recentdevelopments in Cancer pain</li> </ul> </li> <li>□ Non- Pharmacological pain relief technique         <ul> <li>Complementary therapies(Music, massage, meditation, relaxation techniques, biofeed backetc)</li> <li>Psychological intervention in pain control</li> <li>Alternative system of medicines Role</li> </ul> </li> <li>of nurse</li> </ul>
VIII	5	Palliative care  Definition and scope, philosophy Concept and elements of palliative care Global and Indian perspective of palliative care Quality of life issues Communication skill Nursing perspective of palliative care and itselements Home care
		□ Hospice care  Role of nurse in palliative care

Unit	Hours.	Content		
IX	2	<ul> <li>Infection control:         <ul> <li>Process of infection, risk of hospitalization, nosocomial infections-prevention and control of infection in acute, long term care facility and community based care</li> <li>Standard safety measures</li> </ul> </li> </ul>		
X	30	Nursing Care of Patients With Specific MalignantDisorders  Malignancies of G.I. system-oral, oesophagus, stomach, rectal, liver & pancreas, care of ostomies/stoma  Respiratory malignancies Genito urinary system malignancies- prostate Bladder, renal testicular malignancies, Gynecological malignancies-cervix, uterus, ovary Hematological malignancies-Lymphomas, Leukemias. Malignancies of musculoskeletal system Endocrine malignancies Skin Head and Neck -brain tumors Other malignancies – Breast cancer, AIDS related Malignancies (Kaposi's Sarcoma)		
XI	10	Paediatric malignancies  □ Leukemia,Lymphoma, Neuro- blastoma □ Wilm's tumor, Soft tissue sarcoma, Retinoblastoma □ Nursing Management of childrenwith Paediatric Malignancies		
XII	15	Nursing Management of Physiological Conditions and Symptoms Of Cancer Patient    Nutrition: - effects of cancer on nutritional Status and its consequences:-Anemia, Cachexia, Xerostomia, mucositis, Dysphagia , nausea and vomiting, constipation, diarrhoea, electrolyte imbalances, taste alterations    Impaired mobility: Decubitus ulcer, pathologic fractures, thrombophlebitis, pulmonary embolism, contractures, footdrop  Other symptoms   Dyspepsia & hiccup, dyspnoea intestinal obstruction, Fungating wounds   Anxiety & depression, insomnia Lymph edema  Impact of cancer on sexuality:   Effects of radiotherapy/ chemotherapy/surgery on sexuality of the cancer patient Nursing management of cancer patients experiencingsexual dysfunction     Sexual counseling		

Unit	Hours.	Content	
XIII	10	Cancer Emergencies  Disseminated intravascular coagulation(DIC),  Malignant pleural effusion  Neoplastic cardiac tamponade and septic shock spinal cord compression  Superior venacava syndrome  Metabolic emergency: hyper and hypo calcemia  Surgical emergency  Urological emergency  Hemorrhage  Organ obstruction  Brain metastasis  Nurses role in managing oncologic emergencies	
XIV	8	Psycho-Social Aspects of Nursing Care  Psychological responses of patients with cancer  Psychosocial assessment —  Crisis intervention, coping mechanisms  Stress management, spiritual/cultural care and needs  Counseling: individual and family  Maximizing quality of life of patient and family  Ethical, moral and legal issues—  End of life care  Grief and grieving process  Bereavement support  Care of Nurses who care for the dying.	
XV	2	Layout and Design of an oncology institution/ ward, OPD, chemotherapy unit, Bone marrow transplantation unit, Pain clinic etc  Practice Standards of oncology nursing Policies and Procedures Establishing Standing orders and Protocols  Quality Assurance Programme in oncology units Nursing audit	

# **Clinical Experience**

S. No.	Deptt./ Unit	No. of Week	Total Hours
1	Medical Oncology ward	6	180 Hours
2	Surgical Oncology ward	6	180 Hours
3	Bone marrow transplantation Unit	2	60 Hours
4	Operation Theatre	2	60 Hours
5	Radiotherapy Unit	2	60 Hours
6	Chemotherapy Unit	4	120 Hours
7	Out patient department and pain clinic	2	60 Hours
8	Pediatric Oncology ward	2	60 Hours
9	Palliative Careward	2	60 Hours
10	Community oncology	2	60 Hours
11	Hospice	1	30 Hours
12	Other field visits	1	30 Hours
	Total	32 Weeks	960 Hours

### **Procedures Observed**

- 1. CT Scan
- 2. MRI
- 3. PET Scan(Positron Emission Tomography)
- 4. Ultra sound
- 5. Mammography
- 6. Radio Nuclide Imaging
- 7. Bone Scan
- 8. Thyroid Function Test
- 9. Functional and Metabolic Imaging
- 10. Transportation of radioactive materials
- 11. Others

# **Procedures Assisted**

- 1. IV cannulation Open method
- 2. Chemotherapy
- 3. Radiotherapy Brachytherapy Low Density Radiation, High Density Radiation.
- 4. Interstitial implantation
- 5. Bio-therapy and Gene therapy
- 6. Teletherapy Treatment planning
- 7. Bone marrow aspiration and biopsy
- 8. Biopsy tissue
- 9. FNAC Fine Needle Aspiration Cytology andbiopsy

- 10. Advance Cardiac life support
- 11. Endotracheal intubation
- 12. Defibrillation Ventilation
- 13. Tracheostomy
- 14. Thoracentesis
- 15. Paracentesis
- 16. Lumbar Puncture
- 17. Arterial Blood Gas
- 18. Nerve Block
- 19. Chest tube insertion
- 20. Intercostal drainage
- 21. CVP monitoring

### **Procedure Performed**

- 1. Screening forcancer
- 2. Assessment of pain
- 3. Assessment of Nutritional status
- 4. Care of Tracheostomy
- 5. Endotracheal intubation
- 6. Gastric gavage
- 7. Pap smear
- 8. IV cannulation
- 9. Care of surgical flaps
- 10. Care of ostomies
- 11. Blood transfusion and component therapy
- 12. Counseling
- 13. Practice standard safety measures
- 14. Care of dead body and mortuary formalities

## Other procedures

# (As per the institutional protocol):

1. Alternative therapies

#### CLINICAL SPECIALITY - II

#### MEDICAL SURGICAL NURSING- NEUROSCIENCES NURSING

Placement: II Years

Hours of Instruction Theory – 150 Hours Practical- 950 Hours Total: 1100 Hours

### **Course Description**

This course is designed to assist students in developing expertise and in-depth knowledge in the field of neurology and neurosurgical Nursing. It will help students to develop advanced skills for nursing intervention in caring for patients with neurological and neurosurgical disorders. It will enable the student to function as neuroscience nurse practitioner/ specialist. It will further enable the student to function as educator, manager and researcher in the field of neurology and neurosurgical Nursing.

# **Objectives**

At the end of the course the students will be able to

- 1. Appreciate trends and issues related to neurology and neurosurgical Nursing.
- 2. Review the anatomy and physiology of nervous system
- 3. Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of patients with neurological and neurosurgical disorders
- 4. Perform neurological assessment and assist in diagnostic procedures
- 5. Describe the concepts and principles of neurosciencenursing
- 6. Describe the various drugs used in neurosciences and nurses responsibility
- 7. Assist in various therapeutic and surgical procedures in neuroscience nursing
- 8. Demonstrate advance skills/competence in managing patients with neurological and neurosurgical disorder following nursing process approach
- 9. Identify psychosocial problems of patients with disabilities and assist patients and their family to cope with emotional distress, spiritual, grief and anxiety
- 10. Participate in preventive, promotive and rehabilitative services for neurological and neurosurgical patients.
- 11. Explain the legal and ethical issues related to brain death, organ transplantation and practice of neuroscience nursing
- 12. Incorporate evidence based nursing practice and identify the areas of research in the field of neuroscience nursing

- 13. Organise and conduct in service education program for nursing personnel.
- 14. Develop standards of care for quality assurance in neuroscience nursing practice
- 15. Identify the sources of stress and manage burnout syndrome among health care providers.
- 16. Teach and supervise nurses and allied health workers.
- 17. Plan and develop physical layout of neuro intensive care unit

Unit	Hours	Content		
<ul> <li>History-Development in neurological and neurosurgical nursing Service &amp; education</li> <li>Emerging trends and issues in neurology and neuro surgery and implication to nursing.</li> <li>neurological and neurosurgical problems—</li> <li>Concepts, principles and nursingperspectives</li> <li>Ethical and legal issues</li> <li>Evidence based nursing and its application in neurological and nursing</li> </ul>		<ul> <li>Introduction to neuroscience(neurological and neurosurgical) nursing</li> <li>History-Development in neurological and neurosurgical nursing, Service &amp; education</li> <li>Emerging trends and issues in neurology and neuro surgery and its implication to nursing.</li> <li>neurological and neurosurgical problems—</li> <li>Concepts, principles and nursingperspectives</li> <li>Ethical and legal issues</li> <li>Evidence based nursing and its application in neurological and neurosurgical</li> </ul>		
II	5	Epidemiology  Major health problems- Risk factors associated with neurological conditions- Hereditary, Psychosocial factors, smoking, alcoholism, dietary habits, cultural and ethnic considerations, occupational and infections. Health promotion, disease prevention, life style modification and its implications to nursing  Alternate system of medicine/complementary therapies		
III	10	Review of Anatomy and physiology  Embryology Structure and functions of Nervous system- CNS, ANS, cereberal circulation, cranial and spinal nerves and reflexes, motor and sensory functions Sensory organs		

Unit	Hours	Content			
IV	15	Assessment  Assessment  History taking  Physical assessment, psychosocial assessment  Neurological assessments, Glasgow coma scale interpretation & its relevance to nursing.  Common assessment abnormalities  Diagnostic measures  Cerebro spinal fluid analysis  Radiological studies-Skull and spine X-ray Cerebral Angiography, CT Scan, Single Photon Emission Computer Tomography(SPECT), MRI (Magnetic Resonance Imaging), MRA, MRS, Functional MRI, Myelography, PET (Positron Emission Test), Interventional radiology.  Electorgraphic studies- Electro encephalo graphy, MEG,EMG, video EEG,  Nerve conduction studies-Evoked potentials, visual evoked potentials, brain stem auditory evoked potentials, somatosensory evoked potentials  Ultrasound studies-Carotid duplex, transcranial Doppler sonography,  Immunological studies  Biopsies – muscle, nerve and Brain.  Interpretation of diagnostic measures Nurse's  role in diagnostic tests			
V	5	<ul> <li>Meeting Nutritional needs of neurological patients</li> <li>□ Basic nutritional requirements</li> <li>□ Metabolic changes following injuryand starvation</li> <li>□ Nutritional assessment</li> <li>□ Common neurological problems that interfere with nutritionand strategies for meeting their nutritional needs</li> <li>□ Special metabolic and electrolyte imbalances</li> <li>□ Chronic fatigue syndrome</li> </ul>			
V	5	Drugs used in neurological and neurosurgical disorders  Classification Indications, contraindications, actions and effects, toxic effects  Role of nurse			

Unit	Hours	Content			
VII	10	<ul> <li>Traumatic conditions.</li> <li>Causes, pathophysiology, Clinical types, Clinical features, diagnosis, Prognosis Management: medical, surgical and Nursing management of</li> <li>Cranio cerebral injuries.</li> <li>Spinal &amp; Spinal cord injuries.</li> <li>Peripheral nerve injuries.</li> <li>Unconsciousness</li> </ul>			
VIII	10	Cerebro vascular disorders.  Causes, pathophysiology, Clinical types, Clinical features, diagnosis, Prognosis, Management: medical, surgical and Nursing management of  Stroke & arterio venous thrombosis.  Haemorrhagic embolus.  Cerebro vascular accidents.  Intracranial aneurysm.  Subarchnoid Haemorrhage.  Arterio venous fistula.  Brain tumours  Diseases of cranial nerves; Trigiminal neuralgia, Facial palsy, Bulbar palsy.			
IX	10	<ul> <li>Degenerating and demyelinating disorders</li> <li>□ Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis , Management: medical, surgical and Nursing management of</li> <li>• Motor neuron diseases.</li> <li>• Movement disorders- Tics, dystonia, chorea, wilson's disease, essential tremors</li> <li>• Dementia.</li> <li>• Parkinson's disease.</li> <li>• Multiple sclerosis.</li> <li>• Alzemier's</li> </ul>			
X	10	Neuro infections Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis , Management: medical, surgical and Nursing management of Neuro infections  • Meningitis-types • Encephalitis. • Poliomyelitis. • Parasitic infections. • Bacterial infections • Neurosyphilis. • HIV & AIDS. • Brain abscess.			

Unit	Hours	Content		
XI	10	Paroxysmal disorders.  □ Causes, pathophysiology, Clinical types, Clinical features, diagnosis, Prognosis, Management: medical, surgical and Nursing management of  • Epilepsy and seizures.  • Status epilepticus.  • Syncope.  • Menier's syndrome.  • Cephalgia.		
XII	10	<ul> <li>Developmental disorders.</li> <li>Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis, Management: medical, surgical and Nursing management of</li> <li>Hydrocephalus.</li> <li>Craniosynostosis.</li> <li>spina bifida- Meningocele, Meningomyelocele encephalocele</li> <li>syringomyelia.</li> <li>Cerebro vascular system anomalies.</li> <li>Cerebral palsies.</li> <li>Down's syndrome</li> </ul>		
XIII	10	Neuro muscular disorders.  Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis, Management: medical, surgical and Nursing management of  Polyneuritis – G B Syndrome.  Muscular dystrophy.  Myasthenia gravis.  Trigeminal neuralgia.  Bell's palsy.  Menier's disease  Carpal tunnel syndrome  Peripheral neuropathies		
XIV	5	Neoplasms – surgical conditions.  Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis , Management: medical, surgical and Nursing management of  Space occupying lesions - types  Common tumors of CNS,		
XV	5	Other disorders  Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis , Management: medical, surgical and Nursing management of  Metabolic disorders- diabetes, insipidus, metabolic encephalopathy  Sleep disorders  Auto immune disorders- multiple sclerosis, inflammatory myopathies		

Unit	Hours	Content			
XVI	10	Neuro emergencies  Causes, pathophysiology, Clinical types, Clinical features, diagnostic, Prognosis Management: medical, surgical and Nursing management of  Increased intracranial pressure  Unconscious Herniation syndrome Seizures Severe head injuries Spinal injuries Cerebro vascular accidents			
XVII	5	Rehabilitation.  Concept and Principles of Rehabilitation.  Factors affecting quality of life and coping  Rehabilitation in acute care setting, and following stroke, head injury and degenerative disorders of brain  Physiotherapy.  Counselling  Care giver's role  Speech & LanguageNeurogenic communication disorders, Speech therapy			
XVIII	5	Ethical and legal issues in neuroscience nursing  Brain death and organ transplantation Euthanasia Negligence and malpractice Nosocomial infections			
XIX	5	<ul> <li>Quality assurance in neurolgical nursing practice</li> <li>Role of advance practitioner in neurological nursing</li> <li>Professional practice standards</li> <li>Quality control in neurologic nursing</li> <li>Nursing audit</li> <li>Neuro ICU</li> <li>Philosophy, aims and objectives</li> <li>Policies, staffing pattern, design and physical plan of neuro ICU</li> <li>Team approach, functions</li> <li>Psychosocial aspects in relation to staff and clients of neuro ICU,</li> <li>In-service education</li> </ul>			

S.No.	AREA OF POSTING	No. of Week	Total Hours
1	O.P.D.	2	60
2	Casualty	2	60
3	Diagnostics	2	60
4	Neuro psychiatry	1	30
5	Neuro Medical wards	4	120
6	Paediatric Neuro ward	2	60
7	Neuro surgical wards	4	120
8	Head Injury ward	3	90
9	ICU- neuro medicine	4	120
10	I.C.U neuro surgical	4	120
11	Rehabilitation	2	60
12	Operation Theatre	2	60
	Total	32 Weeks	960 Hours

### ESSENTIAL NEURONURSING SKILLS

## I. Procedures Observed

- 1. CT scan
- 2. MRI
- 3. PET
- 4. EEG
- 5. EMG
- 6. Sleep patternstudies/Therapy
- 7. Radiographical studies
- 8. Neuro surgeries
- 9. Nerve conduction studies
- 10. Ultrasound studies
- 11. Any other

# II. Procedures Assisted

- 1. Advanced Cardiac life support
- 2. Lumbar Puncture
- 3. Biopsies muscle, nerve and Brain
- 4. Arterial Blood Gas
- 5. ECG Recording
- 6. Blood transfusion
- 7. IV cannulation open method

- 8. Endotracheal intubation
- 9. Ventilation
- 10. Tracheostomy
- 11. ICP monitoring
- 12. Gama Knife
- 13. Cereberal angiography
- 14. Myelography
- 15. Neuro surgeries

#### **III. Procedures Performed:**

- 1. Airway management
  - a. Application of Oro Pharyngeal Airway
  - b. Care of Tracheostomy
  - c. Conduct Endotracheal Intubation
  - d. use of AMBU bag, artificial respirators
  - e. Setting of Ventilators and Care of patientson ventilators
- 2. Cardio Pulmonary Resuscitation Defibrillation
- 3. Neurological assessment -Glasgow coma scale
- 4. Gastric Lavage
- 5. IV Cannulation
- 6. Administration of emergency IV Drugs, fluid
- 7. Care of patients with incontinence, bladder training Catheterization
- 8. Care of patients on traction related to the neurological conditions
- 9. Blood Administration.
- 10. Muscle strengthening exercises
- 11. Guidance and counseling
- 12. Monitoring management and care of monitors.

### **IV.** Other Procedures:

### CLINICAL SPECIALITY - II

### MEDICAL SURGICAL NURSING- NEPHRO-UROLOGY NURSING

Placement: II Year

Hour of Instruction Theory: 150 Hours Practical: 950 Hours Total: 1100 Hours

### **Course Description**

This course is designed to assist students in developing expertise and in-depth understanding in the field of Nephro and urological Nursing. It will help students to develop advanced skills for nursing intervention in various nephro and urological conditions. It will enable the student to function as nephro and urology nurse practitioner/specialist and provide quality care. It will further enable the student to function as educator, manager, and researcher in the field of nephro and urology nursing

### **Objectives**

At the end of the course the students will be able to:

- Appreciate trends and issues related to nephro and urological nursing
- 2 Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of **nephro and urological** conditions
- 3. Perform physical, psychosocial & spiritual assessment
- **4** Assist in various diagnostic, therapeutic and surgical interventions
- 5 Provide comprehensive nursing care to patients with **nephro and urological** conditions
- 6 Describe the various drugs used in **nephro and urological** conditions and nurses responsibility
- 7. Demonstrate skill in handling various equipments/gadgets used for patients with **nephro and urological** conditions
- 8 Appreciate team work & coordinate activities related to patient care.
- **9.** Practice infection control measures.
- 10. Identify emergencies and complications & take appropriate measures
- Assist patients and their family to cope with emotional distress, grief, anxiety and spiritual needs
- Discuss the legal and ethical issues in **nephro and urological** nursing
- Identify the sources of stress and manage burnout syndrome among health care providers

- 4 Appreciate the role of alternative system of medicine in the care of patient
- Incorporate evidence based nursing practice and identify the areas of research in the field of **nephro and urological** nursing
- 16 Teach and supervise nurses and allied health workers.
- 17. Design a layout of kidney transplant unit and dialysis unit
- 18 Develop standards of nephro urological nursing practice

Unit	Hours	Content	
I	5	<ul> <li>Introduction</li> <li>Historical development: trends and issues in the fieldof nephro and urological nursing.</li> <li>nephro and urological problems</li> <li>Concepts, principles and nursingperspectives</li> <li>Ethical and legal issues</li> <li>Evidence based nursing and its application in nephroand urological nursing(to be incorporated in all the units)</li> </ul>	
II	5	Epidemiology  Major health problems- urinary dysfunction, urinary tract infections, Glomuerular disorders, obstructive disorders ad other urinary disorders. Risk factors associated with nephro and urological conditions conditions-Hereditary, Psychosocial factors, smoking, alcoholism, dietary habits, cultural and ethnic considerations.  Health promotion, disease prevention, life style modification and its implications to nursing.  Alternate system of medicine/complementary therapies.	
III	5	Review of anatomy and physiology of urinary system  Embryology Structure and functions Renal circulation Physiology of urine formation Fluid and electrolyte balance Acid base balance Immunology specific to kidney	
IV	20	Assessment and diagnostic measures  History taking Physical assessment, psychosocial assessment Common assessment abnormalities-dysurea, frequency, enuresis, urgency, hesistancy, hematuria, pain, retention, burning on urination, pneumaturia, incontinence, nocturia, polyurea, anuria, oliguria, Diagnostic tests-urine studies, blood chemistry, radiological procedures-KUB, IVP,nephrotomogram, retrograde pylogram, renal arteriogram, renalultrasound, CT scan, MRI, cystogram, renal	

Unit	Hours	Content		
		scan, biopsy, endoscopy-cystoscopy, urodynamics studies- cystometrogram, urinary flow study, sphincter electromyography, voiding pressure flow study, videourodynamics, Whitaker study		
		Interpretation of diagnostic measures Nurse's role in		
		diagnostic tests		
		Renal immunopathy/Immunopathology		
		□ General Concept of immunopathology		
V	5	Immune mechanism of glomerual vascular disease		
		□ Role of mediater systems in glomerula vascular disease		
		Urological Disorders and Nursing Management		
		Etiology, clinical manifestations, diagnosis, prognosis, related		
		pathophysiology, medical, surgical and nursing management of Urinary tract infections- pyelonephritis, lower urinary tract		
		Urinary tract infections- pyelonephritis, lower urinary tract infections,		
		□ Disorders for ureters, bladder and urethera		
		□ Urinary tract infections-		
		□ Urinary dysfunctions- urinary retention, urinary incontinence, urinary reflux,		
VI	15	Bladder disorders- neoplasms, calculi, neurogenic bladder, trama,		
		congenital abnormalities		
		□ Benign prostrate hypertrophy(BPH) □ Ureteral disorders: ureteritis, ureteral trauma, congenital		
		anomalies of ureters		
		☐ Uretheral disorders- tumours, trauma, congenial anomalies of		
		ureters,		
		Glomueral disorders and nursing management  Etiology, clinical manifestations, diagnosis, prognosis, related		
		pathophysiology, medical, surgical and nursing management of		
		Glomueralo nephritis- chronic, acute, nephriticsyndrome		
		□ Glomuerato nephritis- chronic, acute, nephriticsyndrome □ Acute Renal failure and chronic renalfailure.		
		□ Renal calculi		
		□ Renal tumours-benign andmalignant		
VII	25	□ Renal trauma		
,		<ul><li>Renal abscess</li><li>Diabetic nephropathy</li></ul>		
		Vascular disorders		
	BV	□ Renal tuberculosis		
	V.	□ Polycystic		
		Congenital disorders		
		□ Hereditary renaldisorders		
		□ Management of Renalemergencies		
		□ Anuria		
VIII	10	□ Acute Renal failure		
V 111	10	□ Poisoning		
		☐ Trauma ☐ Urine retention		
		Urine retention		

Unit	Hours	Content	
		□ Acute graft rejection □ Hematuria	
		□ Nurse's role	
IX	10	Drugs used in urinary disorders  □ Classification □ Indications, contraindications, actions and effects, toxic effects □ Role of nurse	
X	10	Dialysis  □ Dialysis- Historical, types, Principles, goals  • Hemodialysis- vascular access sites- temporary and permanent  • Peritoneal dialysis  □ Dialsyis Procedures- steps, equipments, maintenance,  □ Role of nurse- pre dialysis, intra and post dialysis  □ Complications-  □ Counseling  □ patient education  □ Records and reports	
XI	10	<ul> <li>Kidney transplantation</li> <li>Nursing management of a patient with Kidney transplantation</li> <li>Kidney transplantations- a historical review</li> <li>Immunology of graft rejections</li> <li>The recipient of a renal transplant</li> <li>Renal preservations</li> <li>Human Leucocytic Antigen(HLA)typing matching and cross matching in renal transplantation</li> <li>Surgical techniques of renaltransplantations</li> <li>Chronic renal transplantrejection</li> <li>Complication after KTP: Vascular and lymphatic, Uroloical, cardiovascular, liver and neurological, infectious complication</li> <li>KTP in children and management of pediatric patient with KTP</li> <li>KTP in developing countries</li> <li>Results of KTP</li> <li>Work up of donor and recipient for renal transplant</li> <li>Psychological aspect of KTP and organ donations</li> <li>Ethics in transplants</li> <li>Cadaveric transplantation</li> </ul>	
XU	5	Rehabilitation of patient with nephrological problems Risk factors and prevention Rehabilitation of patients on dialysis and after kidney transplant Rehabilitation of patients after urinary diversions Family and patient teaching	
XIII	10	Pediatric urinary disorders  □ Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, medical, surgical and nursing management of children with Renal Diseases -UTI, ureteral reflux, glomerulo nephritis, nephrotic syndrome infantile nephrosis, cystic kidneys, familial factors in renal diseases in childhood, Haemolytic uraemic	

		Content
		syndrome. Benign recurrent haemturia, nephropathy, wilms tumour
XIV	5	Critical care units- dialysis, KTP unit  Philosophy, aims and objectives  Policies, staffing pattern, design and physical plan of Dialysisand KTP units  Team approach, functions  Psychosocial aspects in relation to staff and clients of ICU, dialysis unit  In-service education  Ethical and legal issues
XV	5	<ul> <li>Quality assurance in nephrological nursing practice</li> <li>Role of advance practioner in nephrological nursing</li> <li>Professional practice standards</li> <li>Quality control in nephrological nursing</li> <li>Nursing audit</li> </ul>

### **Practicals**

Total = 960 Hours 1 Week = 30 Hours

S. No.	Deptt./ Unit	No. of Week	Total Hours
1	Nephrology Ward	6	180 Hours
2	Pediatrics	2	60 Hours
3	Critical Care Unit	2	60 Hours
4	Urology Ward	6	180 Hours
5	Dialysis Unit	4	120 Hours
6	Kidney Transplantation Unit	2	60 Hours
7	URO OT	2	60 Hours
8	Emergency Wards	2	60 Hours
9	Uro Nephro OPDs	4	120 Hours
10	Diagnostic Labs	2	60 Hours
	Total	32 Weeks	960 Hours

### **Procedures observed**

### I. Procedures Observed

- 1. CT Scan
- 2. MRI
- 3. Radiographic studies
- 4. Urodynamics
- 5. Hemodialysis
- 6. Renal Surgeries

# II. Procedures Assisted

- 1. Blood transfusion
- 2. I V cannulation therapy
- 3. Arterial Catheterization
- 4. Insertion of central line/cvp line
- 5. Connecting lines fordialysis
- 6. Peritoneal dialysis
- 7. Renal biopsy
- 8. Endoscopies- Bladder, urethra

# **III.** Procedure Performed

- 1. Health assessment
- 2. Insertion of uretheral and suprapubic catheters
- 3. Urine analysis

- 4. Catheterisation
- 5. Peritoneal dialysis
- 6. Bladder irrigation
- 7. Care of ostomies
- 8. Care of urinary drainage
- 9. Bladder training
- 10. Care of vascular access
- 11. Setting up dialysis machine and starting, monitoringand closing dialysis
- 12. Procedures for prevention of infections:
- 13. Hand washing, disinfection & sterilization surveillance, and fumigation universal precautions.
- 14. Collection of specimen.
- 15. Administration of drugs: IM, IV injection, IV cannulation & fixation of infusion pump, calculation of dosages, blood administration. monitoring -fluid therapy, electrolyte imbalance,
- 16. Nutritional needs, diet therapy & patient education.
- 17. Counselling

### **IV.** OTHER PROCEDURES:

#### CLINICAL SPECIALITY - II

#### MEDICAL SURGICAL NURSING - ORTHOPEDIC NURSING

Placement: II Year

Hours of Instruction Theory: 150 Hours Practical: 950 Hours Total: 1100 Hours

### **Course Description**

This course is designed to assist students in developing expertise and in-depth understanding in the field of orthopedic nursing. It will help students to develop advanced skills for nursing intervention in various orthopedic conditions. It will enable the student to function as orthopedic nurse practitioner/specialist providing quality care. It will further enable the student to function as educator, manager, and researcher in the field of orthopedic nursing.

### **Objectives**

At the end of the course the students will be able to:

- 1. Appreciate the history and developments in the field of orthopedic nursing
- 2. Identify the psycho-social needsof the patient while providing holistic care.
- 3. Perform physical and psychological assessment of patients with orthopedic conditions and disabilities.
- 4. Describe various disease conditions and their management
- 5. Discuss various diagnostic tests required in orthopedic conditions
- 6. Apply nursing process in providing care to patients with orthopedic conditions and those requiring rehabilitation.
- 7. Recognize and manage orthopedic emergencies.
- 8. Describe recent technologies and treatment modalities in the management of patients with orthopedic conditions and those requiring rehabilitation.
- 9. Integrate the concept of family centered, long term care and community based rehabilitation to patients with orthopedic conditions.
- 10. Counsel the patients and their families with orthopedic conditions
- 11. Describe various orthotic and prosthetic appliances
- Appreciate the legal and ethical issues pertaining to patients with orthopedic conditions and those requiringrehabilitation.
- 13. Appreciate the role of alternative system of medicine in care of patients with orthopedic conditions

- 14. Incorporate evidence based nursing practice and identify the areas of research in the field of orthopedicnursing.
- 15. Recognize the role of orthopedic nurse practitioner and as a member of the orthopedic and rehabilitation team.
- 16. Teach orthopedic nursing to undergraduate students and in-service nurses.
- 17. Prepare a design and layout of orthopedic and rehabilitative units.

Unit	Hours	Content	
I	5	Introduction  Historical perspectives – History and trends in orthopedicnursing  Definition and scope of orthopedic nursing  Anatomy and physiology of Musculo-skeletal system  Posture, Body landmarks Skeletal system Muscular system.  Nervous system - Main nerves  Healing of - Injury, bone injury,  Repair of ligaments  Systemic response to injury  Ergonomics, Body mechanics, biomechanical measures  Orthopedic team	
II	8	Assessment of Orthopedic Patient  ☐ Health Assessment: History, physical examination-Inspection, palpation, movement, Measurement, muscle strengthTesting.  ☐ Diagnostic studies — Radiological studies, Muscleenzymes, serologic studies	
III	Care of patients with devices  Splints, braces, various types of plaster cast Various types of tractions, Various types of orthopedic beds andmattresses Comfort devices Implants in orthopedic Prosthetics and Orthotics		
IV	15	Injuries  Trauma & Injuries  Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis, management, medical surgical and nursing management of:  • Early management of Trauma  • Fractures  • Injuries of the  Shoulder and arm  Elbow, fore arm, wrist, hand  Hip, thigh, knee, leg, ankle, foot  Spine	

Unit	Hours	Content
		<ul> <li>Head injury</li> <li>Chest injury</li> <li>Polytrauma</li> <li>Nerve injuries</li> <li>Vascular injuries</li> <li>Soft tissue injuries</li> <li>Sports injuries</li> <li>Amputation</li> </ul>
V	8	<ul> <li>Infections of Bones and Joints</li> <li>Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis, management, medical surgical and nursing management of:         <ul> <li>Tuberculosis</li> <li>Osteomyelitis</li> <li>Arthritis</li> <li>Leprosy</li> </ul> </li> </ul>
VI	5	Bone Tumours  Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis, management, medical surgical andnursing management of:  Bone tumors – Benign, Malignant and metastatic  Differenttypes of therapies for tumors
VII	10	Deformities  □ Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis – medical surgical and nursing management of:Scoliosis, Kyphosis,Lordosis  □ Congenital disorders: Congenital dislocation of hip(CDH), Dislocation of patella, knee,  □ Varus and valgus deformities,  □ Deformities of digits,  □ Congenital torticollis.  □ Meningocele, meningomyelocele, spina bifida,  □ Chromosomal disorders.  □ Computer related deformities
VIII	5	Disorders of the spine  ☐ Intervertebral disc prolapse, Fracture of the spine ☐ Low back disorder – Low back pain, PND, spinal stenosis, spondylosis
IX	5	Nutritional/Metabolic and Endocrine Disorders  □ Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis, medical surgical and nursing management of:  • Rickets, • Scurvy, • Hyper vitaminosis A and D, • Osteomalacia,

Unit	Hours	Content		
		Osteoporosis		
		• Paget's disease,		
		<ul><li>gout,</li><li>Gigantism,</li></ul>		
		Dwarfism,		
		Acromegaly.		
		Therapeutic diets for various orthopedic disorders		
X	8	<ul> <li>Neuro-Muscular Disorders:</li> <li>□ Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis, medical surgical and nursing management of:</li> <li>• Poliomyelitis, CerebralPalsy</li> <li>• Myasthenia gravis</li> <li>• Spina bifida.</li> <li>• Peripheral nerve lesion,</li> <li>• Paraplegia, Hemiplegia, Quadriplegia.</li> <li>• Muscular dystrophy</li> </ul>		
		Chronic/Degenerative Diseases of Joints and Autoimmune		
XI	8	<ul> <li>Disorders:</li> <li>□ Causes, pathophysiology, clinical types, clinical features, diagnosis, prognosis – medical surgical and nursing management of:         <ul> <li>Osteo Arthritis</li> <li>Rheumatoid Arthritis</li> <li>Ankylosing spondylitis.</li> <li>Spinal disorders.</li> <li>Systemic Lupus Erythematosus</li> </ul> </li> </ul>		
		Orthopedic Disorders in Children:		
XII	5	<ul> <li>General and special consideration on pediatricorthopedics</li> <li>Genetic disorders</li> <li>Congenital anomalies</li> <li>Growth disorders</li> <li>Genetic counseling</li> <li>Nurses role in genetic counseling</li> </ul>		
		Geriatric Problems		
XIII	5	<ul> <li>Geriatric population, types of disabilities, causes, treatment and Management – Hospitalization, rest, physiotherapy, involvement of family members, social opportunities.</li> <li>Care at home – involvement of family and community, follow up care and rehabilitation</li> </ul>		
		Pharmacokinetics		
XIV	6	<ul> <li>Principles of drug administration</li> <li>Analgesics and anti inflammatory agents</li> <li>Antibiotics, Antiseptics,</li> <li>Drugs used in orthopedics and neuromusculardisorders</li> <li>Blood and blood components</li> <li>Care of drugs and nurses role</li> </ul>		

Unit	Hours	Content	
XV	30	Nurses Role in Orthopedic Conditions  Gait analysis  Urodynamic studies  Prevention of physical deformities  Alteration of body temperature regulatory system and immune systems  Immobilization — cast, splints, braces and tractions  Prevention and care of problems related to immobility  Altered sleeppatterns  Impaired communication  Self care and activities of daily living  Bladder and bowel rehabilitation  Psychological reaction related to disabilities and disorders.  Coping of individual and family with disabilities and disorders  Maintaining sexuality  Spirituality — A rehabilitative prospective  Orthopedic Reconstructive Surgeries  Replacement surgeries — Hip, Knee, Shoulder  Spine surgeries  Grafts and flaps surgery  Deformity correction.  Physiotherapy  Concepts, Principles, purpose,  Mobilization — Exercises: types, re-education in walking: Crutch walking, wheel chair, Transfer techniques,  Types of gaits: Non-weight bearing, partial weight bearing, four point crutch, tripoid, walking with sticks, calipers  Forms of therapies: Hydrotherapy, electrotherapy, waxbath, heat therapy, ice, helio therapy, radiant heat,  Chest physiotherapy	
XVI	8	Rehabilitation Principles of rehabilitation, definition, philosophy, process, Various types of therapies Special therapies and alternative therapies Rehabilitation counseling Preventive and restorative measures. Community based rehabilitation (CBR) Challenges inrehabilitation. Role of the nurse in rehabilitation, Legal and ethical issues in rehabilitationnursing Occupational therapy	
XVII	5	National Policies and Programmes  □ National programmes for rehabilitation of persons with disability - National Institutes, artificial limbs manufacturing Corporation, District Rehabilitation Centers and their schemes □ Regional rehabilitation centers etc.	

Unit	Hours	Content	
		<ul> <li>Public policy in rehabilitation nursing</li> <li>The persons with disabilities act 1995,</li> <li>Mental rehabilitation and Multiple disabilitiesact 1992,</li> <li>The National Trust Rules 1999 and 2000</li> <li>Rehabilitation Council of India</li> <li>Legal and ethical aspects in orthopedicnursing</li> <li>Rehabilitation health team and different categories of team members.</li> </ul>	
XVIII	4	Quality assurance  Standards, Protocols, Policies, Procedures  Nursing audit  Staffing  Design of orthopedic, physiotherapy and rehabilitation unit	

### **Practicals**

- 1. Clinical practice in Orthopedic, physiotherapy and Rehabilitation Units.
- 2. Application of tractions and plaster casts and removal of tractions and plaster casts and other appliances.
- 3. Apply Theories and Nursing Process in the management of patients with orthopedic conditions.
- 4. Provide various types of physical and rehabilitative therapies
- 5. Provide health education on related disease conditions.
- 6. Unit management and plan -designing

### **Clinical Experience**

Total = 960 Hours 1 Week = 30 Hours

S. No.	Deptt./Unit	No. of Week	Total Hours
1	Orthopedic Ward	8	240 Hours
2	Orthopedic Operation theatre	4	120 Hours
3	Neurosurgical Ward	2	60 Hours
4	Orthopedic O.P.D.	4	120 Hours
5	Casualty/Emergency and Trauma	4	120 Hours
6	Rehabilitation Units	2	60 Hours
7	Physiotherapy Unit	4	120 Hours
8	Paediatric /paediatric surgery unit	2	60 Hours
9	Field Visit	2	60 Hours
	Total	32 Weeks	960 Hours

### **Procedures Observed**

- 1. X Ray
- 2. Ultrasound
- 3. MRI
- 4. C T Scan/bone scan
- 5. Arthroscopy
- 6. Electrothermally assisted capsule shift or ETAC (Thermal capsulorrhaphy)
- 7. Fluroscopy
- 8. Electromyography
- 9. Myelography
- 10. Discography
- 11. Others

### **Procedures Assisted**

- 1. Blood Transfusion
- 2. IV cannulation and therapy
- 3. Ventilation
- 4. Various types of tractions
- 5. Orthopedic surgeries Arthrocentesis, Arthroscopy, Bone lengthening, Arthrodesis, grafting, Fractures fixation, reconstructive, reimplantation, replantation, spinal decompression, transplantation of bone, muscle or articular cartilage, autografting, allografting.
- 6. Injection Intra articular, intra osseous.
- 7. Advance LifeSupport

### **Peocedures Performed**

- 1. Interpretation of X ray films.
- 2. Application and removal of splints, casts, and braces.
- 3. Care of tractions skin and skeletal traction, pin site care.
- 4. Cold therapy.
- 5. Heat therapy
- 6. Hydrotherapy
- 7. Therapeutic exercises
- 8. Use of TENS (Transcutaneous electrical nerve stimulation)
- 9. Techniques of transportation
- 10. Crutch walking, walkers, wheel chair.
- 11. Use of devices for activities of daily living and prevention of deformities.
- 12. Administration of drugs: IV injection, IV cannulation, and Blood transfusion.
- 13. Procedures for prevention of infections: disinfection and sterilization, surveillance, fumigation.
- 14. Special skin/ part preparations for orthopedic surgeries.
- 15. Surgical dressings Debridement.
- 16. Bladder and bowel training

### **Other Procedures**

#### **CLINICALSPECIALITY - II**

#### MEDICAL SURGICAL NURSING - GASTRO ENTEROLOGY NURSING

Placement : II Year

Hours of Instruction

Theory: 150 hrs. Practical: 950 hrs. Total: 1100hrs.

### **Course Description**

This course is designed to assist students in developing expertise and in- depth understanding in the field of gastro enterology Nursing. It will help students to develop advanced skills for nursing intervention in various gastro enterology conditions. It will enable the student to function as gastro enterology nurse practitioner/specialist and provide quality care. It will further enable the student to function as educator, manager, and researcher in the field of gastro enterology nursing

### **Objectives**

At the end of the course the students will be able to

- 1. Appreciate trends and issues related to gastro enterologynusing
- 2. Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of gastrointestinal conditions
- 3. Participate in national health programs for health promotion, prevention and rehabilitation of patients with gastrointestinal conditions
- 4. Perform physical, psychosocial & spiritual assessment
- 5. Assist in various diagnostic, therapeutic and surgical procedures
- 6. Provide comprehensive care to patients with gastrointestinal conditions
- 7. Describe the various drugs used in gastrointestinal conditions and nurses responsibility
- 8. Demonstrate skill in handling various equipments/gadgets used for patients with gastrointestinal conditions
- 9. Appreciate team work & coordinate activities related to patient care.
- 10. Practice infection control measures.
- 11. Identify emergencies and complications & take appropriate measures
- 12. Assist patients and their family to cope with emotional distress, grief, anxiety and spiritual needs
- 13. Discuss the legal and ethical issues in GE nursing

- 14. Identify the sources of stress and manage burnout syndrome among health care providers
- 15. Appreciate the role of alternative system of medicine in care of patient
- 16. Incorporate evidence based nursing practice and identify the areas of research in the field of gastrointestinal nursing
- 17. Teach and supervise nurses and allied health workers.
- 18. Design a layout of Gastro entrology intensive care unit (GEICU) , liver care/transplant unit

Unit	Hours	Content	
I	Introduction  Historical development: trends and issues in the field of gastro enterology.  Gastro enterological problems  Concepts, principles and nursingperspectives  Ethical and legal issues  Evidence based nursing and its application in gastrointestinal nursing(to be incorporated in all the units)		
II	5	Epidemiology  □ Risk factors associated with GE conditions- Hereditary, Psychosocial factors, smoking, alcoholism, dietary habits, cultural and ethnic considerations  □ Health promotion, disease prevention, life style modification and its implications to nursing  □ National health programmes related to gastro enterology  □ Alternate system of medicine/complementary therapies	
III	5	Review of anatomy and physiology of gastrointestinal system  Gastrointestinal system Liver, biliary and pancreas Gerontologic considerations Embryology of GI system Immunology specific to GI system	
IV	15	Assessment and diagnostic measures  History taking Physical assessment, psychosocial assessment Diagnostic tests Radiological studies: Upper GIT- barium swallow, lower GIT- Barrium enema, Ultra sound: Computed tomography MRI Cholangiography: Percutaneous transheptatic Cholangiogram(PTC) Magnetic Resonance Cholangio pancreotography (MRCP) Nuclear imaging scans(scintigraphy) Endoscopy	

Unit Hours	Content
Unit Hours	Content  Colonoscopy Proctosigmoidoscopy Endoscopic Retrogrde Cholongiopancreotography (ERCP) Endoscopic ultrasound Peritonoscopy(Laproscopy) Gastric emptying studies Blood chemistries: Serum amylase, serumlipase Liver biopsy Miscellaneous tests: Gastric analysis, fecal analysis Liver function tests: Bile formation and excretion, dye excretion test, Protein metabolism, haemostatic functions- prothrombin vitamin K production, serum enzyme tests, Lipid metabolism- serum cholesterol  Interpretation of diagnostic measures Nurse's role in diagnostic tests
V 25	Gastro intestinal disorders and nursing management  Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, medical, surgical and nursing management of  Disorders of the mouth:Dental caries,Peridontal disease,Acute tooth infection, Stomatitis, Thrush (moniliasis),Gingivitis, Leukoplakia, Inflammation of the parotid gland, Obstruction to the flow of saliva,Fracture of the jaw  Disorders of the oesophagus: Reflux oesophagitis, Oesophageal achalasia, Oesoophageal varices, Hiatus hernia, Diverticulum  Disorders of the stomach and duodenum: Gastritis, Peptic ulcer, Dumping of the stomach, Food poisoning, idiopathic gastroparesis, Aerophagia and belching syndrome, Ideopathic cyclic nausea and vomiting, Rumination syndrome, Functional dyspepsia, Chronic Non specific (functional) abdominal pain  Disorders of the small intestine  Malabsorption syndrome – tropical sprue  Gluten – sensitive enteropathy (Coeliacdisease)  Inflammatory diseases of intestines and abdomen,: appendicitis, Peritonities, Intestinal obstruction, Abdominal TB, Gastrointestinal polyposis syndrome  Chronic inflammatory bowel disease, Ulcerative colites, crohn's disease  Infestations and infections – Worm infestations, Typhoid, Leptospirosis  Solitary rectal ulcer syndrome  Alteration in bowel elimination (diarrhoea, constipation, fecal impaction, fecal incontinence, Irritable bowel syndrome, Chronic idiopathic constipation, Functional diarrhoea  Anorectal Conditions: Hemorrhoide, Anal fissure, Anal fistula, Abscess, Strictures, Rectal prolapse, Pruritis ani, Pelonidal disease, Anal condylomas, Warts

Unit	Hours	Content
VI	15	Disorder of liver, pancreas gall bladder and nursing management  Disorders of liver biliary tract:  Viral Hepatitis – A, B, C, D & E  Toxic hepatitis  Cirrhosis of liver, liver failure, Liver transplantation  Non cirrhotic portal fibrosis  Liver abscess.;  Parasitic and other cysts of the liver  Disorders of the Gall Bladder and Bile Duct:  Cholecystitis  Cholelitheasis  Choledocholilethiasis  Disorders of the pancreas: Pancreatitis,  Benign tumors of isletcells  Disorders of the Peritoneum  Infections of the peritoneum  Surgical peritonitis  Spontaneous bacterial peritonitis  Tuberculosis peritonitis  Disorders of the Diaphragm  Diaphragmatic hernia  Congenital hernias  Paralysis of diaphragm  Tumors of the diaphragm  Tumors of the diaphragm
VII	15	Gastro intestinal emergencies and nursing interventions  Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, medical, surgical and nursing managementof:  Esophageal varices,  Ulcer perforation,  Acute cholecystitis  Diverticulitis  Fulminant hepatic failure  Biliary obstruction  Bowel obstruction  Gastroenteritis  Intussusception  Acute intestinal obstruction, perforation  Acute pancreatitis  Cirrhosis of liver complications  Liver, spleen, stomach pancreatic, mesenteric, boweland greater vessel injuries  Acute appendicitis /peritonitis  Acute abdomen  Food poisoning
VIII	15	<ul> <li>Congenital Anomalies of Esophagus</li> <li>Esophageal atresia</li> <li>Tracheo esophageal fistula</li> </ul>

Unit	Hours	Content
		<ul> <li>Esophageal stenosis</li> <li>Esophageal duplications</li> <li>Dysphagia – Lusoria – aberrent right subclavian artery compressing esophagus</li> <li>Esophageal rings – schalzkiring</li> <li>Esophageal webs</li> </ul>
		<ul> <li>Congenital Anomalies of Stomach</li> <li>Gastric atresia</li> <li>Micro gastria</li> <li>Gastric diverticulum</li> <li>Gastric duplication</li> <li>Gastric teratoma</li> <li>Gastric volvulus</li> <li>Infantile hypertrophic pyloricstenosis</li> <li>Adult hypertrophic pyloricstenosis</li> </ul>
		<ul> <li>Congenital Anomalies of Duodenal</li> <li>Duodenal Atresia or stenosis</li> <li>Annular pancreas</li> <li>Duodenal duplication cysts</li> <li>Malrotation and mid gut volvolus</li> </ul>
		<ul> <li>Developmental anomalies of the intestine:         <ul> <li>Abdominal wall defects (omphalocele and Gastroschisis)</li> <li>Meckel's diverticulum</li> <li>Intestinal atresia</li> </ul> </li> <li>Hirschsprung's disease</li> </ul>
IX	15	Pharmo Kinetics         □ Drugs used in GIT         □ Principles of administration         □ Roles responsibilities of nurses         □ Drugs in Peptic ulcer disease         □ Proton Pump inhibitors         □ H2 ReceptorAntagonists         □ Cytoprotective Agents:         □ Drugs used in Diarrhea         □ Drugs used in constipation         □ Drugs used in Inflammatory Bowel Disease         □ Aminosalicylates         □ Corticosteroids         □ Immunomodulators         □ chemotherapy         □ Antibiotics         □ Anticholinergics         □ Anticholinergics         □ Antihelminthics         □ Vitamin Supplements

Unit	Hours	Content		
X	10	Nutrition and nutritional problems related to GI system  Nutritional assessment and nursing interventions  Therapeutic diets Adverse reactions between drugs and various foods Malnutrition- etiology, clinical manifestations and management Tube feeding, parenteral nutrition, total parenteral nutrition Obesity- etiology, clinical manifestations andmanagement Eating disorders- anorexia nervosa, bulimia nervosa Recent advances in nutrition		
XI	Malignant disorders of gastro intestinal system  Etiology, clinical manifestations, diagnosis, prognosis, related pathophysiology, medical, surgical, other modalities and nursing management of:  • Malignancy of oral cavity ,Lip,Tongue,buccal mucosa, oropharynx, Salivary gland  • Esophageal, Gastric, Carcinoma of bowel - Small bowel, Colorectal and Anal carcinoma,  • Liver, biliary tract and Pancreatic carcinoma			
XII	5	Administration and management of GE unit  Design & layout  Staffing, Equipment, supplies, Infection control; Standard safety measures Quality Assurance:-Nursing audit –records /reports, Norms, policies and protocols Practice standards		
XIII	5	Education and training in GE care  Staff orientation, training and development,  In-service educationprogram,  Clinical teaching programs		
XIII 5 Education and training in GE care  Staff orientation, training and development,  In-service educationprogram,  Clinical teaching programs				

S.No.	Deptt./Unit	No. of Week	Total Hours
1	Diagnostic labs	2	60 Hours
2	Emergency and casualty	3	90 Hours
3	Liver transplant unit	1	30 Hours
4	GE Medical Ward	6	180 Hours
5	GE Surgical Ward	8	240 Hours
6	OT	2	60 Hours
7	ICU	4	120 Hours
8	Pediatric gastroenterology	2	60 Hours
9	Oncology	2	60 Hours
10	GE OPD	2	60 Hours
	Total	32 Weeks	960 Hours

### **Procedures Assisted**

- 1. Endoscopy room Upper G.I. Endoscopy (Diagnotic and therapeutic).
- 2. Sigmoidoscopy
- 3. Colonoscopy
- 4. Polypectomy
- 5. Endoscopic retrograde cholangio pancreatiography (ERCP)
- 6. Liver biopsy
- 7. Percutaneous catheter drainage (PCD) of Pseudocystpancreas
- 8. Abdominal paracentesis
- 9. Percutaneous aspiration of liver abscess
- 10. GE Lab: PT, HbsAg, Markers A, B, C virus, CBP, ESR, Stool Test

## **Procedures Performed**

- 1. History and Physical assessment
- 2. RT intubation / extubation / aspiration/suction
- 3. Gastric lavage andgavage
- 4. Bowel wash
- 5. Therapeutic Diets
- 6. Ostomy feeding
- 7. Stoma care
- 8. Monitoring vital parameters
- 9. Plan of inservice education programme for nursing staff and Class-IV employees
- 10. Counseling

#### CLINICAL SPECIALITY - II

#### OBSTETRIC AND GYNAECOLOGICALNURSING

Placement - II Year

Hours of Instruction
Theory: 150 hrs
Practical 950 hrs
Total 1100 hrs

## **Course Description**

This course is designed to assist the student in developing expertise and in-depth understanding in the field of Obstetric and gynecological Nursing. It will help the student to develop advanced nursing skills for nursing interventions in various obstetrical and gynecological conditions. It will further enable the students to function as midwifery nurse practitioner/ specialist, educator, manager and researcher in the field of obstetric and gynecological nursing.

## **Objectives**

At the end of the course, the student will be able to:

- 1. Describe the epidemiology, etiology, pathophysiology and diagnostic assessment of women with obstetric and gynaecological conditions
- 2. Perform physical, psychosocial, cultural & spiritual assessment
- 3. Demonstrate competence in caring for women with obstetrical and gynaecological conditions
- 4. Demonstrate competence in caring for high risknewborn.
- 5. Identify and Manage obstetrical and neonatal emergencies as per protocol.
- 6. Practice infection control measures
- 7. Utilize recent technology and various diagnostic, therapeutic modalities in the management of obstetrical, gynecological and neonatal care.
- 8. Demonstrate skill in handling various equipments/gadgets used for obstetrical, gynaecological and neonatalcare
- 9. Teach and supervise nurses and allied health workers.
- 10. Design a layout of speciality units of obstetrics and gynecology
- 1. Develop standards for obstetrical and gynaecological nursing practice.
- 12. Counsel women and families
- 13. Incorporate evidence based nursing practice and identify the areas of research in the field of obstetrical and gynaecologicalnursing
- 14. Function as independent midwiferynurse practitioner

# **Contents Outline**

Unit	Hours	Content
		Management of problems of women during pregnancy  Risk approach of obstetrical nursing care, concept &goals.
		Screening of high-risk pregnancy, newer modalities of diagnosis.
		□ Nursing Management of Pregnancies at risk-due to obstetrical complication
		Pernicious Vomiting.
		Bleeding in early pregnancy, abortion, ectopic pregnancy, and gestational trophoblostic diseases.
		Hemorrhage during late pregnancy, ante partum hemorrhage, Placenta praevia, abruptio placenta.
		Hypertensive disorders in pregnancy, pre-eclampsia, eclampsia,
		Heomolysis Elevated liver enzyme LowPlatelet count (HELLP)
I	25	Iso–immune diseases. Rh and ABO incompatibility
		Hematological problems in pregnancy.
		Hydramnios-oligohydramnios
		<ul> <li>Prolonged pregnancy- post term, post maturity.</li> </ul>
		Multiple pregnancies.
		Intra uterine infection & pain during pregnancy.
		Intra Uterine Growth Retardation(IUGR), Premature Rupture
		of Membrane(PROM), intra uterine death
		Pregnancies at risk-due to pre-existing health problems
		□ Metabolic conditions.
		□ Anemia and nutritional deficiencies
		□ Hepatitis
		□ Cardio-vascular disease.
		☐ Thyroid diseases.
		□ Epilepsy.
		□ Essential hypertension
		□ Chronic renal failure.
II	15	□ Tropical diseases.
	4	Psychiatric disorders
		Infections Toxoplasmosis Rubella Cytomegalo virus Herpes (TORCH);
		Reproductive Tract Infection(RTI);STD; HIV/AIDS, Vaginal infections;
	1 3	Leprosy, Tuberculosis  Other rick feature: A go. A delegaents, elderly, unwed methors
		<ul> <li>Other risk factors: Age- Adolescents, elderly; unwed mothers, sexual abuse, substance use</li> </ul>
AY		□ Pregnancies complicating with tumors, uterineanomalies, prolapse,
# 1 1 h		ovarian cyst
A and		Ovarian cyst
		Abnormal labour, pre-term labour & obstetrical emergencies
		□ Etiology, pathopyhsiology and nursing management of
		Uncoordinated uterine actions, Atony of uterus,
III	15	precipitate labour, prolonged labour.
		Abnormal lie, presentation, positioncompound
		presentation.
	<u> </u>	Presentation.

		<ul> <li>Contracted pelvis-CPD; dystocia.</li> <li>Obstetrical emergencies Obstetrical shock, vasa praevia, inversion of uterus, amniotic fluid embolism, rupture uterus, presentation and prolapse cord.</li> <li>Augmentation of labour. Medical and surgical induction.</li> <li>Version</li> <li>Manual removal of placenta.</li> <li>Obstetrical operation: Forceps delivery, Ventouse, Caesarian section, Destructive operations</li> <li>Genital tract injuries-Third degree perineal tear, VVF,RVF</li> <li>Complications of third stage of labour:</li> <li>Post partum Hemorrhage.</li> <li>Retained placenta.</li> </ul>
IV	10	<ul> <li>post partum complications</li> <li>Nursing managementof</li> <li>Puerperal infections, puerperal sepsis, urinary complications, puerperal venous thrombosis and pulmonary embolism</li> <li>Sub involution of uterus, Breast conditions, Thrombophlebitis</li> <li>Psychological complications, post partumblues, depression, psychosis</li> </ul>
V	25	High Risk Newborn Concept, goals, assessment, principles. Nursing managementof Pre-term, small for gestational age, post-mature infant, and baby of diabetic and substance use mothers. Respiratory conditions, Asphyxia neonatorum, neonatal apnoea meconium aspiration syndrome, pneumo thorax, pneumo mediastinum Icterus neonatorum. Birth injuries. Hypoxic ischaemic encephelopathy Congenital anomalies. Neonatal seizures. Neonatal seizures. Neonatal heart diseases. Neonatal hemolytic diseases Neonatal infections, neonatal sepsis, opthalmia neonatorum, cogenital syphilis, HIV/AIDS Advanced neonatal procedures. Calculation of fluid requirements. Hematological conditions – erythroblastosis fetalis, hemorrhagic disorder in the newborn Organization of neonatal care, services(Levels), transport, neonatal intensive care unit, organization and management of nursing services in NICU

	1	HIN/AIDC
VI	15	HIV/AIDS  HIV positive mother and her baby  Epidemiology  Screening  Parent to child transmission(PTCT)  Prophylaxis for mother and baby  Standard safety measures  Counseling  Breast feeding issues  National policies and guidelines  Issues: Legal,ethical, Psychosocial and rehabilitation  Role of nurse
VII	25	Gynecological problems and nursing management Gynecological assessment Gynecological procedures Etiology, pathophysiology, diagnosis andnursing management of  • Menstrual irregularities • Diseases of genital tract • Genital tract infections • Uterine displacement • Genital prolapse • Genital injuries • Uterine malformation • Uterine fibroid, ovarian tumors, Breast carcinoma, Pelvic inflammatory diseases, reproductive tract malignancies, hysterectomy – vaginal and abdominal. • Sexual abuse, rape, trauma, assault
VIII	5	Administration and management of obstetrical and gynaecological unit  Design & layout Staffing, Equipment, supplies, Infection control; Standard safety measures Quality Assurance:-Obstetric auditing -records/reports, Norms, policies and protocols Practice standards for obstetrical and gynaecological unit
IX	5	Education and training in obstetrical and gynaecological care  Staff orientation, training and development,  In-service educationprogram,  Clinical teaching programs.

Total = 960 Hours 1 Week = 30 Hours

S.No.	Deptt./ Unit	No. of Week	Total Hours
1	Antenatal OPD including Infertility clinics/Reproductive medicine, Family welfare and post partum clinic / PTCT	6	180 Hours
2	Antenatal and Postnatal ward	6	180 Hours
3	Labour room	4	120 Hours
4	Neonatal Intensive Care Unit	3	90 Hours
5	Obstetric/Gynae Operation Theatre	3	90 Hours
6	Gynae Ward	4	120 Hours
7	CHC, PHC, SC	6	180 Hours
	Total	32 Weeks	960 Hours

## **Essential Obstetrical And Gynecological Skills**

## **Procedure Observed**

- Assisted Reproductive Technology procedures
- Ultra sonography
- Specific laboratory tests.
- Amniocentesis.
- Cervical & vaginal cytology.
- Fetoscopy.
- Hysteroscopy.
- MRI.
- Surgical diathermy.
- Cryosurgery.

## **Procedures Assisted**

- Operative delivery
- Abnormal deliveries-Forceps application, Ventouse, Breech
- Exchange blood transfusion
- Culdoscopy.
- Cystoscopy
- Tuboscopy
- Laparoscopy.
- Endometrial Biopsy
- Tubal patent test
- Chemotherapy
- Radiation therapy
- Medical Termination of Pregnancy.
- Dilatation and Curettage

#### **Procedures Performed**

- History taking.
- Physical Examination-General
- Antenatal assessment. 20
- Pelvic examination
- Assessment of risk status.
- Assessment of Intra uterine foetal well-being.kick chart and foetal movement chart,
   Doppler assessment, Non Stress Test, Contraction stress test(Oxytocin challenge test)
- Universal precautions- Disposal of biomedical waste.
- Per Vaginal examination and interpretation (early pregnancy, labour, post partum).
- Utilization of Partograph
- Medical & Surgical induction(Artificial rupture of membranes).
- Vacuum extraction
- Conduct of delivery.
- Prescription and administration of fluids and electrolytes through intravenous route.
- Application of outlet forceps, delivery of breach Burns Marshall, Loveset manoeuvere
- Repair of tears and Episiotomy suturing.
- Vacuum extraction
- Controlled cord traction, Manual removal of placenta, placental examination,
- Manual vacuum aspiration
- Postnatal assessment.- 20
- Management of breastengorgement
- Thrombophlebitis (white leg)
- Postnatal counseling.
- Reposition of inversion of uterus.
- Laboratory tests: Blood- Hb, Sugar, Urine-albumin, sugar
- Breast care, breast exam, and drainage breast abscess.
- Postnatal exercise.
- Assessment –New born assessment; physical and neurological, Apgar score, high-risk newborn, Monitoring neonates; Clinically and With monitors, Capillary refill time, Assessment of jaundice, danger signs
- Anthropometric measurement
- Neonatal resuscitation
- Gastric Lavage
- Care of newborn in multi channel monitor andventilator.
- Care of newborn in radiant warmer and incubator.
- Kangaroo mother care.
- Assisting mother with exclusive Breast-feeding
- Feeding technique: Katori, spoon, naso/orogastric, Total Parenteral nutrition
- Assessement, calculation and administration of fluids and medications:
  - Oral
  - I.D.
  - I.M.
  - I.V.- Securing IV line, infusion pump

- Administration of drug per rectum
- Capillary blood sample collection.
- Oxygen therapy.
- Phototherapy.
- Chest physiotherapy.
- counseling Parental, bereavment, family planning, infertility etc
- Setting of operation theatre.
- Trolley and table set up for Obstetrical & gynaecoligical operations.
- Pap smear.
- Vaginal smear.
- Insertion of pessaries,
- Insertion of IUD and removal.
- Teaching skills
- communication skills
- Prepare referral slips
- Pre transport stabilization
- Networking with other stake holders

#### CLINICAL SPECIALTY -II

## PEDIATRIC (CHILD HEALTH) NURSING

Placement: II Year

Hours of Instruction Theory 150 hours Practical 950 hours Total: 1100hours

## **Course Description**

This course is designed to assist students in developing expertise and in- depth understanding in the field of Pediatric Nursing. It will help students to develop advanced skills for nursing intervention in various pediatric medical and surgical conditions. It will enable the student to function as pediatric nurse practitioner/specialist. It will further enable the student to function as educator, manager, and researcher in the field of Paediatric nursing

## **Objectives**

At the end of the course the students will be able to:

- 1. Apply the nursing process in the care of ill infants to pre adolescents in hospital and community
- 2. Demonstrate advanced skills/competence in nursing management of children with medical and surgical problems
- 3. Recognize and manage emergencies in children
- 4. Provide nursing care to critically ill children
- 5. Utilize the recent technology and various treatment modalities in the management of high riskchildren
- 6. Prepare a design for layout and describe standards for management of pediatric units/hospitals
- 7. Identify areas of research in the field of pediatricnursing

# **Course Content**

Unit	Hours	Content	
I	5	Introduction  □ Current principles, practices and trends in Pediatric Nursing □ Role of pediatric nurse in various settings -Expanded and extended	
II	35	Pathophysiology, assessment (including interpretation of various invasive and non-invasive diagnostic procedures), treatment modalities and nursing intervention in selected pediatric medical disorders  • Child with respiratory disorders:  • Upper respiratory tract: choanal atresia, tonsillitis, epistaxis, aspiration.  • Lower respiratory tract: Broncheolitis, Bronchopneumonia, Asthma, cystic fibrosis  • Child with gastro-intestinal disorders:  • Diarrheal diseases, gastro-esophageal reflux.  • Hepatic disorders: Hepatitis, Indian childhood cirrhosis, liver transplantation.  • Malabsorption syndrome, Malnutrition  • Child with renal/ urinary tract disorders: Nephrotic syndrome, Nephritis, Hydronephrosis, hemolytic-uremic syndrome, kidney transplantation  • Child with cardio-vascular disorders:  • Acquired: Rheumatic fever, Rheumatic heart disease,  • Congenital: Cynotic andacynotic  • Child with endocrine/metabolic disorders: Diabetes insipidus, Diabetes Mellitus—IDDM, NIDDM, hyper and hypo thyroidism, phenylketonuria, galactosemia  • Child with Neurological disorders: Convulsions, Meningitis, encephalitis, guillian- Barre syndrome  • Child with Neurological disorders: Leukemias, Lymphomas, Wilms' tumor, nephroblastomas, neuroblastomas, Rhabdomyosarcoma, retinoblastoma, hepatoblastoma, bone tumors  • Child with blood disorders: Anemias, thalassemias, hemophilia, polycythemia, thrombocytopenia, and disseminated intravascular coagulation  • Child with skin disorders  • Common Eye and ENT disorders	
III	35	<ul> <li>Assessment(including interpretation of various invasiveand non-invasive diagnostic procedures), treatment modalities including cosmetic surgery and nursing interventions in selected pediatric surgical problems/ Disorders</li> <li>Gastrointestinal system: Cleft lip, cleft palate and conditions requiring plastic surgery, Tracheo esophageal fistula/atresia, Hirschsprungs' disease/megacolon, malrotation, intestinal obstruction, duodenal atresia,</li> </ul>	

		gastrochisis, exomphalus, anorectal malformation,
		<ul> <li>omphalocele, diaphragmatic hernia</li> <li>Anomalies of the nervous system: Spina bifida,</li> </ul>
		Meningocele, Myelomeningocele, hydrocephalus
		Anomalies of the genito-urinary system: Hypospadias,
		Epispadias, Undescended testes, Exstrophy bladder
		Anomalies of the skeletal system
		Eye and ENT disorders
		Nursing management of the child with traumaticinjuries: General
		principlesof managing Pediatric trauma
		- Head injury, abdominal injury, poisoning, foreign body
		obstruction, burns
		- & Bites
		Child with oncological disorders: Solid tumors of childhood,
		Nephroblastoma, Neuro blastoma, Hodgkin's/Non Hodgkin's
		Lymphoma, Hepatoblastoma, Rhabdomyosarcoma  Management of stomas, authorous and tubes
		<ul> <li>Management of stomas, catheters and tubes</li> <li>Management of wounds anddrainages</li> </ul>
		• Management of wounds anddramages
		Intensive care for pediatric clients
		Resuscitation, stabilization & monitoring ofpediatric patients
		□ Anatomical & physiological basis of critical illness ininfancy and
		childhood
		□ Care of child requiring long-termventilation
IV	10	Nutritional needs of critically ill child
		□ Legal and ethical issues in pediatric intensivecare
		☐ Intensive care procedures, equipment and techniques☐ Documentation
		Documentation
		High Risk Newborn
		□ Concept, goals, assessment, principles.
		□ Nursing management of
		Post-mature infant, and baby of diabetic and substance use mothers.
		Respiratory conditions, Asphyxia neonatorum, neonatal apnoea meconium aspiration syndrome, pneumo thorax, pneumo
	4	mediastinum
		Icterus neonatorum.
		Birth injuries.
		Hypoxic ischaemic encephelopathy
v	20	Congenital anomalies.
	20	Neonatal seizures.
	<b>₽</b>	Neonatal hypocalcaemia, hypoglycemia,
		hypomagnesaemia.
		Neonatal heart diseases.
		Neonatal hemolytic diseases
		Neonatal infections, neonatal sepsis, opthalmia
		neonatorum, cogenital syphilis, HIV/AIDS
		Advanced neonatal procedures.  Calculation of fluid magniferents.
		Calculation of fluid requirements.

	ı			
		<ul> <li>Hematological conditions – erythroblastosis fetalis, hemorrhagic disorder in thenewborn</li> <li>Organization of neonatal care, services(Levels), transport, neonatal intensive care unit, organization and management of nursing services in NICU</li> </ul>		
VI	VI  Developmental disturbances and implications for nursing  Adjustment reaction to school,  Learning disabilities  Habit disorders, speech disorders,  Conduct disorders,  Early infantile autism, Attention deficit hyperactive disorders (ADHD), depression and childhood schizophrenia.			
VII	Challenged child and implications for nursing  Physically challenged, causes, features, early detection& management  Cerebral palsied child,  Mentally challengedchild.  Training & rehabilitation of challengedchildren			
VIII	5	Crisis and nursing intervention  The hospitalized child,  Terminal illness & death during childhood  Nursing intervention-counseling		
IX	5	Drugs used in Pediatrics  Criteria for dose calculation  Administration of drugs, oxygen and blood  Drug interactions  Adverse effects and their management		
X	10	Administration and management of pediatric care unit  Design & layout  Staffing, Equipment, supplies, Norms, policies and protocols Practice standards for pediatric care unit Documentation		
XI	5	Education and training in Pediatric care  Staff orientation, training and development,  In-service educationprogram,  Clinical teaching programs.		

Total = 960 Hours 1 Week = 30 Hours

### • Field visits:

S. No.	Deptt./ Unit	No. of Week	Total Hours
1	Pediatric medicine ICU	4	120 Hours
2	Pediatric surgical ICU	4	120 Hours
3	NICU	4	120 Hours
4	Pediatric OT	2	60 Hours
5	Pediatric medicine ward	6	180 Hours
6	Pediatric surgery ward	6	180 Hours
7	Emergency/Casualty	4	120 Hours
8	Field visits*	2	60 Hours
	Total	32	960 Hours

<sup>\*</sup>Child care center, Anganwadi, play school, Special schools for challenged children, Juvenile court, UNICEF, Orphanage, Creche, SOS village

### **Essential**

## I. Procedures Observed:

- Echo cardiogram
- Ultrasound head
- ROP screening (Retinopathy of prematurity)
- Any other

## II. Procedures Assisted

- Advanced neonatal life support
- Lumbar Puncture
- Arterial Blood Gas
- ECG Recording
- Umbilical catheterization arterial and venous
- Arterial B P monitoring
- Blood transfusion- exchange transfusion full and partial
- IV cannulation & therapy
- Arterial catheterization
- Chest tube insertion
- Endotracheal intubation
- Ventilation
- Insertion of long line
- Assist in surgery

#### **III.** Procedures Performed:

- Airway Management
- Application of Oro Pharyngeal Airway
- Oxygen therapy
- CPAP(Continuous Positive Airway Pressure)
- Care of Tracheostomy
- Endotracheal Intubation
- Neonatal Resuscitation
- Monitoring of Neonates clinically & with monitors, CRT(Capillary Refill Time), assessment of jaundice, ECG
- Gastric Lavage
- Setting of Ventilators
- Phototherapy
- Assessment of Neonates: Identification & assessment of risk factors, APGAR Score, gestation age, Anthropometric assessment, Weighing the baby, Newborn examination, detection of life threatening congenital abnormalities,
- Admission & discharge of neonates
- Feeding management of breast feeding, artificial feeding, expression of breast milk, OG(Orogastric) tube insertion, gavage feeding, TPN, Breast feeding counseling
- Thermoregulation- Axillary temperature, Kangaroo Mother Care (KMC), Use of Radiant warmer, incubators, management of thermoregulation & control
- Administration of Drugs: I/M, IV injection, IV Cannulation & fixation infusion pump, Calculation of dosages, Neonatal formulation of drugs, use of tuberculin/insulin syringes, Monitoring fluid therapy, Blood administration.
- Procedures for prevention of infections: Hand washing, disinfections & sterilization, surveillance, fumigation
- Collection of specimens
- Setting, Use & maintenance of basic equipment: Ventilator, O2 analyzer, monitoring equipment, Photo therapy unit, Flux meter, Infusion pump, Radiant warmer, incubator, Centrifuge machine, Bilimeter, Refractometer, laminar flow

### **IV.** Other Procedures:

#### **CLINICAL SPECIALITY - II**

## PSYCHIATRIC (MENTAL HEALTH) NURSING

Placement: II Year

Hours of Instruction Theory 150 hrs Practical 950 hrs Total: 1100Hours

### **Course Description**

This course is designed to assist students in developing expertise and in- depth understanding in the field of Psychiatric Nursing. It will help students to develop advanced skills for nursing intervention in various psychiatric conditions. It will enable the student to function as psychiatric nurse practitioner/specialist. It will further enable the student to function as educator, manager, and researcher in the field of Psychiatric nursing

## **Objectives**

At the end of the course the students will be able to:

- 1. Apply the nursing process in the care of patients with mental disorders in hospital and community
- 2. Demonstrate advanced skills/competence in nursing management of patients with mental disorders
- 3. Identify and care for special groups like children, adolescents, women, elderly, abused and neglected, people living with HIV/AIDS.
- 4. Identify and manage psychiatric emergencies.
- 5. Provide nursing care to critically ill patients with mental disorders
- 6. Utilize the recent technology and various treatment modalities in the management of patients with mentaldisorders
- 7. Demonstrate skills in carrying out crisis intervention.
- 8. Appreciate the legal and ethical issues pertaining topsychiatric nursing.
- 9. Identify areas of research in the field of psychiatric nursing.
- 10. Prepare a design for layout and describe standards for management of Psychiatric units/emergency units/hospitals
- 11. Teach psychiatric nursing to undergraduate students & in-service nurses.

# **Course Content**

Unit	Hours	Content	
		Principles and practice of Psychiatric nursing	
I	2	□ Review	
II	10	<ul> <li>Crisis Intervention</li> <li>Crisis, Definition</li> <li>Phases In The Development of A Crisis</li> <li>Types of Crisis; Dispositional, Anticipated Life Transitions Traumatic Stress, Maturational/ Development, Reflecting Psychopathology</li> <li>Psychiatric Emergencies and theirmanagement</li> <li>Grief and grief reaction</li> <li>Crisis Intervention; Phases</li> <li>Post traumatic stress disorder (PTSD)</li> <li>Role of the Nurse</li> </ul>	
III	4	Anger/ Aggression Management  Anger and Aggression, Types, PredisposingFactors  Management Role of The Nurse	
IV	5	<ul> <li>The Suicidal Client</li> <li>Epidemiological Factors</li> <li>Risk Factors</li> <li>Predisposing Factors: Theories of Suicide-Psychological, Sociological ,Biological</li> <li>Nursing Management</li> </ul>	
V	5	Disorders of Infancy, Childhood, and Adolescence  Mentally Challenged Autistic Disorders Attention-Deficit/Hyperactivity Disorder Conduct Disorders, behavioural disorders Oppositional Defiant Disorder Tourette's Disorders Separation Anxiety Disorder Psychopharmacological Intervention and Nursing Management	
VI.	5	Delirium, Dementia, and Amnestic Disorders  Delirium Dementia Amnesia Psychopharmacological Intervention and Nursing Management	
VII	10	Substance-Related Disorders  Substance-Use Disorders Substance-Induced Disorders Classes Of Psychoactive Substances Predisposing Factors	

Unit	Hours	Content	
		<ul> <li>The Dynamics Of Substance-Related Disorders</li> <li>The Impaired Nurse</li> <li>Codependency</li> <li>Treatment Modalities For Substance-Related Disorders and Nursing Management</li> </ul>	
VIII	10	Schizophrenia and Other Psychotic Disorders (CheckICD10)  Nature of the Disorder  Predisposing Factors  Schizophrenia - Types  Disorganized Schizophrenia  Catatonic Schizophrenia  Paranoid Schizophrenia  Undifferentiated Schizophrenia  Residual Schizophrenia  Other Psychotic disorders  Schizoaffective Disorder  Brief Psychotic Disorder  Schizophrenicform Disorder  Psychotic Disorder Due to a General MedicalCondition  Substance-Induced Psychotic Disorder  Treatment and Nursing Management	
IX	8	Mood Disorders  Historical Perspective Epidemiology The Grief Response Maladaptive Responses To Loss Types Of Mood Disorders Depressive disorders Bipolar disorders Treatment and Nursing Management	
X	8	Anxiety Disorders  Historical Aspects Epidemiological Statistics How Much is too Much? Types Panic Disorder Generalized AnxietyDisorder Phobias Obsessive-Compulsive Disorder Posttraumatic Stress Disorder Anxiety Disorder Due to a GeneralMedical Condition Substance-Induced Anxiety Disorder Treatment Modalities Psychopharmacology & Nursing Management	
XI	5	Somatoform And Sleep Disorders  Somatoform Disorders Historical Aspects	

Unit	Hours	Content		
		Epidemiological Statistics		
		Pain Disorder		
		Hypochondriasis		
		Conversion Disorder		
		Body Dysmorphic Disorder		
		□ Sleep Disorder		
		□ Treatment Modalities and Nursing Management		
		Dissociative Disorders and Management		
		Historical Aspects		
XII	4	Epidemiological Statistics		
		Application of the Nursing Management  Treatment Medalities and Nursing Management		
		□ Treatment Modalities and Nursing Management		
		Sexual And Gender Identity Disorders		
		□ Development Of Human Sexuality		
		□ Sexual Disorders		
XIII	4	□ Variation In Sexual Orientation		
		□ Nursing Management		
		Eating Disorders		
		□ Epidemiological Factors		
		□ Predisposing Factors : Anorexia Nervosa And Bulimia Nervosa obesity		
XIV	4	□ Psychopharmacology		
		□ Treatment & Nursing Management		
		Adjustment and Impulse Control Disorders		
		Historical and Epidemiological Factors		
XV	4	Adjustment Disorders     Impulse Central Disorders		
		<ul> <li>Impulse Control Disorders</li> <li>Treatment &amp; Nursing Management</li> </ul>		
		Treatment & Nursing Management		
		Medical Conditions due to Psychological Factors		
		□ Asthma		
		□ Cancer		
		□ Coronary Heart Disease		
	4	□ Peptic Ulcer		
XVI	4	Essential Hypertension		
		Migraine Headache		
	BV	Rheumatoid Arthritis		
	N.	□ Ulcerative Colitis		
	A B	□ Treatment & Nursing Management		
		Personality Disorders		
		☐ Historical perspectives		
		☐ Types Of Personality Disorders		
XVII	8	Paranoid Personality Disorder		
A V II	U	Schizoid Personality Disorder		
		Antisocial Personality Disorder		
		Borderline Personality Disorder		
<u> </u>		Dorderine I elbonanty Disorder		

Unit	Hours	Content				
	<ul><li>Histrionic Personality Disorder</li><li>Narcissitic Personality Disorder</li></ul>					
		Avoidance Personality Disorder				
		Dependent PersonalityDisorder				
		Obsessive-Compulsive Personality Disorder				
		Passive-Aggressive Personality Disorders				
		□ Identification, diagnostic, symptoms				
		<ul><li>Psychopharmacology</li><li>Treatment &amp; Nursing Management</li></ul>				
		☐ Treatment & Nursing Management				
		The Aging Individual				
		Epidemiological Statistics  Dialogical Theories				
		<ul><li>□ Biological Theories</li><li>□ Biological Aspects of Aging</li></ul>				
		□ Biological Aspects of Aging □ Psychological Aspects of Aging				
******	0	□ Memory Functioning				
XVIII	8	□ Socio-cultural aspects of aging				
		□ Sexual aspects of aging				
		<ul> <li>Special Concerns of the ElderlyPopulation</li> <li>Psychiatric problems among elderlypopulation</li> </ul>				
		□ Psychiatric problems among elderlypopulation □ Treatment & Nursing Management				
		Treatment of Transagement				
		The person living with HIV Disease				
		□ Psychological problems of individual HIV/AIDS				
XIX	5	Counseling Treatment & Name of Management				
		□ Treatment & Nursing Management				
		Problems Related to Abuse or Neglect				
		Ullnerable groups, Women, Children, elderly, psychiatric patients,				
XX	5	under privileged,challenged  Predisposing Factors				
		□ Treatment & Nursing management-Counseling				
		Community Mental Health Nursing  National Mental Health Program- Community mental health program				
		□ National Mental Health Program- Community mental health program □ The Changing Focus of care				
		□ The Public Health Model				
	4	□ The Role of the Nurse				
	4	Case Management				
XXI	7	The community as Client				
4	DA	<ul><li>Primary Prevention</li><li>Populations at Risk</li></ul>				
		Secondary prevention				
		Tertiary Prevention				
***	□ Community based rehabilitation					
		Ethical and Legal Issues in Psychiatric/Mental Health				
VVII	Nursing 5					
XXII	5	Ethical Considerations				
		□ Legal Consideration				

Unit	Hours	Content	
		<ul> <li>Nurse Practice Acts</li> <li>Types of Law</li> <li>Classification within Statutory and Common Law</li> <li>Legal Issues in Psychiatric/Mental HealthNursing</li> <li>Nursing Liability</li> </ul>	
XXIII	5	Psychosocial rehabilitation  Principles of rehabilitation  Disability assessment  Day care centers  Half way homes  Reintegration into thecommunity  Training and support to care givers  Sheltered workshops  Correctional homes	
XXIV	5	Counseling  Liaison psychiatric nursing  Terminal illnesses-Counseling  Post partum psychosis-treatment, care and counseling  Death dying- Counseling  Treatment, care and counseling –  • Unwed mothers  • HIV and AIDS	
XXV	5	Administration and management of psychiatric units including emergency units  Design & layout Staffing, Equipment, supplies, Norms, policies and protocols Quality assurance Practice standards for psychiatric nursing Documentation	
XXVI	5	Education and training in psychiatric care  Staff orientation, training and development, In-service educationprogram, Clinical teaching programs.	

### **Practicals**

**Total = 960 Hours 1** Week = 30 Hours

S.No.	Area of Posting	No. of Week	Total Hours
1	Acute Psychiatric Ward	4	120 Hours
2	Chronic Psychiatric Ward	4	120 Hours
3	De-addiction Unit	4	120 Hours
4	Psychiatric Emergency Unit	4	120 Hours
5	O.P.D (Neuro and psychiatric)	3	90 Hours
6	Child Psychiatric Unit and child	2	60 Hours
U	guidance clinic	2	00 Hours
7	Post natal ward	1	30 Hours
8	Family Psychiatric Unit	2	60 Hours
9	Field visits	2	60 Hours
10	Rehabilitation	2	60 Hours
11	Community Mental Health Unit	4	120 Hours
	Total	32 Weeks	960 Hours

## **Essential Psychiatric nursing skills**

### **Procedures Observed**

- 1. Psychometric tests
- 2. Personality tests
- 3. Family therapy
- 4. Assisted
- 5. CT
- 6. MRI
- 7. Behavioral therapy.

## **Procedures Performed**

- Mental status examination 1.
- 2. Participating in various therapies – Physical; ECT,
- 3. Administration of Oral, IM, IV psychotropic drugs
- 4. Interviewing skills
- 5. Counseling skills
- 6. Communication skills
- 6. 7. Psychoeducation
- Interpersonal relationshipskills
- 9. Community Survey for identifyingmental health problems
- 10. Rehabilitation therapy
- Health education and life skills training. 11.
- 12. Supportive psychotherapic skills
- Group therapy 13.
- 14. Milieu therapy
- Social/Recreational therapy. 15.
- 16. Occupational therapy.

#### CLINICAL SPECIALITY - II COMMUNITY

#### **HEALTH NURSING**

Placement: II Year

Hours of Instruction Theory- 150 hours Practicals- 950 hours Total- 1100 hrs

### **Course Description**

This course is designed to assist students in developing expertise and in-depth understanding in the field of community health nursing. It will help students to develop advanced skills for nursing intervention in various aspects of community health care settings. It will enable the student to function as community health Nurse practitioner/specialist. It will further enable the student to function as educator, manager and researcher in the field of community health nursing.

## **Objectives**

At the end of the course the students will be able to:

- 1. Appreciate trends and issues related to community health Nursing- reproductive and child health, school health, Occupational health, international health, rehabilitation, geriatric and mental health.
- 2. Apply epidemiological concepts and principles in community health nursing practice
- 3. Perform community health assessment and plan healthprogrammes
- 4. Describe the various components of Reproductive and child health programme.
- 5. Demonstrate leadership abilities in organizing community health nursing services by using inter-sectoral approach.
- 6. Describe the role and responsibilities of community health nurse in various national health and family welfare programmes
- 7. Participate in the implementation of various national health and family welfare programme
- 8. Demonstrate competencies in providing family centered nursing care independently
- 9. Participate/Conduct research for new insights and innovative solutions to health problems
- 10. Teach and supervise nurses and allied health workers.
- 11. Design a layout of sub center/Primary health center/Community health cenre and develop standards for community health nursing practice.

Unit	Hours	Content		
I	20	Epidemiology Introduction Concept, scope, definition, trends, History and development of modern Epidemiology Contribution of epidemiology Implications Epidemiological methods Measurement of health anddisease: Health policies Epidemiological approaches Study of disease causatives Health promotion Levels of prevention Epidemiology of Communicable diseases Non-communicable diseases Bemerging and re-emerging diseases Epidemics National Integrated disease Surveillance Programme Health information system Epidemiology study and reports Role of Community healthnurse		
Unit II	40	National Health and Family Welfare Programmes  Objectives, Organisation/manpower/resources, Activities, Goals, inter-sectoral approach, implementation, item/purpose, role and responsibilities of community health nurse:  National Vector Borne Disease Control Programm (NVBDCP)  NationalFilaria Control Programme  National Leprosy Eradication Programme  Revised national TB Control Programme  National Programme for Control of Blindness  National Iodine Deficiency disorders Control Progeramme  National Mental Health Programme  National AIDS Control Programme  National Cancer Control Programme  RCH I and II  Non- communicable disease programmes  NRHM  Health Schemes:  ESI  CGHS  Health Insurance		

Unit	Hours	Content		
Ш	15	School Health Introduction: definition, concepts, objectives,. Health assessment, Screening, identification, referral and follow up, Safe environment Services, programmes and plans- first aid, treatment of minor ailments Inter-sectoral coordination Adolescent health Disaster, disaster preparedness, and management Guidance and counseling School health records - maintenance and its importance Roles and responsibilitiesof community health nurse		
IV	15	International health  Global burden of disease Global health rules to halt disease spread Global health priorities and programes International quarantine Health tourism International cooperation and assistance International travel and trade Health and food legislation, laws, adulteration of food Disaster management Migration International health agencies —World Health organizations, World health assembly, UNICEF, UNFPA, SIDA, US AID, DANIDA, DFID. AusAID etc International health issues and problems International nursing practice standards International health vis-a vis nationalhealth International health days and their significance		
	15	Education and administration  Quality assurance Standards, Protocols, Policies, Procedures Infection control; Standard safety measures Nursing audit Design of Sub-Centre/Primary Health Centre/Community health center Staffing; Supervision and monitoring-Performance appraisal Budgeting Material management Role and responsibilities of different categories of personnel in community health Referral chain- community outreachservices Transportation Public relations Planning in-service educational programme and teaching		

Unit	Hours	Content		
		☐ Training of various categories of health workers- preparation of manuals		
VI	10	Geriatric  Concept, trends, problems and issues Aging process, and changes Theories of ageing Health problems and needs Psycho-physiological stressors and disorders Myths and facts of aging Health assessment Home for aged-various agencies Rehabilitation of elderly Care of elderly Elderly abuse Training and supervision of care givers Government welfare measures Programmes for elderly-Role of NGOs Roles and responsibilities of Geriatric nurse in the community		
		79		
VII	10	Rehabilitation  Introduction: Concepts, principles, trends, issues, Rehabilitation team  Models, Methods Community based rehabilitation Ethical issues Rehabilitation Council of India Disability and rehabilitation- Use of various prosthetic devices Psychosocial rehabilitation Rehabilitation of chronic diseases Restorative rehabilitation Vocational rehabilitation Role of voluntary organizations Guidance and counseling Welfare measures Role and responsibilities of community healthnurse		
NA		Community mental health  Magnitude, trends andissues  National Mental Health Program- Community mental health program  The Changing Focus of care		
Unit VIII	10	<ul> <li>□ The Public Health Model</li> <li>□ Case Management- Collaborative care</li> <li>□ Crisis intervention</li> <li>□ Welfare agencies</li> <li>□ Population at Risk</li> <li>□ The community as Client</li> </ul>		
		Primary Prevention		

Unit	Hours	Content	
		<ul> <li>Secondary prevention</li> <li>Tertiary Prevention</li> <li>Community based rehabilitation</li> <li>Human rights of mentally ill</li> <li>Substance use</li> <li>Mentally challengedgroups</li> <li>Role of community health nurse</li> </ul>	
IX	15	Occupational health Introduction: Trends, issues, Definition, Aims, Objectives, Workplace safety Ergonomics and Ergonomic solutions Occupational environment- Physical, social, Decision making, Critical thinking Occupational hazards for different categories ofpeople- physical, chemical, biological, mechanical, ,Accidents, Occupational diseases and disorders Measures for Health promotion of workers; Prevention and control of occupational diseases, disability limitations and rehabilitation Women and occupational health Occupational education and counseling Violence at workplace Child labour Disaster preparedness and management Legal issues: Legislation, Labour unions, ILO andWHO recommendations, Factories act, ESI act Role of Community health nurse, Occupationalhealth team	
MA	Role of Community health nurse, Occupationalhealth team		

S.No.	Deptt./Unit	No. of Week	Total Hours
1	Urban and Rural community	17	510 Hours
2	School Health	3	90 Hours
3	International health	2	60 Hours
4	Administration(SC/PHC/CHC)	2	60 Hours
5	Occupational health	2	60 Hours
6	Community Mental Health	2	60 Hours
7	Home for aged and Hospice	2	60 Hours
8	Rehabilitation	2	60 Hours
	Total	32 Weeks	960 Hours

## Categorisation of practical activities

## Observed

- MCH office and DPHNO
- CHC/ First Referral Unit(FRU)
- Child guidance clinic
- Institute/Unit for mentally challenged
- District TB centre
- AIDS control society
- Filariasis clinic
- RCH clinic
- STD clinic
- Leprosy clinic
- Community based rehabilitation unit
- Cancer centers
- Palliative care
- Home of old age
- Mental health units
- De-addication centres
- School health services
- Industry
- Selected industrial healthcenters
- ESI unit
- Municipality/ corporation office

## **Assisted**

- Laparoscopic sterilization
- Vasectomy
- All clinics related to RCH
- Monitoring of national health and family welfare programmes

## Performed

- Conduct various clinics
- School health assessment.
- Health survey.
- Health assessment
- Drug administration as per the protocols
- Treatment of minor ailments
- Investigating outbreak of epidemic.
- Screening for leprosy, TB and non-communicabledisease
- Presumptive and radical treatment for Malaria.
- Counselling
- Report writing
- Referrals
- Writing a project proposal
- Material management-requisition for indent, condemnation, inventory maintenance,
- Training and Supervision of various categories of personnel
- Liaison with NGO's

# STAFFING PATTERN RELAXED TILL 2012

# Qualifications & Experience Of Teachers Of College Of Nursing

S. No.	Post, Qualification & Experience
1	1 Professor-cum-Principal - Masters Degree inNursing 10 years of experience and minimum of 5 years of teaching
	experience <u>Desirable</u> : Independent published work of high standard/doctorate degree / M.Phil.
2	1 Professor-cum-Vice Principal
	- Masters Degree in Nursing 10 years of experience and minimum of 5 years of teaching experience
	<u>Desirable</u> : Independent published work of high standard/doctorate degree / M.Phil.
3	1 Reader / Associate Professor - Master Degree in Nursing. 7 years of experience and minimum of 3 years teaching experience
	<u>Desirable</u> : Independent published work of high standard /doctorate degree / M.Phil.
4	1 Assistant Professor /Lecturer
	- Master Degree in Nursing.
	3 years experience

<sup>\*\*</sup> Pay scales- as per UGC scales