

STUDY & EVALUATION SCHEME OF BACHELOR OF SCIENCES IN NURSING (B.Sc. NURSING)

(B.Sc. NURSING - I YEAR/ II SEMESTER)

[Applicable w.e.f. Academic Session 2020-21 till revised]



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STUDY & EVALUATION SCHEME

BACHELOR OF SCIENCES IN NURSING (B.Sc. NURSING) (W.e.f. July 2020)

I – Year

II - Semester

S.N o.	Course Categor y	Code No.	Name of the Subject	Periods			Credits	Evaluation Scheme				Subject Total
				L	T	P		Sessional		Exam		
								CT	TA	Total	ESE	
1.	DC	NR109	Applied Biochemistry	2	1	0	3	40	20	60	40	100
2.	DC	NR110	Applied Nutrition and Dietetics	3	1	0	4	40	20	60	40	100
3.	DC	NR111	Nursing Foundations-II	5	1	0	6	40	20	60	40	100
4.	DC	NR112	Introduction to Community Health Nursing	2	1	0	3	40	20	60	40	100
5.	DC	NR113	Nursing Foundation-II Lab	0	0	6	3	30	30	60	40	100
6.	DC	NR114	Community Posting	0	0	4	2	50	50	100	00	100
7.	DC	NR115	Clinical Posting	0	0	10	4	50	50	100	00	100
Total				12	04	20	25	290	210	500	200	700

L: Lecture	T: Tutorials	P: Practical	C: Credit	CT: Class Test
TA: Teacher Assessment			ESE: End Semester Examination	
Sessional Total: Class Test + Teacher Assessment			Subject Total: Sessional Total + End Semester Examination (ESE)	
DC- Departmental Core				
DE- Departmental Elective				
Approved by the Academic Council on:				

SUBJECT NAME: APPLIED BIOCHEMISTRY
SUBJECT CODE: NR109

L T P
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PLACEMENT: II SEMESTER

THEORY: 1 Credit (20 Hours)

DESCRIPTION: The course is designed to assist the students to acquire knowledge of the normal biochemical composition and functioning of human body, its alterations in disease conditions and to apply this knowledge in the practice of nursing

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

1. Describe the metabolism of carbohydrates and its alterations
2. Explain the metabolism of lipids and its alterations
3. Explain the metabolism of proteins and amino acids and its alterations
4. Explain clinical enzymology in various disease conditions
5. Explain acid base balance, imbalance and its clinical significance
6. Describe the metabolism of hemoglobin and its clinical significance
7. Explain different function tests and interpret the findings
8. Illustrate the immunochemistry

COURSE OUTLINE

UNIT-I CARBOHYDRATES: (5 hours)

1. Digestion, absorption and metabolism of carbohydrates and related disorders
2. Regulation of blood glucose
3. Diabetes Mellitus – type 1 & type 2, symptoms, complications & management in brief
4. Investigations of diabetes mellitus
 - a. OGTT: indications, procedure, interpretation and types of GTT curve
 - b. Mini GTT, extended GTT, GCT, IV GTT
 - c. HbA1c (only definition)
5. Hypoglycemia – definition & causes

UNIT-II LIPIDS: (4 hours)

1. Fatty acids: definition, classification
2. Definition & clinical significance of MUFA & PUFA, essential fatty acids, trans fatty acids
3. Digestion, absorption & metabolism of lipids & related disorders
4. Compounds formed from cholesterol
5. Ketone bodies (name, types & significance only)

6. Lipoprotein – types & functions (metabolism not required)
7. Lipid profile
8. Atherosclerosis (in brief)

UNIT-III: PROTEINS:

(5 hours)

1. Classification of amino acids based on nutrition, metabolic rate with examples
2. Digestion, absorption & metabolism of protein & related disorders
3. Biologically important compounds synthesized from various amino acids (only names)
4. In born errors of amino acid metabolism – only aromatic amino acids (in brief)
5. Plasma protein – types, function & normal values
6. Causes of proteinuria, hypoproteinemia, hyper-gamma globinemia
7. Principle of electrophoresis, normal & abnormal electrophoresis pattern (in brief)

UNIT- IV: CLINICAL ENZYMOLOGY & ACID BASE MAINTENANCE: (3hour)

CLINICAL ENZYMOLOGY:

1. Isoenzymes – definition & properties
2. Enzymes of diagnostic importance in
 - a. Liver disease – ALT, AST, ALP, GGT
 - b. Myocardial infarction-CK, cardiac troponins, AST, LDH
 - c. Muscle diseases-CK, Aldolase
 - d. Bone diseases-ALP
 - e. Prostate cancer-PSA, ACP

ACID BASE MAINTENANCE:

1. pH – definition, normal value
2. Regulation of blood pH – blood buffer, respiratory & renal
3. ABG – normal values
4. Acid base disorders – types, definition & causes

UNIT-VI: HEME CATABOLISM, ORGAN FUNCTION TESTS, BIOCHEMICAL PARAMETERS & NORMAL VALUES ONLY & IMMUNOCHEMISTRY: (3 hour)

HEME CATABOLISM:

1. Heme degradation pathway
2. Jaundice – type, causes, urine & blood investigations (van den berg test)

ORGAN FUNCTION TESTS (BIOCHEMICAL PARAMETERS & NORMAL VALUES

ONLY):

1. Renal
2. Liver
3. Thyroid

IMMUNOCHEMISTRY:

1. Structure & function of immunoglobulin
2. Investigations & interpretation-ELISA

RECOMMENDED BOOKS:

1. Textbook of medical biochemistry, Jaypee, eighth edition, MN Chatterjea, Rana shinde
2. Textbook of Biochemistry for medical students, Jaypee, 8th edition, DM Vasudevan
3. Biochemistry for Nurses, Jaypee, Second edition, Jacob Anthikad
4. Medical Biochemistry for Nurses second edition Jaypee, Kasarla Rajeshwar Reddy.
5. Biochemistry for students, Jaypee, 12th edition, V.K Malhotra

SUBJECT NAME: APPLIED NUTRITION AND DIETETICS
SUBJECT CODE: NR110

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PLACEMENT: II SEMESTER

THEORY & LAB: 2 Credits (40 Hours)

Theory: 34 hours

Lab: 6 hours

DESCRIPTION: The course is designed to assist the students to acquire basic knowledge and understanding of the principles of Nutrition and Dietetics and apply this knowledge in the practice of nursing

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

1. Identify the importance of nutrition in health and wellness
2. Apply nutrient and dietary modifications in caring patients
3. Explain the principles and practices of Nutrition and Dietetics
4. Identify nutritional needs of different age groups and plan a balanced diet for them
5. Identify the dietary principles for different diseases
6. Plan therapeutic diet for patients suffering from various disease conditions
7. Prepare meals using different methods and cookery rules

COURSE OUTLINE

UNIT-I: INTRODUCTION TO NUTRITION, CARBOHYDRATES & PROTEINS: (8hours)

INTRODUCTION TO NUTRITION:

Concepts: Definition of Nutrition & Health

1. Malnutrition – under nutrition & over nutrition
2. Role of nutrition in maintaining health
3. Factors affecting food and nutrition

Nutrients Classification

1. Macro and micronutrients
2. Organic & inorganic
3. Energy yielding & non-energy yielding

Food

1. Classification – food groups
2. Origin

CARBOHYDRATES:

1. Composition – starches, sugar and cellulose
1. Recommended Daily Allowance (RDA)
2. Dietary sources
3. Functions

Energy

1. Unit of energy-Kcal
2. Basal Metabolic Rate (BMR)
3. Factors affecting BMR

PROTEINS:

1. Composition
2. Eight essential amino acids
3. Functions
4. Dietary sources
5. Protein requirement-RDA

UNIT-II: VITAMINS, MINERALS & FATS:

(8hours)

VITAMINS:

1. Classification-fat soluble & water soluble
2. Fat soluble-vitamin A, D, E and K
3. Water soluble-Thiamine (vitamin B1), Riboflavin (vitamin B2), Nicotinic Acid, Pyridoxine (vitamin B6), Pantothenic Acid, Folic Acid, vitamin B12, Ascorbic Acid (vitamin C)
4. Functions, Dietary Sources & Requirement-RDA of every vitamin

MINERALS:

1. Classification – major minerals (calcium, phosphorus, sodium, potassium and magnesium) and trace elements
2. Functions
3. Dietary sources
4. Requirement-RDA

FATS:

1. Classification-saturated & unsaturated
2. Calorie value
3. Functions
4. Dietary sources of fats and fatty acids
5. Fat requirements-RDA

UNIT-III: BALANCED DIET & NUTRITIONAL DEFICIENCY DISORDERS:

(8L-3P)

BALANCED DIET:

1. Definition, principles, steps
2. Food guide – basic four food groups

3. RDA – definition, limitation, uses
4. Food exchange system
5. Calculation of nutritive values of food
6. Dietary fiber
7. **Nutritional across life cycle**
 - a. Meal planning / menu planning – definition, principles, steps
 - b. Infant and Young Child Feeding (IYCF) guidelines – breast feeding, infant foods
 - c. Diet plan for different age groups – children, adolescents and elderly
 - d. Diet in pregnancy – nutritional requirements and balanced diet plan
 - e. Anemia in pregnancy-diagnosis, diet for anemic pregnant women, iron & folic acid supplementation and counseling
 - f. Nutrition in lactation-nutritional requirements, diet for lactating mothers, complementary feeding / weaning

NUTRITIONAL DEFICIENCY DISORDERS:

1. Protein energy malnutrition – magnitude of the problem, causes, classification, signs & symptoms, severe acute malnutrition (SAM), management & prevention, nurses' role
2. Childhood obesity-signs & symptoms, assessment, management & prevention and nurses' role
3. Vitamin deficiency disorders – vitamin A, B, C & D deficiency disorders: causes, signs & symptoms, management & prevention and nurses' role
4. Mineral deficiency diseases-iron, iodine and calcium deficiencies: causes, signs & symptoms, management & prevention and nurses' role

UNIT-IV: THERAPEUTIC DIETS & COOKERY RULES AND PREVENTION OF NUTRIENTS: (7L-3P)

THERAPEUTIC DIETS:

1. Definition, objectives, principles
2. Modifications – consistency, nutrients
3. Feeding techniques
4. Diet in diseases – obesity, diabetes mellitus, CVD, underweight, renal diseases, hepatic disorders, constipation, diarrhea, pre and post operative period

COOKERY RULES AND PREVENTION OF NUTRIENTS:

1. **Cooking** – Methods, advantages and disadvantages
2. Preservation of nutrients
3. Measures to prevent loss of nutrients during preparation

4. Safe food handling and storage of foods
5. Food preservation
6. Food additives and food adulteration
7. Prevention of Food Adulteration Act (PFA)
8. Food standards

UNIT-V: NUTRITION ASSESSMENT AND NUTRITION EDUCATION & NATIONAL NUTRITIONAL PROGRAMMES AND ROLE OF NURSE:

(4L)

NUTRITION ASSESSMENT AND NUTRITION EDUCATION:

1. Objectives of nutritional assessment
2. Methods of assessment-clinical examination, anthropometry, laboratory & biochemical assessment, assessment of dietary intake including Food Frequency Questionnaire (FFQ) method
3. Nutrition education education-purposes, principles and methods

NATIONAL NUTRITIONAL PROGRAMMES AND ROLE OF NURSE:

1. Nutritional problems in India
2. National nutritional policy
3. National nutritional programmes: Vitamin Supplementation, Anemia Mukht Bharat Programme, Integrated Child Development Services (ICDS), Mid-day Meal Scheme (MDMS), National Iodine Deficiency Disorders Control Programme (NIDDCP), Weekly Iron Folic Acid Supplementation (WIFS) and others as introduced
4. Role of nurse in every programme

Food born diseases and food safety are dealt in Introduction to Community Health Nursing

RECOMMENDED BOOKS:

1. **Nursing Manual of Nutrition and Therapeutic Diet Jaypee, T.K Indrani, 2nd edition**
2. **Essential of food and nutrition for Nurses, Lotus publishers,2nd edition,Shabnam masih**
3. **William's Basic Nutrition and diet therapy,14th edition, Elsevier publisher ,Stace Nix**
4. **A textbook of Nutrition for Nurses, Jaypee, Molly Sam,N Geetha**
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SUBJECT NAME: NURSING FOUNDATIONS-II
SUBJECT CODE: NR111

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PLACEMENT: II SEMESTER

THEORY: 6 Credits (120 Hours)

(Lab-L/Skill Lab-SL): 3 Credits (120 hours)

1. Identify and meet the hygiene needs of patients
2. Demonstrate fundamental skills of assessment, planning, implementation and evaluation of nursing care using nursing process approach in supervised clinical settings
3. Assess the nutritional needs of patients and provide relevant care under supervision
4. Identify and meet the elimination needs of patient
5. Interpret findings of specimen testing applying the knowledge of normal values
6. Promote oxygenation based on identified oxygenation needs of patients under supervision
7. Review the concept of fluid, electrolyte balance integrating the knowledge of applied physiology
8. Apply the knowledge of the principles, routes, effects of administration of medications in administering medication
9. Calculate conversions of drugs and dosages within and between systems of measurements
10. Demonstrate knowledge and understanding in caring for patients with altered functioning of sense organs and unconsciousness
11. Explain loss, death and grief
12. Describe sexual development and sexuality
13. Identify stressors and stress adaption modes
14. Integrate the knowledge of culture and cultural differences in meeting the spiritual needs
15. Explain the introductory concepts relevant to models of health and illness in patient care
16. Perform first aid measures during emergencies

***Modules used in teaching / learning:**

II Semester: First Aid – 40 Hours (including basic CPR)

COURSE OUTLINE

UNIT-I: HYGIENE, THE NURSING PROCESS: (19L– 22 P)

HYGIENE:

1. Factors Influencing Hygiene Practice
2. Hygienic care: indications and purposes, effects of neglected care
 - a. Care of Skin – (Bath, feet and nail, hair care)
 - b. Care of pressure points
 - c. Assessment of pressure Ulcers using Braden Scale and Norton Scale
 - d. Pressure ulcers – causes, stages and manifestations, care and prevention
 - e. Perineal care / Meatal care

- f. Oral care, care of eyes, ears and nose including assistive devices (eye glasses, contact lens, dentures, hearing aid)

THE NURSING PROCESS:

1. Critical Thinking Competencies, Attitude for Critical thinking, Levels of Critical Thinking in Nursing
2. Nursing Process Overview
 - a. **Assessment**
 - i. Collection of data: Types, sources, methods
 - ii. Organizing data
 - iii. Validating data
 - iv. Documenting data
 - b. **Nursing Diagnosis**
 - i. Identification of client problems, risks and strengths
 - ii. Nursing diagnosis statement – parts, types, formulating, guidelines for formulating nursing diagnosis
 - iii. NANDA approved diagnoses
 - iv. Difference between medical and nursing diagnosis
 - c. **Planning**
 - i. Types of planning
 - ii. Establishing priorities
 - iii. Establishing goals and expected outcomes – purposes, types, guidelines, components of goals and outcome statement
 - iv. Types of nursing interventions, selecting interventions: Protocols and standing orders
 - v. Introduction to Nursing: intervention. classification and nursing outcome classification
 - vi. Guidelines for writing care plan
 - d. **Implementation**
 - i. Process of implementing the plan of care
 - ii. Types of care – direct and indirect
 - iii. **Evaluation**
 - iv. Evaluation process, documentation and reporting

UNIT-II: NUTRITIONAL NEEDS, ELIMINATION NEEDS & DIAGNOSTIC TESTING: (19L-18P)

NUTRITIONAL NEEDS:

1. Importance
2. Factors affecting nutritional needs
3. Assessment of nutritional status

4. Review: special diets – solid, liquid, soft
5. Review on therapeutic diets
6. Care of patient with Dysphagia , Anorexia, Nausea, Vomiting
7. Meeting nutritional needs: principles, equipment, procedure, indications
 - a. Oral
 - b. Enteral: Nasogastric / Orogastric
 - c. Introduction to other enteral feeds – types, indications, Gastrostomy, Jejunostomy
 - d. Parenteral-TPN

ELIMINATION NEEDS:

1. Urinary Elimination
 - a. Review of physiology of urine elimination, composition and characteristics of urine
 - b. Factors influencing urination
 - c. Alteration in urinary elimination
 - d. Facilitating urine elimination : assessment, types, equipment, procedures and special considerations
 - e. Providing urinal / bed pan
 - f. Care of patients with
 - i. Condom drainage
 - ii. Intermittent Catheterization
 - iii. Indwelling urinary catheter and urinary drainage
 - iv. Urinary diversions
 - v. Bladder irrigation
2. Bowel elimination
 - a. Review of physiology of bowel elimination, composition and characteristics of feces
 - b. Factors affecting bowel elimination
 - c. Alteration in bowel elimination
 - d. Facilitating bowel elimination: assessment, equipment, procedures
 - i. Enemas
 - ii. Suppository
 - iii. Bowel wash
 - iv. Digital evacuation of impacted feces
 - v. Care of patients with ostomies (Bowel Diversion Procedures)

DIAGNOSTIC TESTING:

1. Phases of diagnostic testing (pre-test, intra-test & post-test) in common investigations and clinical implications

- a. Complete Blood Count
- b. Serum Electrolyte
- c. LFT
- d. Lipid / Lipoprotein profile
- e. Serum Glucose – AC, PC, HbA1c
- f. Monitoring Capillary Blood Glucose (Glucometer Random Blood Sugar-GRBS)
- g. Stool Routine Examination
- h. Urine Testing – Albumin, Acetone, pH specific gravity
- i. Urine culture, routine, timed urine specimen
- j. Sputum culture
- k. Overview of radiologic & endoscopic procedures

UNIT-III: OXYGENATION NEEDS, FLUID, ELECTROLYTE AND ACID – BASE BALANCES: (18L-17P)

OXYGENATION NEEDS:

1. Review of cardiovascular and respiratory physiology
2. Factors affecting respiratory functioning
3. Alteration in respiratory functioning
4. Conditions affecting
 - a. Airway
 - b. Movement of air
 - c. Diffusion
5. Oxygen transport
6. Alterations in oxygenation \
7. Nursing interventions to promote oxygenation: assessment, types, equipment used & procedure
 - a. Maintenance of patient airway
 - b. Oxygen administration
 - c. Suctioning – oral, tracheal
 - d. Chest physiotherapy – percussion, vibration & postural drainage
 - e. Care of chest drainage – principles & purposes
 - f. Pulse oximetry – factors affecting measurement of oxygen saturation using pulse oximeter, Interpretation
8. Restorative & continuing care
 - a. Hydration
 - b. Humidification
 - c. Coughing techniques
 - d. Breathing exercises
 - e. Incentive spirometry

FLUID, ELECTROLYTE AND ACID – BASE BALANCES:

1. Review of physiological regulation of fluid, electrolyte and acid – base balances
2. Factors Affecting Fluid, Electrolyte and Acid – Base Balances
3. Disturbances in fluid volume:
 - a. Deficit
 - Hypovolemia
 - Dehydration
 - b. Excess:
 - Fluid overload
 - Edema
4. Electrolyte imbalances (hypo and hyper)
 - a. Acid-base imbalances
 - Metabolic – acidosis & alkalosis
 - Respiratory – acidosis & alkalosis
 - b. Intravenous therapy
 - Peripheral venipuncture sites
 - Types of IV fluids
 - Calculation for making IV fluid plan
 - Complications of IV fluid therapy
 - Measuring fluid intake and output
 - Administering blood and blood components
 - Restricting fluid intake
 - Enhancing fluid intake

UNIT-IV: ADMINISTRATION OF MEDICATIONS & SENSORY NEEDS:

(34L-29P)

ADMINISTRATION OF MEDICATIONS:

1. Introduction – definition of medication, administration of medication, drug nomenclature, effects of drugs, forms of medications, purposes, pharmacodynamics and pharmacokinetics
2. Factors influencing Medication Action
3. Medication orders and prescriptions
4. Systems of measurement
5. Medication dose calculation
6. Principles, 10 rights of medication administration
7. Errors in medication administration
8. Routes of administration
9. Storage and maintenance of drugs and nurses responsibility
10. Terminologies and abbreviations used in prescriptions and medications orders

11. Developmental considerations
12. Oral, sublingual and buccal routes: equipment, procedure
13. Introduction to parenteral administration of drugs – intramuscular, intravenous, subcutaneous, intradermal: location of site, advantages and disadvantages of the specific sites, indication and contraindications for the different routes and sites
14. Equipment – syringes & needles, cannulas, infusion sets – parts, types, sizes
15. Types of vials and ampoules, preparing injectable medicines from vials and ampoules
 - a. Care of equipment: decontamination and disposal of syringes, needles infusion sets
 - b. Prevention of needle-stick injuries
16. Topical administration: types, purposes, site, equipment, procedure
 - a. Application to skin & mucous membrane
 - b. Direct application of liquids, gargle and swabbing the throat
 - c. Insertion of drug into body cavity: suppository / medicated packing in rectum / vagina
 - d. Instillations: Ear, eye, nasal, bladder and rectal
 - e. Irrigations: Eye, ear, bladder, vaginal and rectal
 - f. Spraying: Nose and throat
 - Inhalation: Nasal, oral, endotracheal , tracheal (steam, oxygen and medications) – purposes, types, equipment, procedure, recording and reporting of medications administered
 - Other parenteral routes: meaning of epidural, intrathecal, intraosseous, intraperitoneal, intrapleural, intraarterial

SENSORY NEEDS:

1. Introduction
2. Components of sensory experience – reception, perception & reaction
3. Arousal mechanism
4. Factors affecting sensory function
5. Assessment of sensory alterations – sensory deficit, deprivation, overload & sensory poverty
6. Management
 - Promoting meaningful communication (patients with Aphasia, artificial airway & Visual and Hearing impairment)

Care of Unconscious patients

1. Unconsciousness: definition, causes & risk factors, Pathophysiology, stages of unconsciousness, clinical manifestations

2. Assessment and nursing management of patient with unconsciousness, complications

CARE OF TERMINALLY ILL, DEATH AND DYING:

1. Loss – types
2. Grief, bereavement & mourning
3. Types of grief responses
4. Manifestations of grief
5. Factors influencing loss & grief responses
6. Theories of grief & Loss-Kubler Ross 5 stages of dying
7. The R process model (Rando's)
8. Death – definition, meaning, types (brain & circulatory deaths)
9. Signs of impending death
10. Dying patient's Bill of Rights
11. Care of dying patient
12. Physiological changes occurring after death
13. Death declaration, certification, autopsy, Embalming
14. Last office / death care
15. Counseling & supporting grieving relatives
16. Placing body in the Mortuary
17. Releasing body from Mortuary
18. Overview: Medico-legal cases, advance directives, DNI/DNR, organ donation, euthanasia

UNIT-V: PSYCHOSOCIAL NEEDS (A-D):

(40L-23P)

A. SELF CONCEPT:

1. Introduction
2. Components (Personal Identify, Body Image, Role Performance, Self Esteem)
3. Factors affecting self concept
4. Nursing management

B. SEXUALITY:

- Sexual development throughout life
- Sexual health
- Sexual orientation
- Factors affecting sexuality
- Prevention of STI's unwanted pregnancy, avoiding sexual harassment and abuse
- Dealing with inappropriate sexual behavior

C. STRESS AND ADAPTATION – INTRODUCTORY CONCEPTS:

1. Introduction
2. Source, effects, indicators & types of stress

3. Types of stressors
4. Stress Adaption – General Adaption Syndrome (GAS), Local Adaption Syndrome (LAS), Manifestation of stress – physical & psychological
5. Coping strategies / mechanism
6. Stress management
 - a. Assist with coping and adaption
 - b. Creating therapeutic environment
7. Recreational and diversion therapies

D. CONCEPTS OF CULTURAL DIVERSITY AND SPIRITUALITY:

1. Cultural diversity
 - a. Cultural concepts – culture, subculture, multicultural, diversity, race, acculturation, assimilation
 - b. Transcultural nursing
 - c. Cultural competence
 - d. Providing culturally responsive care
2. Spirituality
 - a. Concepts – faith, hope, religion spirituality, spiritual wellbeing
 - b. Factors affecting spirituality
 - c. Spiritual problems in Acute, Chronic, Terminal illness & near-death experience
 - o Dealing with spiritual distress / problems

NURSING THEORIS: INTRODUCTION:

1. Meaning & definition, purposes, types of theories with examples, overview of selected nursing theories – Nightingale, Orem, Roy
2. Use of theories in nursing practice

FIRST AID & EMERGENCIES:

1. Definition, basic principles, scope & rules
2. First aid management
 - a. Wounds, Hemorrhage & shock
 - b. Musculoskeletal injuries: fractures, dislocation, muscles injuries
 - c. Transportation of injured persons
 - d. Respiratory emergencies & basic CPR
 - e. Unconsciousness
 - f. Foreign bodies – skin, eye, ear, nose, throat & stomach
 - g. Burns & scalds
 - h. Poisoning, bites & stings
 - i. Frostbite & effects of heat & Community emergencies

RECOMMENDED BOOKS:

1. Kozeer and Erb's Fundamentals of Nursing,Audrey J. Berman, shirlee snyder,9th edition, pearson publication
2. Principles & practice of Nursing, Sr. Nancy,Volume I,6th edition
3. Stephanie's Principles &practice of nursing, volume II ,Sr. Nancy
4. Fundamentals of Nursing ,7th edition, Potter Perry
5. Lippincott Manual of nursing Practice,10th edition ,Wolters Kluwer,Lippincott Williams &Wilkins
6. Textbook of nursing book ,2nd edition,I clement

SUBJECT NAME: INTRODUCTION TO COMMUNITY HEALTH NURSING
SUBJECT CODE: NR112

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PLACEMENT: II SEMESTER

Theory: 2 Credits (40 Hours)

DESCRIPTION: The course is designed to help students develop broad perspectives of health, its determinants, about community health nursing and understanding about the health care delivery services, health care policies and regulations in India. It helps the students to develop knowledge and understanding of environment, environmental health and sanitation, nutrition and food safety. It further helps them to apply the principles and concepts of BCC and health education for health promotion and maintenance of health within the community in wellness and illness continuum

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

1. Explore the evolution of public health in India and community health nursing
2. Explain the concepts and determinants of health
3. Identify the levels of prevention and health problems of India
4. Develop basic understanding about the health care planning and the present health care delivery system in India at various levels
5. Locate the significance of primary health care and comprehensive primary health care as part of current health care delivery system focus
6. Discuss health care policies and regulations in India
7. Demonstrate understanding about an overview of environmental science
8. Identify the role and significance of environmental protection and preservation
9. Relate the influence of environmental factors and sanitation on health and disease
10. Demonstrate skill in nutritional assessment for different age groups in the community and provide appropriate nutritional counseling
11. Identify the importance of food safety in prevention of food borne diseases
12. Discuss basic issues and concepts of Behavior Change Communication (BCC) and Social Behavior Change Communication (SBCC) and identify the methods of BCC to target the audience

13. Provide health education to individuals and families applying the principles and techniques of behavior change appropriate to community settings

COURSE OUTLINE

UNIT-I CONCEPT OF COMMUNITY HEALTH AND COMMUNITY HEALTH NURSING: (4L)

1. Definition of public health, community health and community health nursing
2. Public health in India and its evolution and scope of community health nursing
3. *Review:* Concepts of health & illness / disease – definition, dimensions and determinants of health and disease
4. Natural history of disease
5. Levels of prevention – primary, secondary & tertiary prevention – review

UNIT-II HEALTH CARE PLANNING AND ORGANIZATION OF HEALTH CARE AT VARIOUS LEVELS: (8 T)

1. Health planning steps
2. Health planning in India – various committees and commissions on health and family welfare and five year plan
3. Participation of community and stakeholders in health planning
4. Health care delivery system in India – Infrastructure and health sectors, delivery of health services at sub center (SC) PHC, CHC, district level, state level and national level
5. Sustainable development goals (SDGs) , primary health care and Comprehensive Primary Health Care (CPHC) – elements, principles
6. CPHC through SC/Health Wellness Center (HWC)
7. National Health Care Policies and Regulations
 - a. National Health Policy (1983, 2002, 2017)
 - b. National Health Mission (NHM): National Rural Health Mission (NRHM), National Urban Health Mission (NUHM), NHM
 - c. National Health Protection Mission (NHPM)
 - d. Ayushman Bharat
 - e. Universal Health Coverage

UNIT-III ENVIRONMENTAL SCIENCE, ENVIRONMENTAL HEALTH AND SANITATION: (15 T)

- *Natural Resources:*

Renewable and non-renewable resources, natural resources and associated problems - Forest resources, water resources, mineral resources, food resources, energy resources and land resources

Role of individuals in conservation of natural resources and equitable use of resources for sustainable lifestyles

- a. *Ecosystem*: Concept, structure and functions of ecosystems, types & characteristics – Forest ecosystem, Grassland ecosystem, Desert ecosystem, Aquatic ecosystem, Energy flow in ecosystem
- b. *Biodiversity*: classification, value of bio-diversity, threats to biodiversity, conservation of biodiversity
- c. *Environmental pollution*: Introduction, causes, effects and control measures of: Air pollution, Water pollution, Soil pollution, Marine pollution, Noise pollution, Thermal pollution, Nuclear hazards & their impact on health
- d. Climate change, global warming-eg. Heat wave, acid rain, ozone layer depletion, waste land reclamation & its impact on health
- e. Social issues and environment: sustainable development, urban problems related to energy, water and environmental ethics
- f. Acts related to environmental protection and preservation

Environmental health & sanitation

- a. Concept of environment health and sanitation
- b. Concept of safe water, sources of water, waterborne diseases, water purification processes, household purification of water
- c. Physical and chemical standards of drinking water quality and tests for assessing bacteriological quality of water
- d. Concepts of water conservation-rain water harvesting and water shed management
- e. Concept of pollution prevention
- f. Air & noise pollution
- g. Role of nurse in prevention of pollution
- h. Solid waste management, human excreta disposal & management & sewage disposal and and management
- i. Commonly used insecticides and pesticides

UNIT-IV NUTRITION ASSESSMENT AND NUTRITION EDUCATION: (4L)

1. *Review of Nutrition*
 - a. Concepts, types
 - b. Meal planning-aims, steps and diet plan for different age groups
 - c. Nutrition assessment of individuals, families and community by using appropriate methods
2. Planning suitable diet for individuals and families according to local availability of foods, dietary habits and economics status
3. General nutritional advice
4. Nutrition education – purpose, principles & methods and rehabilitation
5. *Review*: Nutritional deficiency disorders

6. National Nutritional policy & programmes in India

Food Borne Diseases and Food Safety

- Definition & burden, causes and classification
- Signs & symptoms
- Transmission of food borne pathogens & toxins
- Early identification, initial management and referral

Food poisoning and food intoxication

- Epidemiological features/clinical characteristics, type of food poisoning
- Food intoxication – features, preventive & control measures
- Public health response to food borne diseases

Food Safety

- Definition, food safety considerations & measures
- Food safety regulatory measures in India – Relevant Acts
- Five keys to safer food
- Food storage, food, handling and cooking
- General principles of food storage of food items (ex. Milk, meat)
- Role of food handlers in food borne diseases
- Essential steps in safe cooking practices

UNIT-V COMMUNICATION MANAGEMENT AND HEALTH EDUCATION: (6L)

1. Behavior change communication skills

- a. Communication
- b. Human behavior
- c. Health belief model-concepts & definition, ways to influence behavior
- d. Steps of behavior change
- e. Techniques of behavior change – guiding principles in planning BCC activity
- f. Steps of BCC
- g. Social and Behavior Change Communication Strategies (SBCC) – techniques to collect social history from clients
- h. Barriers to effective communication and methods to overcome them
- i. Health promotion and health education – methods / techniques and audio-visual aids

NOTE: To Environmental Studies Module by UGC is incorporated

RECOMMENDED BOOKS:

1. Park's Textbook of preventive and social medicine ,23rd edition,m/s Banarsidas Bhaneeet Publications.

2. Community Health Nursing (principles & practice), 2nd edition kumar publishing Louse, k.k Gulari
3. Essentials in community Health Nursing practice, 2nd edition, Jaypee, S.Kamalam.
4. Swarnkar, s Community Health Nursing 3rd edition , N.R. Brothers publication, Keshav Swarnkar
5. Community Medicine With Recent advances, 4th edition jAYPEE, AH Suryakantha

SUBJECT NAME: NURSING FOUNDATIONS-II LAB
SUBJECT CODE: NR113
(SKILL LAB)

L T P
0 0 6

PLACEMENT: II SEMESTER

Skill Lab: 120 hours

COMPETENCIES

1. Implement basic nursing techniques in meeting hygienic needs of patients
2. Develop skills in assessment, planning, implementation and evaluation of nursing care using nursing process approach
3. Identify and meet the Nutritional needs of patients
4. Plan and implement care to meet the elimination needs of patient
5. Develop skill in instructing and collecting samples for investigation
6. Perform simple lab tests and analyze & interpret common diagnostic values
7. Identify patients with impaired oxygenation and demonstrate skill in caring for patients impaired oxygenation
8. Identify and demonstrate skill in caring for patients with fluid, electrolyte and acid – base imbalance
9. Assess, plan, implement & evaluate the basic care needs of patients with altered functioning of sense organs and unconsciousness

10. Care of terminally ill and dying patients
11. Identify stress and assist patients to adopt various coping strategies
12. Acquire skills in assessing and performing First Aid during emergencies

Use of Mannequins and Simulators

S. No.	COMPETENCIES	MODE OF DEMONSTRATION
Semester-II		
15.	Sponge bath, oral hygiene, Perineal care	Mannequin
16.	Nutritional assessment	Standardized patient
17.	Nasogastric tube feeding	Trainer/ Simulator
18.	Providing bed pan & urinal	Mannequin
19.	Catheter care	Catheterization Trainer
20.	Bowel wash, enema, insertion of suppository	Simulator/ Mannequin
21.	Oxygen administration – face mask, venture mask, nasal prongs	Mannequin
22.	Administration of medication through parenteral route – IM, SC, ID, IV	IM injection trainer, ID injection trainer, IV arm (Trainer)
23.	Last office	Mannequin
24.	CPR	CPR Mannequin

**SUBJECT NAME: INTRODUCTION TO COMMUNITY HEALTH NURSING-LAB
SUBJECT CODE: NR114**

L T P
0 0 4

CLINICAL: 2 Credits (80 Hours) = 2 weeks x 40 hours / weeks

CLINICAL AREA: URBAN & RURAL

DURATION IN WEEKS: 1 week

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

1. Interviewing skills (using communication and interpersonal relationship)
2. Observation skills
3. Conducting community needs assessment / survey to identify health determinants of a community
4. Nutrition assessment skills
5. Skills in teaching individuals / family on:
 - a. Nutrition, including food hygiene and safety
 - b. Health life style
 - c. Health promotion

CLINICAL AREA: FIELD VISITS

DURATION IN WEEKS: 1 week

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

1. Observational Skills:

- a. Water resources and water purification sites
- b. Water quality tests
- c. Milk diary
- d. Slaughterhouse

SUBJECT NAME: CLINICAL POSTING
SUBJECT CODE: NR115
(CLINICAL)

L T P
0 0 0

PLACEMENT: II SEMESTER

Clinical: 320 hours

Clinical – 320 Hours (4 Credits)

COMPETENCIES: SEMESTER-II (16 weeks x 20 hours / weeks)

CLINICAL UNIT: General Medical / Surgical Wards

DURATION IN WEEKS: 4

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

HYGIENE & THE NURSING PROCESS

Hygiene

1. Care of skin & hair:
 - a. Sponge bath/ bed bath
 - b. Care of pressure points & back massage
 - c. Pressure sore risk assessment using Braden/ Norton Scale
 - d. Hair wash
 - e. Pediculosis treatment
2. Oral hygiene
3. Perineal Hygiene

4. Catheter care

The Nursing Care

1. Prepare nursing care plan for the patient based on the given case

CLINICAL UNIT: General Medical / Surgical Wards

DURATION IN WEEKS: 3

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

NUTRITIONAL NEEDS, ELIMINATION NEEDS & DIAGNOSTIC TESTING

Nutritional needs

1. Nutritional assessment
2. Preparation of Nasogastric tube feed
3. Nasogastric tube feeding

Elimination needs

Providing urinal bed pan

1. Insertion of suppository
2. Enema
3. Urinary catheter care
4. Care of urinary drainage

Diagnostic testing

1. Specimen Collection
 - a. Urine routine and culture
 - b. Stool routine
 - c. Sputum Culture
2. Perform simple lab tests using reagent strips
 - a. Urine – Glucose, Albumin, Acetone, pH, Specific gravity
3. Blood-GRBS monitoring

CLINICAL UNIT: General Medical / Surgical Wards

DURATION IN WEEKS: 3

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

OXYGENATION NEEDS, FLUIDS, ELECTROLYTE AND ACID-BASE BALANCES

Oxygenation needs

1. Oxygen administration methods
 - a. Nasal Prongs
 - b. Face Mask/ Venturi Mask
2. Steam inhalation
3. Chest physiotherapy
4. Deep breathing & coughing exercises
5. Oral suctioning

Fluid, Electrolyte and acid-base balances

1. Maintaining intake output chart
2. Identify & report complication of IV therapy
3. Observe blood & blood component therapy
4. Identify & report complications of blood & blood component therapy

CLINICAL UNIT: General Medical / Surgical Wards

DURATION IN WEEKS: 3

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

ADMINISTRATION OF MEDICATIONS

1. Calculate Drug Dosages
2. Preparation of lotions & solutions
3. Administer Medications
 - a. Oral
 - b. Topical
 - c. Inhalations
 - d. Parenteral
 - Intradermal
 - Subcutaneous
 - Intramuscular
 - Instillations
 - e. Eye, ear, nose instillation of medicated drops, nasal sprays, irrigations

CLINICAL UNIT: General Medical / Surgical Wards

DURATION IN WEEKS: 2

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

SENSORY NEEDS AND CARE OF UNCONSCIOUS PATIENTS, CARE OF TERMINALLY ILL, DEATH AND DYING & STRESS AND ADAPTION

Sensory Needs and Care of Unconscious Patients

1. Assessment of level of Consciousness using Glasgow Coma Scale

Terminally ill, death and dying

2. Death Care

Stress and adaption

DURATION IN WEEKS: 1

PROCEDURAL COMPETENCIES/CLINICAL SKILLS:

FIRST AID AND EMERGENCIES

8. Bandaging Techniques
 - f. Basic Bandages:
 - Circular
 - Spiral
 - Reverse-Spiral
 - Recurrent
 - Figure of Eight

g. Special Bandages:

- Caplin
- Eye/ ear Bandage
- Jaw Bandage
- Shoulder Spica
- Thumb Spica
- Triangular Bandage / Sling (Head & Limbs)
- Binders
- Basic CPR