## **B.Sc. HEALTH CARE AND HOSPTIAL ADMINISTRATION**

## **CURRICULUM**

## I – Year

<b>PAPERS</b>	Subject	Max. Marks	Exam Hrs
1	Hindi – I	100	3
2	English – I	100	3
3	Public Health Administration - I	100	3
4	Principles of Health Care Administration and Health	100	3
5	Hospital Facilities Service Planning & Management	100	3

## II - Year

PAPERS	Subject	Max. Marks	Exam Hrs
1	Hindi – II	100	3
2	English – II	100	3
3	Public Health Administration – II	100	3
4	Basic Biological Science	100	3
5	Marketing for Health Care Services	100	3

PAPERS	Subject	Max. Marks	Exam Hrs
1	Environmental Sanitation	100	3
2	Health System Research(statistics)	100	3
3	Quality Administration for Hospital	100	3
4	<b>Hospital Information System</b>	100	3
5	<b>Human Resource Management</b>	100	3

## **SYLLABUS**

## I<sup>st</sup> - YEAR

## <u>HINDI- I</u>

#### PAPER - 2

#### **ENGLISH PAPER – I**

## **Detailed Text**

#### **PROSE**

- 1. In Prison Jawaharlal Nehru
- 2. What is Science? George Orwell
- 3. On Marriages Nirad Chaudari
- 4. The Luncheon N. Somerset Maugham
- 5. The Mourners V. S. Naipaul
- 6. The Plane Crash Juliane Koepcke
- 7. Better Late R.K. Narayan

#### **POETRY**

- 1. Polonius' Advice t his Son William Shakespeare
- 2. Every Town a Home Town Kaniyan Purkunran

- 3. The Village Schoolmaster Oliver Goldsmith
- 4. The Solitary Reaper William Wordsworth
- 5. On his Blindness John Milton
- 6. The Tyger William Blake

#### **Non-Detailed**

**Text**: THE GIFTS AND OTHER STORIES abridged and simplified by Anthony Toyne – Oxford University Press, 1997.

The following stories

- 1. The Gifts O. Henry
- 2. The Two Friends Guy de Maupassant
- 3. The Bear Hunt Leo Tolstoy
- 4. The Goblins and the Grave Digger Charles Dickens
- 5. The Nightingale and the Rose Oscar Wilde

#### **GRAMMER**

- 1. Articles and Prepositions
- 2. Infinitives and Gerunds
- 3. Five basic sentence patterns (SV SVC, SVO, SVOO, SVOC(A))
- 4. Arranging the component parts so as to form a sentence
- 5. Language work at the end of all lessons
- 6. Language work at the end of all lessons
- 7. Question Tag, Active and Passive Voice
- 8. Degrees of Comparison

#### **COMPOSITION**

- 1. Letter Writing (Formal and Informal)
- 2. Developing the hints
- 3. Comprehension

- 4. Writing Telegram
- 5. Completion of a passage
- 6. Precis Writing

#### PAPER - 3

#### PUBLIC HEALTH ADMINISTRATION – I

#### OBJECTIVES : Students to have and understanding of

- 1) Public health administrative set up in nation state district PHC
- 2) Laws to be executed at various levels &
- 3) Importance of birth & death registration.

#### UNIT - I

- Introduction of Public Health. Administration Definition of Public Health Scope of
  Public Health Activities Definition of Administration and Public Health –
  Administration Difference between Therapoutic Medicine, Preventive Medicine and
  Public Health.
- 2. Historical Development of Public Health in India.
- 3. Health problems in India compared with other developed countries.
- 4. Health Services. Bhore Committee Report and major recommendations .The Mudaliar Committee reports Conducting of village health services.

#### UNIT - II

Organizational considerations in Public Health. Component functions involved in administration. Definition of Organisation and purpose of organization. General principles of organization. Levels of organization. Decentralization. Co-ordination.

#### UNIT - III

- 1. Personal factors in Public Health and Supervision. Certain basic principles of supervision. Supervisory responsibility.
  - 2. Programme Planning and Evaluation. Principles of Porgramme Planning. Steps in programme Planning. Evaluation. Methods of Evaluation.
  - 3. Present Organisation Public health control level. Union ministries responsibilities. Set up and organization of the union ministry of health.
  - 4. Organisation and functions of the state ministry of health and Health Directorate. Functions of the State Health Department. Set up of the District Health Organisation.

- 1. Health facilities in urban area. Definition of urban area corporation, municipalities and town panchayats. Organizational set up for public health in corporations. Organizational set up for various public health in municipalities and duties of the various public health personnel. Organizational set up for public health in town. Panchayats and duties of the various public health personnel.
- International Organisations (Health). World Health Organisation. Functions of the W.H.O. Approach in Central of diseases. W.H.O. assisted projects in India.
   Objectives and organizations – Categories of aid – UNICEF assisted projects in India,

#### UNIT - V

- Public Health Laws. Definition of low characteristics of law public Health Law Act

   Central Act State Act Rule Bye Law Standing Order Need for public health law.
- Statutory laws for normal conditions and epidemics Public health practices covering by law. Law for normal conditions – Laws applicable to epidemics – Medical relief and public health measures Sanitation – General.

Detailed discussion on various acts. Discussion over the main provisions of
 Public Health Act – Central food adulteration act – Factories act – Birth and death registration act. Epidemics diseases act – places of public resort at – Consumer protection act.

#### Paper – 4

## HEALTH OF HEALTHCARE ADMINISTRATION AND HEALTH ECONOMICS UNIT – I

Mangement – Definition – Managerial skills – levels of management – Concepts of management – functions of management - Evolution of management theory – Peter Drucker – Henry Fayol – contributions – Management objectives.

#### UNIT - II

Parts of hospital – Rose hospital in health care delivery – External relationship in hospital management – Role of hospital administrator.

#### UNIT - III

Nature & Scope of economics – Demand analysis – Law of demand – Demand curve – Supply analysis – Consumer behaviour.

#### UNIT – IV

Health market – categorization of consumption – Engel's law of utility analysis – Indifference analysis.

#### UNIT - V

Value of money in Health care – Health policies – Government's role in different socio economic systems. Pricing policy.

#### **Reference:**

Harold Koontz, Heniz, Weimirch; Mangement.

James A.F. Stones., R. Edward; Management.

Rustom S.Davar; Principles of Management.

Edwin Marshfield; Managerial Economics, McGraw Hill.

R.L. Varshni & K. Maheshwary, L; Managerial Economics, S. Chand.

#### PAPER - V

#### HEALTH FACILITIES SERVICE PLANNING AND MANAGEMENT

#### UNIT – I

Hospital Planning – Objectives – Building principles in planning Hospitals – facilities & services – Preliminary survey & feasibility study.

#### UNIT - II

Selection of location – functional plans of hospital construction – the design team (Architect, Engineer & Hospital Administrator) – financial planning – equipment planning – Human resource planning – functional and operational planning.

#### UNIT – III

Furnishing and equipping the Hospital – commissioning the hospital – organization of hospital – organization structure – planning & designing of administrative departments.

#### UNIT - IV

Planning & designing of Medical services Outpatients & emergency services – clinical laboratories – radiology department – medical records department – CSSD – Pharmacy – food service – housekeeping – nursing dept.

#### UNIT - V

External interference in planning – Waste management in hospitals – methods – types of wastes. Maintenance – electrical – Civil – Safety & security – watersupply. Application of method study – work measurement study – Time management.

#### **Reference:**

G.D. Kunders: Hospitals – Planning, Design & Management, Tata McGraw Hill Goel S.L. & Kumar R: Hospital administration and management Vol.2, New Delhi, Deeps Desai V.A.; Hospital Administration Vol.2 Madurai, 1989.

# $II^{nd}$ - YEAR HINDI- I

#### **ENGLISH PAPER – II**

#### **Detailed Text**

#### **PROSE**

- 8. A Visit to India Julian Huxley
- 9. University Days James Thurber
- 10. I Have a Dream Martin Luther King
- 11. The Story Teller H.H. Munro (Saki)
- 12. George Bernard Shaw Bertrand Russel
- 13. Only then shall we find Courage Albert Einstein

#### **POETRY**

- 7. The Day is Done Henry Wadsworth Longfellow
- 8. King Arthur's Farewell Alfred Tennyson
- 9. O Captain! My Captain! Walt Whitman
- 10. My Last Duchess Robert Browning
- 11. Ode to a Nightingale John Keats
- 12. Lochinvar –Walter Scott

#### **Non-Detailed**

A collection of One Act Plays -

- 1. Remember Ceasar Gordon Daviot
- 2. The Proposal Anoth Chekov
- 3. The Miracle Merchant Saki
- 4. The Stepmother Arnold Bennet
- 5. The Mahatma Rama Sarma

#### **GRAMMER**

- 1. Relative Clauses
- 2. Conditional Sentences
- 3. Modal auxiliaries
- 4. Reported Speech
- 5. Transformation of Sentences
  - a. Affirmative, Negative and Interrogative Sentences
  - b. Simple, Compound and Complex Sentences
- 6. a.b.r clauses
- 7. Correction of Sentences based on
  - a. Subject, Verb and Concord
  - b. Tenses
  - c. Articles and Prepositions.
  - d. Question Tags

#### **COMPOSITION**

- 7. Paraphrasing
- 8. Dialogue Writing
- 9. Report Writing
- 10. Note Making
- 11. General Essay
- 12. Expansion of Idea.

#### Paper - 3

#### PUBLIC HEALTH ADMINISTRATION - PART - II

#### UNIT – I

- 1. Introduction to Public Health Nutrition.
- 2. Basic elements of foods proximate principles and protective foods.
- **3.** Nutrients required for a balanced diet; recommended daily food requirementa for a balanced Indian diet.
- **4.** Factors influencing nutrition.
- **5.** Balanced diet for different age and sex groups including vulnerable groups planning a low cost balanced diet, dietary requirements for certain diseases and for convalescents, geriatric nutrition.

#### UNIT – II

- 1. Problems of malnutrition common in India and their prevention.
- 2. Interaction of Nutrition and Infection, Nutrition and Family Planning.
- 3. Food borne diseases and food hygiene.
- 4. Food Adulteration
- 5. Assessment of the nutrition and diet surveys (Theory).

#### Paper – 4

#### BASIC BIOLOGICAL SCIENCE

#### UNIT – I

An introduction to basic Human anatomy and study of basic vital organs – Anatomy of Heart, Ear, Brain and Kidney.

#### UNIT – II

Physiology: Introduction to human physiology & study of various systems – Circulatory system – Central Nervous System – Autonomous Nervous Systems Reproductive System. Digestive System, Respiratory System – Sensory organs and their functions – Glands.

#### UNIT – III

Bio chemistry of proteins – Fat – Amino acids – Carbo hydrates metabolism – enzymes – Vitamins – Harmones – Blood Chemistry.

#### UNIT - IV

Microbiology: Introduction to classification & General Characteristics of various organisms – microbiology of food born diseases and food preservation relating.

#### UNIT - V

Hospital Machinery & its functions – basic equipments – specialized equipments – their functions & utilization in the hospital.

#### **Reference:**

Anatomy and physiology for Nurses.

Physiology: K. Madhavan Kutty.

Microbiology: Ananthanarayanan.

#### Paper - 5

#### MARKETING FOR HEALTH CARE SERVICES

#### UNIT – I

Marketing concept – definition – scope – Market analysis – Health care needs – factor influencing patient behaviour – market segmentation – chief determining variables – targeting and product positioning for health care services.

#### UNIT - II

Market research and information – Product service – product line – peoduct mix – product life cycle – branding – packaging – new product opportunities – product development.

#### UNIT – III

Promotion – determining promotional mix – promotional budgets – Advertising and Publicity – advertising expenditures – advertising decisions.

Pricing – factors determining prices objectives – pricing policy – new product pricing – Market Information System – Physical distribution – channel design.

#### UNIT - V

Marketing programme – market mix – product decisions – price decisions – location of hospital services and extension services – Camp organizing and planning – community health care programmes – planning and organizing medical camps – follows-up.

#### Reference:

Philip Kotler: Marketing Management – Analysis, Planning, Implementation and control.

Philip Kotler: Principles of Marketing: Prentice Hall, Eaglewood Cliffs., N.J., 1980.

Philip Kotler: Marketing for Health Care Organisations. Lovelock: Services Marketing – Text, cases and reading.

## III<sup>rd</sup> - YEAR

#### Paper - 1

#### **ENVIRONMENTAL SANITATION**

#### UNIT - I

- 1. Definition and scope of environmental Sanitation.
- 2. Rural Water supply:

Water & Health – Sources of water and their characteristics (Rain Water – surface water, ground water) – Disease transmitted through water and channels of transmission of infection – protected water supply Estimating the quantity of water required by a community wells as a source of water supply for rural areas – Selection of site for a well classification of wells – renovation fof existing wells – Study of various types of hand pumps – Infiltration gallery – pond water supply – disinfection of water supplied – water quality – collection of water samples.

#### 3. <u>Urban Water Supply:</u>

Compounds of Urban water supply system – difference between a pumped system and a gravity system – Different types of treatment (Aeration, Sadimentation, Rapid & Slow

sand filters, Die infection, PH adjustment etc.). Flouridation and defluoridation.

Domestic treatment of water – duties of a sanitary Inspector in relation to water supplies – Desalination.

#### UNIT – II: EXCRETA DISPOSAL

Public Health aspects – of Excreta disposal – requirements of a sanitary Latrine – Selection of sits for latrines – Public & House – hold Latrines – Decomposition of excreta – Types of Latrines and their constructional features – Travel of pollution from latrine pits. – Organization of Latrine Programme in rural and Urban area – Low cost Sanitation programmes.

#### **UNIT III**

#### 1. Refuse collection and Disposal:

Definition – collection and Disposal of Rubbish Various methods – (Dumping , Compositing, incineration Sanitary land fill) – Waste recycling – Planning for refuse collection & Disposal.

#### 2. Disposal of Diet:

Need for proper disposal, various methods, burning, burial, committal to sea or river, silent Tower, electric cremation – Public health aspects – emergency disposal during diseaster.

#### UNIR - IV

#### 1. Waste Water Disposal:

Public Health Importance and methods of disposal of waste water – what are liquid wastes – situations that a health inspector will come across in waste water disposal. Different methods – Soak pits, seepage pit – dispersion trench – kitchen garden drainage etc.

#### 2. Drains:

Construction – different types of drains – Methods of disposal of drained water. Sewerages: Object of sewerage – Definition of terms – types of sewers appurtenances - sewer maintenance and precaution to be taken by cleaning crew sewage treatment – primary, secondary etc. Oxidation pond, Sewage farm – trickling filter – turnoff tank.

#### UNIT - V

1.

- a. Housing: Relationship of housing to health problems of housing requirement of healthful housing types of houses Basic principles of healthful housing survey of houses smokeless chulla Rat control etc.
- b. Meaning of Terms Planning for villages and towns Existing and new master plan etc.

#### 2. Plumbing:

various fixtures used in plumbing – scope of plumbing – Water system waste system – cross connections in plumbing – tools and materials used in plumbing.

#### Paper - 2

#### **HEALTH SYSTEMS RESEARCH (STATISTICS)**

#### UNIT – I

Statistics – definition- meaning – branches – Applications and used of biostatistics in health management – statistical data – methods of data collection – classification of data – construction of frequency distribution table – tabulation of data – presentation of data.

#### UNIT – II

Measures of central tendency – mean (calculation for individual, discrete and continuous series) – median – Mode – Empirical relationship between median and deviation – coefficient of variation – uses.

#### UNIT - III

Correlation – different types of correlation – scatter diagram – correlation coefficient – rank correlation coefficient. Regression – basic concepts – linear regression – lines of regression.

Sampling techniques: Criteria of good sample – sampling designs – sample size – uses of sampling – errors in sampling.

#### UNIT - V

Probability: basic concepts. Normal distribution – binomial distribution – characteristics – Tests of significance – uses – sampling distribution – Test of proportion – Test of small sample – unpaired test – chi square test.

#### **Reference:**

Mahajan B.K: Methods of Biostatics, Kothari book.

Depot., AD Martg, Bombay.

Potti L.R: A test book of statistics, Yamuna Publications, Thiruvandram.

Leius A.E.: Biostatistics in Medicine Little Brown & Co. Boston.

### Paper - 3

## QUALITY ADMINISTRATION FOR HOSPITALS

#### UNIT – I

Quality – meaning – importance – Total Quality Management (TQM) – concepts – quality management philosophies – Seming 14 points.

#### UNIT – II

Quality plan for services organization – customer satisfaction – cost of quality – quality organizing function – organizational structure.

#### UNIT – III

Quality systems – Introduction – ISO 9000 series of standards – overview – implementation – accreditation.

Documentation process – communication system – Quality control – definition – objective – control systems – just in time.

#### UNIT - V

Quality improvement – problem solving – employee participation – instruction and measurement in service organization – Quality circle – quality evaluation – medical audit.

#### **Reference:**

James R. Evans & William M. Lindsay: The management can control of Quality, Jaico Publishing House, Bombay. William F. Roth Jr.: systems approach to quality control: Jaico publishing house Bombay. Tito Coti: Building total quality — A guide for Management, Chapmance Hall. P.L. Jain: quality control and total quality management. Tata McGraw Hill.

#### Paper – 4

#### **HOSPITAL INFORMATION SYSTEM**

#### UNIT – I

HIS – introduction – meaning – concepts – application – different computer languages – information system for decision making – its relevance to hospital design.

#### UNIT – II

Structure of HIS – formal & informal system – information networks – operational functions – information requirements – modularity concepts. Control and information for operational control – financial – material – other resource – information for management planning and control.

#### UNIT – III

Approaches to the development of HIS – bottom approach – top – down approach – process/procedure/form driven methods – quantitative methods – automated procedures

HIS Design – define the problem – objectives – information needs – information sources – development and selection of the alternative gross design – document the system concepts.

#### UNIT - V

System information services: Information centers – Current awareness services (CAS) – Selective Dissemination of Information (SDI) – online – offline – information services – online services in medical sciences.

#### **Reference:**

Gorden B. Davis & Margrath H. Oslon: Management information system – Conceptural Foundation, Structure and development., Mc Graw Hill Book Co.

Grisser Getl Data Protection in Health Information System – Considerations and Guidelines.

Bakkar A.R.: Hospital Information System Risks.

Failures and Actions., Amisterdam. Robert M Muedick & Joel E. Ross: Information System for modern management Prentice Hall India Pvt. Ltd.

#### Paper – 5

#### **HUMAN RESOURCE MANAGEMENT**

#### UNIT – I

Definition – Concepts – Scope – relation to other departments – Organization of the department – function.

#### UNIT – II

Man power planning – job analysis – job description – job description – recruitment – selection – methods of selection – Types of Interviews – types of tests – induction.

#### UNIT - III

Training & development – need for training – types & methods – performance appraisal – motivation – counseling.

Wage & Salary administration – Principles and techniques of wage fixating – job evaluation – incentive schemes – employee welfare – collective bargaining – employee participation in management.

#### UNIT - V

Labour relations – ESI Act – Factories Act – Payment of wages act – Provident fund provisions – trade union act – promotion – transfer – discipline – disciplinary procedures – planning for retirement.

#### **Reference:**

Dale S.Beach: Personal., Mac Millian Publishing Co., Mammoria C.B.: Personnel Management, Himalaya Publishers. Ptrpati P.C.: Personnel management and Industrial relations, Sulthan Chand & Co. J.B. Miner: Personal and Industrial relations – A management approach.