

SYLLABUS FOR Ph. D. ENTRANCE TEST

Subject- Clinical Nutrition and Dietetics

1. Advanced Nutrition
 - I. Carbohydrates and dietary fibre-Function, classification, sources, deficiency and toxicity
 - II. Proteins - Function, classification, sources, deficiency and toxicity
 - III. Fat & Lipids - Function, classification, sources, deficiency and toxicity
 - IV. Vitamins - Function, classification, sources, deficiency and toxicity
 - V. Minerals - Function, classification, sources, deficiency and toxicity
 - VI. Water - Function, classification, sources, deficiency and toxicity
2. Human Physiology
 - I. Digestive system
 - II. Circulatory System
 - III. Respiratory System
 - IV. Nervous System
 - V. Excretory System
 - VI. Reproductive System
3. Clinical Nutrition & Dietetics
 - I. Introduction to clinical Nutrition
 - II. Therapeutic modification of the normal diet
 - III. Nutrition in obesity, underweight and Malnutrition
 - IV. Nutrition in gastrointestinal disorders
 - V. Nutrition in cardiovascular diseases
 - VI. Nutrition in kidney and liver disorders
 - VII. Nutrition in Degenerative diseases
 - VIII. Nutrition in Special Conditions
4. Advanced Food Science
 - I. Food science & Properties of food – physical and chemical properties
 - II. Cereals and Millets
 - III. Legumes and Pulses and sugars
 - IV. Milk & milk products and fats
 - V. Egg, fish, poultry and meat
 - VI. Vegetables and fruits
5. Advanced Community Nutrition
 - I. Introduction to community nutrition
 - II. Epidemiology of nutritional disorders in community
 - III. Assessment of nutritional status
 - IV. Programmes and policies for improvement of nutritional status
 - V. National and international agencies in combating malnutrition

- VI. Challenges to community nutritional status
- 6. Nutritional Biochemistry
 - I. Metabolism of carbohydrates
 - II. Protein metabolism
 - III. Lipid metabolism
 - IV. Vitamin & minerals metabolism
 - V. Nucleotide metabolism
 - VI. Enzymology
- 7. Research Methodology and statistics
 - I. Research methods-fundamental issues, concept, need relevance, scope and ethics in research
 - II. Research methods- research designs, principles and purpose of research
 - III. Types of research, descriptive, survey, historical, qualitative, quantitative, analytical and action research, hypothesis testing, types and scope
 - IV. Sampling techniques, types of sampling, sampling procedures, probability and non-probability sampling
 - V. Selection and preparation of tools for data collection-questionnaire, interview, observation, measuring scales, ranking and measurement, reliability and validity of tools types of variables and their selection. Research methods-
 - VI. Data collection and classification, coding, tabulation, inferential and descriptive statistics analysis of data through parametric and non-parametric tests.
 - VII. Scientific report writing, presentation of data, interpretation and discussion