



AMITY UNIVERSITY

— UTTAR PRADESH —

L	T	P/S	SW/ FW	TOTAL CREDIT UNITS
4	-	2	-	05

Course Title: Therapeutic Nutrition-I

Course Code:

Credit Units: 05

Course Objectives:

To enable the students

- Understand the etiology of various diseases.
- To gain knowledge in the dietary modifications in various disease conditions

Pre-requisites:

Fundamental understanding and knowledge of Human nutrition

Student Learning Outcomes:

On completion of the course the student will be able to:

- Describe various therapeutic changes specific to disease conditions
- Discuss and apply diet therapy in the treatment of various diseases.
- Plan diets for various diseases according to required modifications.

Pedagogy for Course Delivery:

The course pedagogy will include lectures, case studies and discussion on applications of the topics covered.

Course Contents/Syllabus:

	Weightage (%)
Module I: Therapeutic Diets	15 %

<ul style="list-style-type: none"> • Therapeutic Diets – Principles, objectives and diet therapy • Review of hospital diets • Type of dietitians ,role of dietitian in the hospital and community • Patient care, diet planning and use of exchange list in nutrient calculation • Diet counseling and patient education. • Enteral and Parenteral nutrition –types, applications, types & nutrient composition of feeds, complications, merits and demerits. 	
<p>Module II Gastro Intestinal Diseases</p>	25%
<ul style="list-style-type: none"> • Diseases of Oesophagus- Esophagitis. • Disease of Stomach-Indigestion, acute and chronic gastritis and peptic ulcer • Disease of Intestine-Flatulence, constipation - atonic, spastic and obstructive, diarrhoea - acute and chronic andsteatorrhea. • Inflammatory Diseases -Diverticulosis, diverticulitis, ulcerative colitis, malabsorption syndrome - sprue. 	
<p>Module III Diabetes Mellitus and In born Error of Metabolism</p>	25%
<ul style="list-style-type: none"> • Diabetes Mellitus - Epidemiology / Incidence - Classification - symptoms. Metabolic changes: Long term & short term complications, clinical findings - diagnostic tests - glycemic index of foods, types of insulin, dietary complications, dietary modifications. • Inborn errors of Metabolism.-Etiology, symptoms and dietary treatment for • Disorders of Amino Acid Metabolism-Phenylketonuria, tyrosemia, histidinemia and maple syrup urine diseases. • Disorders of Carbohydrate Metabolism-Galactosemia, fructose and lactose intolerance. • Diseases of Adrenal Cortex and Thyroid Gland-Etiology, symptoms and dietary management of Addison disease, hypothyroidism, hyperthyroidism, hypocalcaemia and gout. 	
<p>Module IV Diseases of the Heart and Circulatory System</p>	20%
<ul style="list-style-type: none"> • Acute and chronic cardiac disorders • Risk factors of cardiac diseases • Dietary management in hypertension • Atherosclerosis • Congestive heart failure • Hyperlipoproteinemia, • Hypercholesterolemia, • Role of antioxidants in the prevention and treatment. 	

Module V Nutrition in cancer	15%
<ul style="list-style-type: none"> • Pathogenesis of cancer • Causes of cancer cell development • Metabolic and nutritional alterations in malignancy • Cancer therapy • Nutrition & eating problems in cancer. 	

List of experiments:

- Lab1-Introduction to Exchange list and Food composition tables for meal planning.
- Lab-2-Planning Home Blend Formulas for chronically ill patients with normal GI function.
- Lab-3-Diet plan for Diabetes mellitus-Non Insulin Dependent Diabetes Mellitus (NIDDM)/ Insulin Dependent Diabetes Mellitus(IDDM)
- Lab-4-Diet Plan for Gout.
- Lab-5-Diet plan for Diarrhoea / Constipation
- Lab-6-Diet Plan for Peptic Ulcer.
- Lab-7-Diet plan for Ulcerative colitis.
- Lab-8-Diet plan for Lactose intolerance.
 - Lab-9-Diet plan for CVD patient.

Assessment/ Examination Scheme:

Theory L/T (%)	Lab/Practical/Studio (%)	End Term Examination(%)
80	20	100

Assessment/ Examination Scheme:

	Continuous Assessment/ Internal Assessment				End Term Examination			Total
Theory Assessment	CT	S/V/Q	HA	A	EE			TT
Weightage (%)	10	07	08	05	70			100
Practical Assessment	LR	P	V/Q/P	A	WT	V	P	TP
Weightage (%)	10	10	05	05	20	20	30	100

Abbreviations:

CT – Class Test, S- Seminar, V- Viva, Q- Quiz, HA- Home Assignment, TT- Total Theory

LR- Lab record, WT- Written Test, P – Performance, TP- Total Practical

The total marks (out of 100) shall be the weighted average of TT and TP in the ratio of theory and lab credit units, say 4:1.

Text & References:

- Antia, F.P., Clinical Dietetics and Nutrition, Oxford University, Mumbai, 1989.
- Cornine H. Robinson, Marilyn R. Lawles, Wanda L., Chenweth, Ann Garwin, Normal and Therapeutic Nutrition, XVII Editor.
- Krause, M.V. Hunseher, M.A., Food Nutrition and Diet Therapy, W.S. Saunder's Company, Philadelphia, London, Toronto, 1980.
- Maurice, E. Shills, James, A. Olsen, Moshe Shihe, Modern Nutrition on Health and Disease, Vol. 1 & 2, VIII Edition, Lea and Pediger, Philadaiphia, 1994.
- B. Srilakshmi, Dietetics, New Age International Private Ltd.
- Davidson, S.S. Passmore, P., Branch, J.F. Humaii Nutrition and Dietetics, 9th Edition, F & Lingstons Ltd., Edinburgh and London, 1993.
- Sue Rod Williams, Nutrition and Diet Therapy, Times Mirror Mashy College Publishing St. Laws, Toronto, Boston, 1989.
- Gopalan, C., Ramshastri and Balasubramaniam, S.C. Nutritive value of Indian Foods, NIN, Hyderabad, 1994.