NUTR 322 - Assessment of Nutritional Status

COURSE SPECIFICATIONS

Course Title: Assessment of Nutritional Status.

Code: NUTR 322.

Hours: Lec – 2 Hr. Lab – 2 Hr. Cln – 0 Hr. Cr.Hr. – 3.

Prerequisite: NUTR 212, NUTR 315

Level/Semester: 2nd level – spring.

Department offering the course: Nutrition & Dietetics – Faculty of health sciences

COURSE DESCRIPTION:

The course covers various assessment activities including assessment of dietary intake using proper computer programs, anthropometric measurement suitable for different age groups, biochemical assays, physical and clinical examination. The sensitivity, reliability and reproducibility of each technique will be discussed. The students will be subjected to practical training to acquaint them with every technique.

COURSE AIM:

The course aims at giving the student the scientific knowledge to assess the nutritional status of the community and hospitalized patients. Students will gain an understanding of dietary, biochemical, anthropometric and clinical determinants used in the assessment of individuals and groups.

INTENDED LEARNING OUTCOMES OF THE COURSE (ILOs)

After completing this course, the students are expected to be able to:

Knowledge and Understanding

K1- Define the different terminology used in nutrition assessment.
K2- Name the objectives of doing a nutritional assessment.
K3- Identify the stage of clinical nutritional deficiency.
K4- Recognize the nutritional surveys types and classification.
K5- Outline different uses of data from nutrition and health surveys.
K6- Define nutrition surveillance.
K7- Express different methods both direct and indirect that are used in the assessment of nutritional status.
K8- List the advantages, limitations, and applicability of the various methods.

Intellectual Skills

I.1- Distinguish between nutritional assessment and nutritional screening.
I.2- Analyze & interpret the anthropometric assessment data.
I.3- Calculate body mass index, percent weight for height, percent height for age percent desirable body weight, percent usual weight and percent weight change.

I.4- Evaluate body composition using skin fold measurements and body composition analysis.

I.5- Interpret anthropometric indices.

I.6- Evaluate clinical data including medical history, and physical signs in assessing malnutrition.

I.7- Differentiate between different dietary studies.

Professional and Practical Skills

P.1- Select the appropriate assessment tools for specific situations and use them to evaluate an individual’s risk for common nutrient-related diseases.

P.2- Demonstrate the ability to accurately measure length, stature, body weight, skin folds and waist circumference in hospital and community settings.

P.3- Implement screening of nutritional status of an individual using the Mini Nutritional Assessment and the Malnutrition Universal Screening Tool in hospital and community settings.

P.4- Use Subjective Global Assessment to assess a patient’s nutritional status.

P.5- Practice the measurement of dietary intakes using the appropriate dietary studies techniques.

General and Transferable Skills

G.1- Assemble information from a variety of sources [library, electronic, and online resources].

G.2- Use effectively the Microsoft office package, relevant nutritional soft wares, electronic library and IT resources in studying and preparing course activities.

G.3- Develop skills in written and verbal communication and other interpersonal skills required to communicate and establish working relationships.

G.4- Use self-learning skills to prepare reports and summaries.

COURSE OUTLINE:

Week Number 1: Explaining course aims, ILOs, and assessment methods. Describing the topics that will be covered. Introduction & definitions. Nutrition Assessment: Objectives of nutrition assessment; Nutrition assessment systems.

Week Number 2: Nutritional surveys: Definitions; Objectives of nutrition survey; Uses of nutrition survey; Classification of nutrition surveys; Types of nutrition surveys; Planning & organization of nutrition surveys. Nutrition surveillance.

Week Number 3: Nutrition screening; Assessment of the nutritional status: Components of nutritional assessment.
**Week Number 4:** 4th week assessment.
Assessment of the nutritional status; Clinical Methods

**Week Number 5:** Assessment of the nutritional status: Anthropometric methods: Importance & Definitions; Advantages & disadvantages; uses.

**Week Number 6:** Anthropometric methods: Growth measurements; Measuring length, stature, head circumference and weight.

**Week Number 7:** 7th week Assessment
Anthropometric methods: Growth Charts, Weight standards

**Week Number 8:** Anthropometric methods: Measuring frame size. Height and weight indices

**Week Number 9:** Anthropometric methods: Body composition measurements; skinfold measurements. Growth monitoring, Growth charts

**Week Number 10:** Anthropometric methods: Evaluation of anthropometric indices; Classification systems to identify individuals at risk of malnutrition.

**Week Number 11:** Biochemical methods: Advantages of laboratory tests; Difficulties and limitation of laboratory tests; Examples of some biochemical measurements of nutritional status

**Week Number 12:** 12th week assessment Factors affecting the validity of measurements of blood tests; Criteria for biochemical tests suitable for fieldwork.

**Week Number 13:** Dietary Methods: reasons for measuring diets; Techniques in measuring diets

**Week Number 14:** Dietary studies: Objectives; Information needed; Types of dietary studies; Methods of dietary studies; National Dietary Studies.

**Week Number 15:** Dietary studies: Institutional or military dietary studies; Families’ dietary studies; Individual dietary studies; Dietary assessment in specific situations

**Week Number 16:** Final written exam & Practical exam.

**TEACHING AND LEARNING METHODS:**

- Interactive lectures.
- Class discussions.
## Student Assessment Methods, Schedule and Grading:

<table>
<thead>
<tr>
<th>Assessment week</th>
<th>Type of Assessment</th>
<th>To Assess</th>
<th>Week No.</th>
<th>Weighting of Assessment</th>
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<tbody>
<tr>
<td><strong>Week 1 to 7</strong></td>
<td>Quiz</td>
<td>Knowledge and understanding, and intellectual skills</td>
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<td></td>
<td>Lab Activities</td>
<td>Intellectual Skills, professional and practical skills, and general and transferable skills</td>
<td>3-6</td>
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<td>Practical exam</td>
<td>Intellectual Skills, professional and practical Skills</td>
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<tr>
<td></td>
<td>Written exam</td>
<td>Knowledge and understanding, and intellectual skills</td>
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<td><strong>Week 8 to 12</strong></td>
<td>Lab Activities</td>
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<td>Quiz</td>
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<td>10 %</td>
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<tr>
<td><strong>Week 13 to 15</strong></td>
<td>Assignments</td>
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<td><strong>Total</strong></td>
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<td>10 %</td>
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<tr>
<td><strong>Week 16</strong></td>
<td>Final practical exam</td>
<td>Professional and practical skills and intellectual Skills</td>
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<td>10 %</td>
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<td>Final Written exam</td>
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<tr>
<td><strong>Total Grade</strong></td>
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### List of References:

**Course notes**

Hand out.

Department Lab Manual.

**Essential Books (Text Books)**

Recommended books


Periodicals, Web Sites ... etc.

Students are advised to visit web pages related and which are not limited to:

Nutrition care manual: available from BAU iconnect list of online databases: http://iconnect.bau.edu.lb/tag.fca4d0921054198e.render.userLayoutRootNode.up?up_root=root&up_sparam=activeTab&activeTab=u11l1s2&up_tparam=frm&frm