

# **BSc in Nursing**

**INTEGRATED COURSE TITLE: PROFESSIONAL LABORATORY** 

**NUMBER OF ECTS CREDITS: 1** 

CODE: MEDS-24/C

MODULE CONVENOR: NOEMI GIANNETTA; ANNA BERARDI, GIANLUCA POZZUOLI

E-MAIL: noemi.giannetta@unicamillus.org; anna.berardi@unicamillus.org; gianluca.pozzuoli@aslroma2.it

https://www.unicamillus.org/personnel/giannetta-noemi-2/

#### **PREREQUISITES**

Even though there are no specific prerequisites, a basic understanding of general pathology and knowledge of human anatomy and neurophysiology are required.

#### **LEARNING OBJECTIVES**

The course aims to provide simple and interactive information on:

- Taking vital signs and evaluating the patient
- Techniques for patient mobilization and correct posture for healthcare professionals;
- Evaluation, management, and care of neurological patients.

# **LEARNING OUTCOMES**

### **Knowledge and Understanding**

At the end of the workshop, the student will be required to:

- Understand what vital parameters should be assessed in a patient and their characteristics, particularly blood pressure, heart rate, respiratory rate, temperature, and pain.
- Understand how vital parameters are measured.
- Understand the meaning of the values obtained from the detection of vital parameters.
- Understand the different types of risks present in the work environment, particularly those related to patient and/or load handling, and their implications for workers' health and safety.
- Understand the principles of ergonomics applied to the workplace, including factors related to workplace
  design, tools, and equipment, in order to reduce the risk of musculoskeletal injuries and improve workers'
  well-being.
- Understand how work organization, including factors such as resource allocation, work planning, and task rotation, can influence workers' safety and health.
- Understand the international guidelines established by the International Organization for Standardization (ISO) regarding occupational health and safety management and injury prevention.



- Understand the provisions of Law 81/2008 in Italy that regulate manual handling of loads in workplaces, including employer responsibilities and preventive measures to be adopted.
- Understand safe techniques and procedures for mobilizing and transferring patients or loads, including the correct use of aids and equipment to reduce the risk of injuries.
- Understand exercises and specific techniques aimed at improving spinal health and endurance, preventing pain and work-related musculoskeletal injuries.

## Applying knowledge and understanding

At the end of the workshop, the student will be able to:

- Correctly use vital signs methods to assess the patient
- Utilize knowledge of workplace risks, ergonomics, and international guidelines to identify and implement appropriate preventive measures, thereby reducing the risk of injuries and improving workers' health and safety.
- Apply ergonomics knowledge to critically evaluate workplace design, tools, and equipment, and propose
  any necessary modifications or improvements to create a safer and more comfortable working environment.
- Apply knowledge of Italian legislation on manual handling of loads (Law 81/2008) to ensure compliance with regulations and adopt necessary preventive measures to protect workers' health.
- Apply safe techniques and procedures for mobilization, transfers, and correct use of aids, reducing the risk of musculoskeletal injuries during these activities.
- Apply knowledge of specific exercises for the spine to correctly perform targeted exercises aimed at improving strength, flexibility, and endurance of the spine, thus preventing associated pain and injuries.
- Apply knowledge of workplace risks to proactively assess and manage potential health and safety risks for workers, implementing necessary preventive measures and safety procedures.
- Apply acquired knowledge to promote a safety culture in the workplace, effectively communicating with colleagues and staff and providing training and support to ensure compliance with regulations and best safety practices.

#### **Communication skills**

At the end of the workshop, the student will be required to orally present the core topics in an organized and coherent manner, using specific scientific language that is appropriate and relevant to the discussion topic.

# **Making judgements**

At the end of the workshop, the student will be expected to:

- Be able to independently assess patients' vital parameters, particularly blood pressure, heart rate, respiratory rate, temperature and pain
- Be able to decipher the values obtained from taking vital parameters to assess patients' conditions
- Independently assess the risks present in the workplace, considering various factors such as the nature
  of the work performed, the conditions of the work environment, and the characteristics of the workers,
  in order to identify potential hazards and adopt appropriate preventive measures.



- Critically evaluate proposed ergonomic solutions to improve the design of the workplace, equipment, and tools, and select the most appropriate ones to reduce the risk of musculoskeletal injuries and improve workers' well-being.
- Independently interpret international guidelines provided by ISO and apply them to the specific context of the workplace, adapting them to the needs and specific characteristics of the company or organization.
- Independently assess the various types of aids and devices available for mobilizing and transferring loads, and select those most suitable for the specific needs of the work and workers, ensuring safe and effective use.
- Independently adapt spine exercises to the individual needs and capabilities of workers, taking into account factors such as age, health status, and any pre-existing conditions, in order to maximize benefits and prevent injuries.

## **Learning skills**

The student will have acquired skills and learning methods suitable for deepening and improving their competencies in the field of vital signs, risk and load handling, including through consultation of scientific literature. Additionally, the student will adopt a professional behavior: an active attitude, continuous commitment, a reflective approach oriented towards self-learning, and acceptance of feedback for improvement in achieving the set objectives.

## **COURSE SYLLABUS**

- Vital signs (definition and measurement)
- Risks (definition and types in the workplace)
- Ergonomics, workplace, work organization
- International guidelines (ISO)
- Manual handling of loads in Italy (Law 81)
- Mobilization, transfers, and aids
- Exercises for the spine

## **COURSE STRUCTURE**

The Nursing degree program provides a total of 1 university educational credit (ECTS). One ECTS corresponds to 30 hours, therefore the total internship hours in the first year of the course amount to 30 hours. Attendance at professional laboratory activities is mandatory for all students enrolled in the degree program.

### **ASSESSMENT CRITERIA**

The Professional Laboratory 1 exam consists of an oral examination, and the assessment of which is an integral part of the overall evaluation of the course. All the contents indicated in the course syllabus will be assessed. The evaluation will consider the student's knowledge and understanding, ability to apply knowledge and understanding, autonomy of judgment, and communication skills, which will respectively weigh 30%, 30%, 30%, and 10% in the final score. The final grade will be determined collectively by the Commission.



The evaluation criteria considered will be: acquired knowledge; autonomy of judgment; communication skills; and learning ability. The final oral examination will be assessed according to the following criteria:

fail The candidate possesses an inadequate knowledge of the topic, makes significant

errors in applying theoretical concepts, and shows weak presentation skills.

pass The candidate possesses an adequate knowledge of the topic, good presentation

skills and ability to apply theoretical concepts.

### **OPTIONAL ACTIVITIES**

Students will have the opportunity to engage in theoretical/practical exercises and participate in seminars or laboratory activities.

#### **RECOMMENDED READING**

- Nelson, A. L., Motacki, K., & Menzel, N. (2009). The illustrated guide to safe patient handling and movement. Springer Publishing Company.
- Brunner, L. S. (2010). Brunner & Suddarth's textbook of medical-surgical nursing (Vol. 1 e 2). Lippincott Williams & Wilkins.
- Potter & Perry (2017). Fundamentals of Nursing (9a ed.) St. Louis, Missouri: Elsevier.
- Materiale da parte del docente