

# UNIVERSITÀ DEGLI STUDI DI MILANO-BICOCCA

# **COURSE SYLLABUS**

# **Clinical Specialty Nursing**

2021-2-I0101D011

## Aims

Identify the main diagnoses in diseases and organic disorders Identify outcomes in relation to their rewards. Identify nursing interventions in relation to autonomy/independence level of patient. Identify the theoretical framework that guide the choice of nursing interventions. Describe nursing care actions during some diagnostic and therapeutic procedures, according to the acquired skills.

### Contents

To introduce nursing process through the follow four-stage nursing process: <u>Assessing phase</u>, <u>Diagnosing phase</u>, Outcome phase, Implementing phase, in people who is affected by oncology, cardiology, respiratarory, neurology end infective pathology.

To introduce the bases of physiopathology and treatment of the main oncology, cardiology, respiratory, neurology end infective pathology.

#### **Detailed program**

CLINICAL SPECIALTY NURSING - A middle range theory of self-care of chronic illness. Nursing care to patients affect by cancer. Nursing care to patients undergoing bone marrow biopsy and bone marrow aspirate; the management of antineoplastic therapy; prevention and treatment of extravasation; the management of central venous catheter; total parenteral nutrition; risk management in antineoplastic handling; pain and palliative care.

Nursing care to patients affect by heart failure: congestive heart failure and myocardial infarction. Nursing to patients during: Percutaneous Transluminal Coronary Angioplasty, Central Venous Pressure measurement (PVC). Nursing care to patients affect by infectious diseases: AIDS, tuberculosis and Antimicrobial Resistance. Knowledge of the guidelines for the isolation (air, contact and droplets ways of infection). Nursing to patients affect by neurological disease: ischemic end emorragic stroke, Parkinson, motor neuron disease (MND) and epilepsy. Nursing to patients during the execution of therapeutic lumbar puncture. Nursing notes to people with acute and chronic renal failure and during hemodialysis and peritoneal dialysis. ONCOLOGY –Epidemiology of cancers, definition and features. Etiology of cancer: chemical, physical and biological factors. Prevention and early diagnosis: screening programs. The malignant diagnosis: biochemical tumor markers; diagnostic imaging; the biopsy. Staging (TNM-staging systems). Symptoms of cancer (direct and indirect). Cancer treatment (1): cancer staging depending on their potential care or treatment. Surgery. Radiotherapy. Hormone therapy. Immunotherapy Target Therapy

Autologous and allogeneic bone marrow transplantation. The new drugs. Cancer treatment (2): chemotherapy - the main antineoplastic drugs, mechanism of action, therapeutic effects. Adjuvant chemotherapy, antineoplastic combined chemotherapy protocols, palliative treatment. Administration and dosage of antineoplastic drugs; toxicity; evaluation criteria for therapy: from controlled clinical trials to bedside. Type of cancer: breast cancer; gastrointestinal cancer; lung cancer. Hematologic neoplasm: Leukemia, Lymphom and Multiple Myeloma. Palliative care. Pain therapy. The relationship with patients and caregivers. Communication of diagnosis, information and informed consent, education. RESPIRATORY DISEASES - Anamnesis and physical examination. Blood Gas Analyses. Respiratory physiopathology. Diagnostic Imaging. Bronchoscopy. Bronchial asthma. Chronic obstructive pulmonary disease. Chronic bronchitis. Emphysema. Bronchiectasis. Sarcoidosis. Pneumoconiosis. Idiopathic interstitial pneumonia. Pleurisy. Pleural effusion. Pneumothorax. Lower respiratory tract infections: communityacquired pneumonia, nosocomial pneumonia. Chronic respiratory insufficiency. Diagnosis of respiratory failure. Causes of acute respiratory failure. Oxygen therapy. Non-invasive mechanical ventilation. Tracheostomy. CARDIOVASCULAR DISEASES - Major signs and symptoms of heart disease. Diagnostic role of instrumental examinations in cardiology: standard electrocardiogram, exertional electrocardiogram, doppler echocardiogram, the 24-hour blood pressure monitoring. Cardiac catheterization and coronary angiography. Acute coronary syndromes. Angina pectoris. Arrhythmias in acute and chronic ischemic heart disease. Notes on medical and interventional therapy. Acute heart failure. Chronic heart failure. Arrhythmias in heart failure. Notes on medical treatment and electrical therapy decompensation. Pericarditis. Coxsackie. Endocarditis. Clinical and diagnostic aspects. Therapy notes. INTERNAL MEDICINE 2 - General information on infectious diseases. Germ-host interaction. Ways of transmission of infectious diseases. General principles in the approach to the problems of infections. Notes on pharmacokinetics and pharmacodynamics of antibiotics. Parenterally transmitted infectious diseases. HIV/AIDS infection. Viral hepatitis. Tuberculosis and infectious diseases to aerial transmission. Infectious disease of the respiratory tree: pneumonia and flu. CNS infections: enteroviral meningo-encephalitis and meningitis. Diarrhea and infectious diseases with oral-fecal transmission. Healthcare-associated infections and patient approach with multi resistant germs. Immunodeficiency and infectious risk .Malaria and tropical medicine. NEUROLOGY - Stroke. Epilepsy. Neurodegenerative diseases. Peripheral neuropathies and myopathies. Multiple sclerosis. Neoplasms.

#### Prerequisites

Positive evaluation in these previous exams: Fundamentals of Nursing and Midwifery Sciences; Nursing Clinical Methodology; Nursing Clinical Methodology 1; Biomedical Sciences 1; Human Phisiology.

#### **Teaching form**

Lectures. Narration. Bibliographic search. During the Covid-19 emergency period, lessons will take place in mixed mode: partial presence and asynchronous / synchronous videotaped lessons.

### **Textbook and teaching resource**

Hinkle J.L., Cheever K.H. (2017) Infermieristica medico-chirurgica, IV ed. Milano: Casa Editrice Ambrosiana, Vol. 1 e 2; Ausili D., Baccin G., Bezze S., Di Mauro S., Sironi C. (2015) L'impiego dell'ICNP® con il Modello assistenziale dei processi umani: un quadro teorico per l'assistenza infermieristica di fronte alla sfida della complessità. Copyright © 2015 CNAI, Consociazione nazionale delle Associazioni infermiere/i – Centro Italiano per la Ricerca e Sviluppo dell'ICNP; Herdman TH, Kamitsuru S. (2015) Nanda International, Diagnosi infermieristiche Definizioni e Classificazione 2015/2017. Milano: CEA; In-depth bibliography

#### Semester

2nd Year, 2nd Semester

#### **Assessment method**

There are no ongoing tests.

The final exam consists of a written part and an oral part.

The written part is composed of multiple-choice questions for the control of the preparation on the exam program.

The oral part provides an interview for the verification of critical thinking in relation to the nursing care process. In the Covid-19 emergency period the oral exams will only be online. They will be carried out using the WebEx platform and a public link will be provided on the e-learning page of the course to maintain publicity for the exams.

#### **Office hours**

On appointment