



UNIVERSITÀ  
DEGLI STUDI DI MILANO-BICOCCA

## COURSE SYLLABUS

### General Medicine

2425-6-H4101D335

---

#### Aims

The integrated course in Clinical Medicine aims to accompany the student, throughout the fifth and sixth years of the study path, in a process of clinical maturation that leads him from the acquisition of the fundamentals of the internal medicine approach to the conscious and complex management of the real patient.

The general objective of the course is to provide the student with the theoretical and practical-applicative skills necessary to address the main clinical conditions of adults and the elderly according to an integrated, person-centered and multidisciplinary approach.

In particular, the course aims to:

- Consolidate the physiopathological and clinical knowledge acquired in the early years, applying it to the real contexts of clinical medicine, through the diagnostic and therapeutic framework of the main internal medicine, oncological, infectious, cardiovascular, respiratory, hematological, hepatogastroenterological and geriatric pathologies;
- Promote the ability of clinical reasoning, encouraging the development of diagnostic hypotheses, the critical interpretation of clinical, laboratory and instrumental data, and the conscious selection of the most appropriate investigations and treatments, even in situations of uncertainty and complexity;
- Educate in the medicine of complexity, providing the tools for the global assessment of the patient affected by multimorbidity, frailty and biological and social vulnerability, with particular attention to the elderly, the cancer patient, the subject with advanced chronic diseases and with palliative needs;
- Develop an ethical, communicative and relational sensitivity, essential for the management of the doctor-patient relationship, for the sharing of decision-making paths, for the advance planning of care, and for effective interaction with family members and with the interprofessional team;
- Promote interdisciplinarity and collaboration, through participation in multidisciplinary clinical discussions, co-teaching between specialists, simulation of complex clinical cases, and continuous comparison between different areas of medicine (internal medicine, geriatrics, oncology, infectious diseases, palliative medicine and specialist medicine);
- Prepare for the clinical responsibility that awaits the future doctor at the end of the training course, through teaching that integrates theoretical knowledge with concrete experience, oriented towards the safety of care, precision medicine, risk assessment and personalization of interventions.

Through a progressive and integrated teaching curriculum between the fifth and sixth years, the course aims to

transform the student from an observer of clinical cases to an active protagonist in the diagnostic-therapeutic process, preparing him for the final exam but above all for daily medical practice.

## Contents

The contents covered in the integrated course include:

- Internal Medicine: cardiovascular diseases (heart failure, AF, arrhythmias), endocrine-metabolic diseases (diabetes, dyslipidemias), electrolyte disorders, anemias, autoimmune and rheumatological diseases, approach to the complex internal medicine patient.
- Geriatrics: geriatric syndromes (frailty, delirium, falls, sarcopenia, malnutrition), multidimensional assessment, polypharmacy and deprescribing, care planning and treatment goals.
- Medical Oncology: staging and precision medicine, main neoplasms (breast, ovary, lung, prostate, kidney), integrated and multidisciplinary management, simultaneous treatments.
- Hematology: leukemias, lymphomas, coagulation and platelet disorders, principles of treatment and management of toxicities.
- Infectious Diseases: sepsis, endocarditis, fever of unknown origin, infections in immunosuppressed patients, infections from multiresistant germs.
- Cardiology: coronary syndromes, prevention, management of cardiac amyloidosis, dual anti-aggregation, gender-specific approach.
- Pulmonology: COPD, respiratory failure, interstitial lung disease, thoracic tumors, non-invasive ventilation.
- Gastroenterology: hepatitis, cirrhosis and its complications, liver cancer, inflammatory bowel disease, pancreatitis.
- Palliative Care: identification of need, management of complex symptoms, communication and ethical aspects.

## Detailed program

Teaching of the sixth year is dedicated to the consolidation of clinical skills, with a focus on the complexity of care, specialist integration and global patient care. The contents are divided into the following modules:

### Internal Medicine 2 (A, B, C)

- Palliative care: principles, disease trajectories, complex needs, communication and bioethics
- Dysmetabolic diseases (dyslipidemia), thrombocytopenia
- Chronic heart failure: diagnosis and pharmacological and non-pharmacological therapy
- Atrial fibrillation: classification, rhythm management and prevention of thromboembolic risk
- Diabetic ketoacidosis, electrolyte disorders
- Anemias: classification, differential diagnosis and treatment

### Medical Oncology B

- Prostate cancer: screening, treatment and synergy with GPs
- Metastatic breast cancer: therapeutic approach and fertility preservation
- NSCLC lung cancer: role of the oncologist in the multidisciplinary team, liquid biopsy
- Simultaneous treatments: concepts, early activation and role of the oncologist

### Infectious Diseases 2

- Endocarditis: a multidisciplinary approach
- Fever of unknown origin
- Invasive fungal infections
- Infections of the compromised host
- Infections by multidrug-resistant microorganisms (MDR)

### Cardiology

- Arrhythmias, especially bradyarrhythmias
- Chronic coronary syndromes

- Dual antiplatelet therapy
- Cardiac amyloidosis: recognition and clinical classification
- Cardiovascular prevention and gender differences in cardiology

#### Pneumology

- COPD and asthma: stability and exacerbation, therapy and smoking cessation
- Respiratory failure and non-invasive ventilation
- Interstitial lung diseases
- Lung tumors
- OSAS and pulmonary hypertension

#### Gastroenterology C

- Chronic inflammatory bowel diseases (IBD): Crohn's, ulcerative colitis, celiac disease
- Acute and chronic hepatitis, metabolic, autoimmune, drug-induced liver diseases
- Liver cirrhosis: complications and transplantation
- Liver neoplasms: primary and secondary
- Acute and chronic pancreatitis

## Prerequisites

Knowledge related to the preparatory courses indicated in the Degree Course regulations

Preparatory courses:

- Medical-Surgical Pathology 1 - Medical-Surgical Pathology 2 - Medical-Surgical Pathology 3
- Pharmacology
- Medical Area Internship 2

## Teaching form

Lectures

Teaching under the supervision of the University

Co-teaching

## Textbook and teaching resource

Greenberger, Guida all'anamnesi ed esame obiettivo Ed. McGraw Hill

Swartz MH, La diagnosi clinica Ed. Edises 4.

Castoldi G, Liso V, Le malattie del sangue e degli organi emopoietici Ed. McGraw Hill Manuale Merck di Geriatria Ed. ESI Stampa Medica

A.E.Tammaro, G. Casale, A.Frustagia, Manuale di Geriatria e Gerontologia McGraw Hill U.Senin, Paziente anziano e paziente geriatrico EdiSES

Moroni M, Esposito R, De Lalla F, Malattie infettive Ed. Masson, 8'ed., 1993

Goodman and Gillman, Le basi farmacologiche della terapia Ed. Masson, 12'ed.

Cecil, Textbook of Medicine

## **Semester**

6th year, first Semester

## **Assessment method**

The exam takes place at the end of the Clinical Medicine course (6th year of the course).  
Written test (multiple choice quiz), oral test with open answers and discussio. of a clinical case  
For Erasmus students the exam will be oral in English (or in Italian if requested)

## **Office hours**

Appointment by email:  
giuseppe.bellelli@unimib.it

## **Sustainable Development Goals**

GOOD HEALTH AND WELL-BEING | QUALITY EDUCATION | GENDER EQUALITY

---