UNIVERSITÀ
DEGLI STUDI DI MILANO-BICOCCA

COURSE SYLLABUS

Medical Genetics

2425-1-K0101D004-K0101D016M

Aims

The student will have the opportunity to delve into recent advancements in genetics applied to medicine.

Contents

By the end of the course, the student should have acquired examples of the application of genetics in medical research and as a support to precision medicine. The course will focus on the pathogenetic and diagnostic aspects of acute lymphoblastic leukemia (ALL) as a paradigm of integrating genetics into medicine.

Detailed program

- Classification of genetic tests, role of genetic counseling, examples of clinical cases with DNA sequencing simulation.
- Oncogenetics in precision medicine:
    - Risk-based stratification in pediatric acute lymphoblastic leukemia
    - Prenatal origin of acute lymphoblastic leukemia
    - Cancer predisposition, with a focus on acute lymphoblastic leukemia

Prerequisites

Development of biology knowledge

Teaching form

Lectures in Italian, no remote teaching activities are planned
Clinical cases with simulation of DNA sequencing analysis

Textbook and teaching resource

- Teacher’s slides
- Scientific articles

Semester

second semester

Assessment method

The examination is not for the single module but it is an integrated examination for the whole course, as described in details in the Syllabus of the course

Office hours

By appointment via email

Sustainable Development Goals

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