

# UNIVERSITÀ DEGLI STUDI DI MILANO-BICOCCA

# **SYLLABUS DEL CORSO**

# **Pathology**

2324-3-H4102D020-H4102D066M

#### **Aims**

- 1) Understanding the pathology of cancer
- 2) Understanding the carcinogenic process and the transformed cell
- 3) Understanding initiation promotion progression
- 4) Understanding the tumor microenvironment
- 5) Understanding inflammation and cancer
- 6) Understanding carcinogenesis and tumor progression in breast colon and lung cancer

#### **Contents**

- 1) Cellular biochemical and molecular bases of the carcinogenic process
- 2) Carcinogens, classification, action, DNA mutations, oncogenes
- 3) Components of the tumor microenvironment : angiogenesis, stroma, matrix
- 4) Components of the tumor infiltrate: natural and adaptive immunity cells in the cancer field
- 5) Growth factors and receptors in major tumors and their microenvironment; molecular bases of targeted therapy and immunotherapy

## **Detailed program**

- 1) Cellular biochemical and molecular bases of the carcinogenic process
- 2) Carcinogens, classification, action, DNA mutations, oncogenes
- 3) Components of the tumor microenvironment : angiogenesis, stroma, matrix
- 4) Components of the tumor infiltrate: natural and adaptive immunity cells in the cancer field
- 5) Growth factors and receptors in major tumors and their microenvironment; molecular bases of targeted therapy and immunotherapy

## **Prerequisites**

Basic pathology course (II yrs), preparatory courses to the Vertical Tracks according to the regulation

## **Teaching form**

Frontal lessons

# Textbook and teaching resource

to be defined

#### Semester

second semester

#### **Assessment method**

Integrated exam

#### Office hours

on appointment

# **Sustainable Development Goals**

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