UNIVERSITÀ
DEGLI STUDI DI MILANO-BICOCCA

COURSE SYLLABUS

Biostatistics

2526-4-H4102D089-H4102D099M

Aims

The student will learn:

- the basic tools to understand scientific results in observational and experimental studies with continuous outcome, binary outcome, survival time outcome.
- how to interpret results from regression models relating aforementioned outcome to explanatory/exposure variables.

Contents

- Recap on Descriptive Statistics
- Linear Regression Model
- Logistic Regression Model
- Survival analysis

Detailed program

- Summary of descriptive statistics (main indicators and graphical representations)
- Linear regression model (with motivating examples)
- Logistic regression model (with passage from contingency table to regression)
- Survival analysis (main characteristics of survival data and non-parametric and semi-parametric modeling)

Prerequisites

Basic descriptive and inferential statistics

Teaching form

3 Standard synchronous classes with webex link, 1 offline class

Textbook and teaching resource

https://hbiostat.org/bbr/descript

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R studio sofware https://posit.co/download/rstudio-desktop/

Semester

- First semester
- From 10 to 13, LAB in Monza

Assessment method

On esamionline.elearning platform.

Type of test: multiple choice/open questions (10 questions, 3 points for each correct answer, no penalties for wrong answers), 3 additional points scored by the offline question.

If the total score is >=18 you pass.

Office hours

Under request by the elearning email, in the Webex room of the teacher.

Sustainable Development Goals

QUALITY EDUCATION | GENDER EQUALITY