



## BIostatISTICS IN HEALTH SCIENCES

January 9<sup>th</sup> to 27<sup>th</sup>, 2023 ::: 13<sup>th</sup> Edition

### Week 1

Day	Start	End	Theme
09-01-2023	09:00	10:30	Course presentation / The role of Biostatistics in Health Sciences / Basic notions
	11:00	12:30	Introduction to IBM SPSS Statistics (questionnaire database )
10-01-2023	14:00	15:30	Sampling procedures / Descriptive Statistics
	16:00	17:30	Probability Theory / Normal Distribution / Central Limit Theorem
11-01-2023	14:00	15:30	Estimation theory / Punctual and interval estimation
	16:00	17:30	Statistical hypothesis test / t-tests / One Sample t test
12-01-2023	09:00	10:30	t-tests / Two independent samples / Paired samples
	11:00	12:30	t tests / Practical exercises / Effect size / Writing results
	14:00	15:30	Analysis of Variance / One-way
	16:00	17:30	Analysis of Variance / Repeated Measures
13-01-2023	09:00	10:30	Analysis of Variance / Mixed Design
	11:00	12:30	Analysis of Variance / Practical exercises / Effect size   Writing results
	14:00	15:30	Analysis of Variance / Overall review   First week balance

### Week 2

Day	Start	End	Theme
16-01-2023	11:00	12:30	Revisions & Exercises
	14:00	17:30	Pearson Correlation Coefficient and Simple Linear Regression / Multiple Linear Regression
18-01-2023	09:00	12:30	Binary and Multinomial Logistic Regression
	14:00	15:30	Roc curves
19-01-2023	09:00	10:30	Nonparametric statistics / Mann-Whitney / Wilcoxon
	11:00	12:30	Nonparametric statistics / Kruskal-Wallis / Friedman
	14:00	15:30	Nonparametric statistics / Chi-Square (crosstabs)
	16:00	17:30	Nonparametric statistics / Pearson's Phi   Cramer's V / Spearman's rho / Kendall's tau
20-01-2023	14:00	15:30	Nonparametric statistics / Overview
	16:00	17:30	Course Balance

### Week 3

Day	Start	End	Theme
25-01-2023	09:00	12:30	Clarification and support session
26-01-2023	09:00	12:30	Clarification and support session
27-01-2023	09:00	12:30	Exam