

Course Coding(科目番号)	Year/Semester/Term(年度・学期)	Faculty Offering Course(時間割所属・時間割コード)	Eligible Student Year(開講年次)	Credits(単位数)	Weekday and Period(曜日・時限)
RDM7-156-99-1	2024whole year	Graduate School of Medical Sciences (25240)	1	2	others
Course Title(Theme)(科目名/講義題目)			Instructor(s)(担当教員)		
Training of biostatistics in clinical study(C11)			TOMIZAWA Kazuhito, Morinaga Jun		
Goals with their ratio(学修成果とその割合)					
1.Advanced expert knowledge, skill and research capability ……50% 2.Profound inter-disciplinary knowledge ……30% 3.Global perspective and ability to take initiative action ……10% 4.Social leadership drive ……10%					
Type of Class(授業の形態)	Lecture and Seminar				
Teaching Method(授業の方法)	Lecture (Q & A style), Practical use of PC & statistical software (EZR).				
Course Goals(授業の目的)	Knowledge about basic statistical methods is important for researchers to plan and execute biological/clinical study. Therefore, the aim of this course is to learn about how researchers use statistical tests through carrying out biological experiments and/or clinical studies.				
Course Learning goals(学修目標)	[A level (A水準)] Understanding study design. Performing basic statistical tests (comparing two groups, three or more groups, multivariate analysis etc). [C level (C水準)] Understanding basic statistical theory.				
Course Outline(授業の概要)	In this class, students will learn about study design, basic statistical theories, and practice basic tests using statistical software "EZR".				
Details for Individual Classes(各回の授業内容)					
No.(回)	Date(月日)	Class Theme(授業テーマ)	Brief Outline of Class(内容概略)		
1		MORINAGA Jun, [eJ-0]	Description of data		
2		MORINAGA Jun, [eJ-0]	Comparing two groups		
3		MORINAGA Jun, [eJ-0]	Comparing three or more groups		
4		MORINAGA Jun, [eJ-0]	Correlation and simple linear regression		
5		MORINAGA Jun, [eJ-0]	Contingency table analysis		
6		MORINAGA Jun, [eJ-0]	Statistical inference, bias, confounders, errors		
7		MORINAGA Jun, [eJ-0]	Statistical design 1		
8		MORINAGA Jun, [eJ-0]	Statistical design 2		
9		MORINAGA Jun, [eJ-0]	Statistical design 3		
10		MORINAGA Jun, [eJ-0]	Dataset		
11		MORINAGA Jun, [eJ-0]	Multivariate analysis 1		
12		MORINAGA Jun, [eJ-0]	Multivariate analysis 2		
13		MORINAGA Jun, [eJ-0]	Multivariate analysis 3		
14		MORINAGA Jun, [eJ-0]	Survival data analysis 1		
15		MORINAGA Jun, [eJ-0]	Survival data analysis 2		
Estimated out-of-class study time					
Required Textbook(テキスト)	Handout / sample data for statistical analysis				
Reading List(参考文献)	Indicated in each lecture.				
Enrollment Conditions(履修条件)	Bring own personal computer for statistical practice (Windows).				
Assessment Methods and Criteria(評価方法・基準)	Attendance at lectures, Q&A, and score of reports.				
Language Used in Instruction(使用言語)	Japanese				
Textbook/Material Language(教科書・資料の言語)	Japanese				
Course Based on Practical Work Experience(実務経験を活かした授業)	Not applicable				