

Master Degree DATA SCIENCE DM 270/2004
for students enrolled in a.y. 2021/2022
Curriculum DATA SCIENCE - Study Plan Biological Data Analytics

Exam number	Mandatory attendance	Course unit	Type of assessment	Course unit code	Modules	Year	Semester	Credits	Total hours	Lecture hours	Lecture credits	Exercit ations hours	Exercit ations credits	Laboratory hours	Laboratory credits	Type	Scientific-Disciplinary Sector
Curriculum Data Science																	
Study Plan Biological Data Analytics																	
1	No	Statistical Learning (C.I.)	mark	SCP7079226	Statistical Learning	I	1 semester	12	48	48	6					Core Courses	Statistics
	No				Statistical Learning	I	2 semester	12	48	48	6					Core Courses	Statistics
2	No	Fundamentals of Information Systems	mark	SCP7078720		I	1 semester	12	48	48	6					Core Courses	Computer Science
3	No	Stochastic Methods	mark	SCP7079197		I	1 semester	6	48	48	6					Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
4	No	Machine learning	mark	SCP8082660		I	1 semester	6	48	48	6					Core Courses	Computer Science
5	No	Structural bioinformatics	mark	SCP7079278		I	2 semester	6	48	32	4	16	2			Core Courses	Computer Science
6	No	Optimization for Data Science	mark	SCP7079229		I	2 semester	6	32	32	4					Core Courses	Operational Research
									16	16	2						
7	No	Introduction to Molecular Biology	mark	SCP8084903		I	2 semester	6	48	48	6					Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
Free Courses																	
						I	2 semester	6									Free courses
Optional exams of group 9*																	
9	No	Systems biology	mark	SCQ0094202		I	1 semester	6	56	40	5	16	1			Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
	No	Mathematical cell biology	mark	SCP7079297		I	1 semester	6	48	48	6					Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
	No	Omics in human disease	mark			I	1 semester	6	48	48	6					Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
Optional exams of group 10*																	
10	No	Network science	mark	SCP8082723		I	1 semester	6	48	48	6					Core Courses	Computer Science - Telecommunications
		Big Data Computing	mark			I	2 semester	6	48	48	6					Core Courses	Data Processing Systems
		Deep Learning	mark	SCP9087561		I	2 semester	6	48	48	6					Core Courses	Computer Science
	No	Biological data	mark	SCP7079337		II	1 semester	6	48	48	6					Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
8	No	Cognitive, Behavioral and Social Data	mark	SCP7079219		II	1 semester	6	32	32	4					Core Courses	Psychology of Work and Organisations
									16	16	2						
9		One course among exams of group 9				II		6								Educational activities in elective or integrative disciplines	Educational activities in elective or integrative disciplines
10		One course among exams of group 10				II		6								Core Courses	more SSD
Free credits																	
11						II	1 semester	6									Free credits
		Stage	evaluation	SCP7079232		II		15								D	Other activities
		Final examination		SCP7079319		II		15								C	Language/Final exam

KEY	
	courses offered in the a.y. 2021/2022
	courses offered in the a.y. 2022/2023
Type	
C	Language/Final exam
D	Other activities

* This course can be either taken at the first or at the second year