

GENOME ANALYSIS IN PLANTS

1	Course Title:	GENOME ANALYSIS IN PLANTS
2	Course Code:	BIO6414
3	Type of Course:	Optional
4	Level of Course:	Third Cycle
5	Year of Study:	1
6	Semester:	2
7	ECTS Credits Allocated:	5.00
8	Theoretical (hour/week):	3.00
9	Practice (hour/week):	0.00
10	Laboratory (hour/week):	0
11	Prerequisites:	None.
12	Language:	Turkish
13	Mode of Delivery:	Face to face
14	Course Coordinator:	Dr. Öğr. Üyesi FİGEN ERSOY
15	Course Lecturers:	
16	Contact information of the Course Coordinator:	e-posta: figen@uludag.edu.tr 0 224 29 41776 Fen-Edebiyat Fakültesi, Moleküler Biyoloji ve Genetik Bölümü, Görükle Kampüsü, 16059 Bursa
17	Website:	
18	Objective of the Course:	The aim of the course is to teach the methods that are used genome analysis of plants. Objective of the course is to teach new techniques and to expand the student's experimental point of view.
19	Contribution of the Course to Professional Development:	
20	Learning Outcomes:	
	1	Analyse and solve plant science and biotechnology problems using an integrated multidisciplinary approach.
	2	Integrate and evaluate critically information from various sources.
	3	Plan, conduct and write a programme of original research.
	4	Use modern information and communications technologies.
	5	Critically evaluate scientific publications.
	6	Communicate effectively through oral presentations
	7	Devise experimental methodologies for plant science and biotechnology problems
	8	Transfer techniques and solutions from one discipline to another.
	9	
	10	

21	Course Content:			
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Week	Theoretical	Practice		
1	Introduction			
2	RFLP, AFLP			
3	SSR, RAPD			
4	EST,STS			
5	Physical and genetic mapping			
6	Important plant characters			
7	Data mining in plants and their applications			
8	Gene sequencing			
9	QTL analysis			
10	Paper presentation 1&2			
11	Paper presentation 3&4			
Activites		Number	Duration (hour)	Total Work Load (hour)
Theoretical		14	3.00	42.00
11 Paper presentation 08-10				
Practicals/Labs		0	0.00	0.00
Self study and preperation		1	15.00	15.00
08 Textbooks, References and/or Other		14	Current Articles	
Homeworks		3	20.00	60.00
Projects		P	S. SRIVASTAVA A. KA. NARULA	30.00
Field Studies		0	0.00	0.00
Midterm exams		1	25.00	25.00
Others		0	0.00	0.00
TERM LEARNING ACTIVITIES		NUMBER	WEIGHT	
Final Exams		1	40.00	40.00
Total Work Load				212.00
Total work load/ 30 hr		0	0.00	7.07
Quiz				
ECTS Credit of the Course				5.00
Final Exam		1	60.00	
Total		2	100.00	
Contribution of Term (Year) Learning Activities to Success Grade		40.00		
Contribution of Final Exam to Success Grade		60.00		
Total		100.00		
Measurement and Evaluation Techniques Used in the Course				
24	ECTS / WORK LOAD TABLE			

25	CONTRIBUTION OF LEARNING OUTCOMES TO PROGRAMME QUALIFICATIONS															
	PQ1	PQ2	PQ3	PQ4	PQ5	PQ6	PQ7	PQ8	PQ9	PQ10	PQ11	PQ12	PQ13	PQ14	PQ15	PQ16
ÖK1	4	5	5	4	5	4	5	5	5	0	0	0	0	0	0	0
ÖK2	5	4	5	5	5	5	5	4	5	0	0	0	0	0	0	0
ÖK3	5	4	5	4	5	4	5	4	5	0	0	0	0	0	0	0
ÖK4	5	5	4	5	4	5	4	5	5	0	0	0	0	0	0	0
ÖK5	4	5	5	5	4	5	5	4	5	0	0	0	0	0	0	0
ÖK6	5	5	4	4	5	5	4	4	5	0	0	0	0	0	0	0
ÖK7	5	4	5	4	5	4	4	5	5	0	0	0	0	0	0	0
ÖK8	5	4	5	4	4	5	5	5	5	0	0	0	0	0	0	0
LO: Learning Objectives PQ: Program Qualifications																
Contribution Level:	1 very low		2 low			3 Medium			4 High			5 Very High				