

PALYNOLOGY

1	Course Title:	PALYNOLOGY
2	Course Code:	ORMS210
3	Type of Course:	Optional
4	Level of Course:	Short Cycle
5	Year of Study:	2
6	Semester:	4
7	ECTS Credits Allocated:	3.00
8	Theoretical (hour/week):	2.00
9	Practice (hour/week):	0.00
10	Laboratory (hour/week):	0
11	Prerequisites:	-
12	Language:	Turkish
13	Mode of Delivery:	Face to face
14	Course Coordinator:	Öğr.Gör. SİNAN BABAYİĞİT
15	Course Lecturers:	Prof. Dr. Adem BIÇAKÇI
16	Contact information of the Course Coordinator:	Öğretim Görevlisi Sinan BABAYİĞİT Uludağ Üniversitesi Büyükşehir Meslek Yüksekokulu, Orhan Mah., Dr. İbrahim Öktem Cad., No: 28, 16990 Büyükşehir/Bursa. Telefon : +90 (224) 8412439 Faks: +90 (224) 8412440 E-mail:sbabayigit@uludag.edu.tr
17	Website:	
18	Objective of the Course:	The aim of the course is to make the students learn the pollen and spore morphology in the basic of palynology and to apply the information, they learn in basic palynology, to the fields of other related with the palynology. The goals of the course are to inform the pollen and spore to the students and to use in applying palynology.
19	Contribution of the Course to Professional Development:	
20	Learning Outcomes:	
	1	To understand the formation of pollen and spores
	2	To understand the morphological properties that are using in identification of pollen grains and spores
	3	To identify pollen and spores of different taxa by morphological properties
	4	To apply basic palynological information on practical palynology
	5	To apply palynological informations to plant systematics
	6	To apply some methods for melitopalynological analysis
	7	To apply some methods for collecting atmospheric pollen
	8	To know the factors that threaten the health of workers
	9	
	10	
21	Course Content:	
	Course Content:	
Week	Theoretical	Practice

1	Palynological definition and history. Palynology contributed sciences. Study areas of palinology in thre plant kingdom			
2	Formation of spore and pollen. Pollen types, sporoderm, structure.			
3	Sculpture - Ornamentation			
4	Aperture: Place of pollen grains on the pollen. Classification of pollen grains according to apertures. Important features of apertures for systematics.			
5	Measurements and shape of pollen and spores. Spore morphology. Intine. Chemical structure of intine and exine			
6	Features of Gymnospermae pollen and morphology of Gymnospermae pollen			
7	Features of Angiospermae pollen and morphology of Angiospermae pollen			
8	Repeating courses and midterm exam			
9	Contribution of palynology to plant systematics			
10	Evaluation of articles on pollen morphology			
11	Melitopalynology: pollen analysis of honey, importance and analysis of bee collected pollen grains			
12	Aeropalynology: Amounts of pollen producing in anemogame plants, formation of allergy			
Activites		Number	Duration (hour)	Total Work Load (hour)
Theoretical	pollen analysis and importance of preparing regional pollen calendars	14	2.00	28.00
Practicals/Labs		0	0.00	0.00
Self study and preparation	pollen, fossil pollen sources, Quaternary and Stratigraphic palynology. Pollen analysis in	14	2.00	28.00
Homeworks		0	0.00	0.00
Projects		0	0.00	0.00
23 Textbooks, References and/or Other		0	0.00	0.00
Field Studies		0	0.00	0.00
Midterm Assessment		1	14.00	14.00
Others		0	0.00	0.00
Final Exams		1	20.00	20.00
Midterm Exam		1	14.00	14.00
Total Work Load				90.00
Self		0	0.00	0.00
Total work load/ 30 hr				3.00
Home work project		0	0.00	0.00
ECTS Credit of the Course				3.00
Final Exam		1	20.00	20.00
Total		2	100.00	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	5	2	3	2	0	0	0	0	0	0	0	0	0	0	0	0
ÖK2	5	2	3	2	0	0	0	0	0	0	0	0	0	0	0	0
ÖK3	5	2	3	2	0	0	0	0	0	0	0	0	0	0	0	0
ÖK4	5	2	3	2	0	0	0	0	0	0	0	0	0	0	0	0
ÖK5	2	0	0	0	5	0	0	0	0	0	0	0	0	0	0	0
ÖK6	2	0	0	0	0	0	0	0	0	5	0	0	0	0	0	0
ÖK7	2	0	0	0	5	0	0	0	0	0	0	0	0	0	0	0
ÖK8	2	0	0	0	0	0	5	0	0	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				