TEACHING OF PROBABILITY AND STATISTICS

1	Course Title:	TEACHING OF PROBABILITY AND STATISTICS
2	Course Code:	İMÖ3004
3	Type of Course:	Compulsory
4	Level of Course:	First Cycle
5	Year of Study:	3
6	Semester:	6
7	ECTS Credits Allocated:	4.00
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:	Doç. Dr. GÜL KALELİ YILMAZ
15	Course Lecturers:	Doç. Dr. GÜL KALELİ YILMAZ
16	Contact information of the Course Coordinator:	gulkaleli@uludag.edu.tr
17	Website:	
18	Objective of the Course:	The main aim of this study is to examine basic concepts in probability and statistics, and discuss contemporary teaching strategies to teach these concepts.
19	Contribution of the Course to Professional Development:	Creates and develops the knowledge base of the prospective teacher. Comprehends the concepts related to the field and the relations between concepts based on the competencies gained in secondary education. Have defines and analyzes problems related to his field, and develops solutions based on evidence and research.
20	Learning Outcomes:	

		1	Explains the importance of probability and statistics in mathematics teaching
		2	Calculates the probability of a given situation
		3	Explains the meaning of basic statistics concepts
		4	Exemplifies daily life application of probability and statistics
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21	Course Content:	

Course Content:	

Week	Theoretical	Practice
1	Data collection	
2	Data organization and analysis,	
3	Distribution concept, frequency distributions	
4	Central tendency and variability	

5	Basic concepts in probability	
6	Types of probability	
7	Probability simulations and distributions	
8	Teaching probability and statistics	
9	Teaching basic concepts about probability and statistics	
10	Misconceptions about probability and statistics	
11	Relationship of probability and statistics with daily life and other lessons	
12	Manipulatives for teaching probability and statistics	
13	Technologies for in teaching probability and statistics	
14	Example applications	

22	Textbooks, References and/or Other Materials:	Altun, M. (2018). Ortaokullarda matematik öğretimi (13. Baskı). Aktüel Yayıncılık, Bursa. Van de Walle, J.A., Karp, K.S., & Bay Williams, J.M. (2013). Elementary and middle school mathematics: Teaching developmentally. 8th Edition. Boston: Pearson.
23	Assesment	

TERM LEARNING ACTIVITIES		NUMBE	WEIGHT		
Activites			Number	Duration (hour)	Total Work Load (hour)
Theoretical Homework-project	0	0.00 14		3.00	42.00
Practicals/Labs			0	0.00	0.00
Selfstudy and preperation	2	100.00 14		2.00	28.00
Homeworks			14	2.00	28.00
Success Grade Projects			0	0.00	0.00
Field Studies			0	0.00	0.00
Total Midterm exams			100.00 1	8.00	8.00
Others			0	0.00	0.00
Course Final Exams			1	14.00	14.00
Total Work Load					128.00
Total work load/ 30 hr					4.00
ECTS Credit of the Course					4.00

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	2	4	2	3	2	5	2	2	2	2	2	2	2	3	4	2
ÖK2	2	4	1	3	2	5	4	2	2	2	2	2	2	3	4	2
ÖK3	2	4	2	3	2	5	4	2	2	2	2	2	2	3	4	2
ÖK4	4	4	2	3	2	5	4	2	2	2	2	2	2	3	4	2

LO: Learning Objectives   PQ: Program Qualifications

Contribution Level:	1 very low	2 low	3 Medium	4 High	5 Very High

Contribution Level:	1 very low	2 low	3 Medium	4 High	5 Very High