AYDIN ADNAN MENDERES UNIVERSITY
COURSE INFORMATION FORM

Course Title	Recent Researches in Mathematics Education								
Course Code	MTE504		Couse Level	Second Cycle (Master's Degree)					
ECTS Credit	8	Workload	200 *(Hours)*	Theory	3	Practice	0	Laboratory	0
Objectives of the Course	The aim of the course is to recognize scientific research in the field of Mathematics education and to make a scientific research.								
Course Content	Research methods in mathematics education students to recognize and learn about the research results made in the last ten years. Within the last ten years the methods used, theoretical approaches, changes in the type of questions that can be asked and the results obtained in terms of the changes that have occurred in the structure of the research recognize.								
Work Placement	N/A								
Planned Learning Activities and Teaching Methods	Explanation (Presentation), Experiment, Demonstration, Discussion, Case Study, Project Based Study, Individual Study								
Name of Lecturer(s)									

Assessment Methods and Criteria		
Method	Quantity	Percentage (%)
Midterm Examination	1	30
Final Examination	1	70

Recommended or Required Reading	
1	Mathematics education magazines and books, master and doctoral dissertations made in this area, articles
2	Worthen, B.R., Sanders, J. R. (2000). Educational Evaluation: Theory and Practice.
3	3. Bogdan, R.C. and S.K. Biklen. (1992). Qualitative Research for Education. USA : Allyn and Bacon Bordens,
4	4. Kenneth S. And Bruce B. Abbott. (2002). Research Design and Methods. USA : McGraw Hill.

Week	**Weekly Detailed Course Contents**	
1	Theoretical	1 Investigation of studies in mathematics education
2	Theoretical	Examining the effects of the studies done in mathematics education on the mathematics program.
3	Theoretical	Examining the effects of the studies in mathematics education on mathematics education and teaching
4	Theoretical	Examination of research methods in mathematics education in the last decade
5	Theoretical	Discussion of the results and products of the research done in the last decade
6	Theoretical	casual comperative studies
7	Intermediate Exam	midterm exam
8	Theoretical	experimental studies
9	Theoretical	Examination of the reflections of learning theories on cognitive psychology to mathematics education (Piaget, Bruner, Dewey Vygotsky et al).
10	Theoretical	Investigation of conceptual learning approach in mathematics education
11	Theoretical	Pilot implementation of teaching based on conceptual learning approach at undergraduate level
12	Theoretical	Examination of "Procept Theory"
14	Theoretical	In this framework, the application of a mathematical concept and discussion of the results of the application
15	Theoretical	Examination of "Procept Theory" 13 In this framework, the application of a mathematical concept and discussion of the results of the application
16	Final Exam	final exam

Workload Calculation				
Activity	Quantity	Preparation	Duration	Total Workload
Lecture - Theory	14	5	3	112
Midterm Examination	1	38	2	40

Final Examination	1	46	2	48
			Total Workload (Hours)	200
			[Total Workload (Hours) / 25*] = **ECTS**	8
**25 hour workload is accepted as 1 ECTS*				

Learning Outcomes	
1	1. To learn about mathematics education researches in recent years.
2	To recognize the methods and techniques used in mathematics education.
3	Field scanning and reporting.
4	Know research models, patterns and properties.
5	Be able to write the problem situation and problem sentences in researches.
6	To be able to distinguish data, data types and properties in research.
7	To be able to explain the universe, study universe, sampling, types of sampling and characteristics of the study group and the situations in which they are used.
8	Recognizing the theoretical approaches in research
9	Recognize the changes in the structure of the research in terms of the results obtained.

Programme Outcomes *(Mathematics Education Master)*	
1	Learns sufficient theoretical knowledge in the field of mathematics education
2	Uses theoretical knowledge in educational settings
3	Integrates mathematics education knowledge with the other disciplines and products functional knowledge
4	Uses information and communication technologies efficiently in conceptual learning
5	Finds scientific solutions to the problems in the field of mathematics education
6	Evaluates the knowledge critically in the field
7	Participates team projects in the mathematics education field
8	Shares national and international data in the field of mathematics education
9	Comprehends and evaluates science-technology-society and mathematics interactions
10	Comprehends mathematics under the ethical values and takes account of ethical considerations
11	Follows the current development in the mathematics education field
12	Develops strategical plans and evaluates them in the context of quality processes
13	Adopts lifelong learning strategies to his/her studies

Contribution of Learning Outcomes to Programme Outcomes *1:Very Low, 2:Low, 3:Medium, 4:High, 5:Very High*

	L1	L2	L3	L4	L5	L6	L7	L8	L9
P1	5	4	4	5	5	4	4	5	5
P2	4	4	5	5	3	4	4	4	3
P3	4	4	4	5	3	4	5	5	5
P4	4	4	4	4	4	4	5	3	4
P5	4	2	4	5	4	4	5	5	4
P6	4	2	5	5	5	3	5	5	5
P7	3	2	5	5	5	3	5	5	3
P8	3	3	5	5	5	3	4	4	3
P9	3	3	5	4	3	3	4	3	4
P10	3	3	5	5	5	5	4	3	5
P11		3	4		4	4	5	3	5
P12	4	3	4	4	4	4	5	4	3
P13	4		4		4	4	4	3	3