

<b>Subject code</b>	<b>ECTS credits</b>
MAT3020	6

**Course title in Lithuanian**

**MATEMATIKOS DĖSTYMO PLANAVIMAS IR ORGANIZAVIMAS**

**Course title in English**

**MATHEMATICAL TEACHING PLANNING AND ORGANISATION**

**Short course annotation in Lithuanian (up to 500 characters)**

Matematikos mokymo planavimo ir organizavimo dalyką sudaro tiek teorinės žinios, tiek ir praktinis jų taikymas. Išklaušę studijų dalyką studentai gebės planuoti ir organizuoti mokymą ir mokymąsi, analizuoti matematikos mokymo turinį, vertinti matematikos pamokas, remiantis matematikos mokymo bendrosiomis programomis ir standartais, mokymo rezultatais, vertinimo strategijomis. Studentai susipažins su vidurinės mokyklos 5-12 klasių vadovėliais, jų panaudojimo įvairove. Studentai gebės parengti matematikos mokymo planą (ilgalaikius, trumpalaikius, teminius, pamokos ir kt.). Taip pat jie gebės parengti planus skirtingoms mokymo situacijoms, atsižvelgiant į mokinių vertybes, bendruosius ir specialiuosius gebėjimus, taip pat gebės analizuoti, pristatyti ir vertinti suplanuotų veiklų įgyvendinimą. Studentai gebės paašškinti uždavinius ir jų sprendimo būdus. Išmanys klasikinius ir interaktyvius mokymo metodus, gebės pritaikyti technologijas savo veikloje.

**Short course annotation in English (up to 500 characters)**

The planning and organizing of mathematics teaching course consist of theoretical and practical sessions. After completing the course of planning and organizing of mathematics teaching the student will be able to plan and organize teaching and learning, to analyze the content of a mathematics teaching, to complete the assessment of mathematics lessons, access to teaching mathematics in general education programs and standards, learning outcomes, strategies of the assessment. Students will be able to analyze the school textbooks of mathematics V\_XII training area tasks, flexibility in application of measures. Students will learn to prepare mathematics teaching plans (long, short, thematic, lessons, etc.). Also they will learn to prepare the plan of the teaching of mathematics organizing situation, focusing on students' values and the general and specific skills, will analyze, present and evaluate its implementation. Students will be able to describe the math problems and their solutions. Drawing the training (learning) methods (classical and modern), modern teaching (learning), environments, the requirements of the modern teacher.

**Prerequisites for entering the course**

Study subjects of Mathematics and its Application programme

**Course aim**

To introduce planning and organizing of mathematical teaching and learning

**Links between course outcomes, criteria of learning achievement evaluation, study methods and methods of learning achievement assessment**

No	Course outcomes	Criteria of learning achievement evaluation	Study methods	Methods of learning achievement assessment
1	Ability to analyze the school textbooks of mathematics	Student demonstrates ability to analyze school textbooks, to choose problems appropriate the topic	Lectures, practical works, individual work, consulting	Test, Assessment of practical works
2	Ability to prepare plan for mathematical teaching	Student demonstrates ability to prepare plan for mathematical teaching	Lectures, practical works, individual work, consulting	Mid-term exam, Assessment of practical works
3	Ability to apply plan for different contexts, focusing on students'	Student demonstrates ability to contextualize plan, focusing on students' values and the general and specific skills	Lectures, practical works, group and	Group work presentation, assessment of practical works

	values and the general and specific skills		individual work, consulting	
4	Ability to organize mathematical teaching	Student demonstrates ability to organize mathematical teaching	Lectures, practical works, individual work, consulting	Final exam, assessment of practical works

#### Links between study programme outcomes and course outcomes

Study programme outcomes	Running number of course outcome			
	1	2	3	4
Know and understand the main theories of mathematical didactics, consolidate and integrate the main principles in education	+	+		
Summarize and evaluate critically scientific and professional literature, as well as use various tools for collecting of information for the study process and for solving fixed practical/theoretical problems	+	+	+	
Work individually and/or in groups by developing and adopting appropriate mathematical models and tools for use in case analysis		+	+	+
Demonstrate awareness of economic, legal, social, ethical and environmental context in mathematical projects		+	+	+

#### Content

No	Content (topics)
1.	Legal requirements, standards, didactical approaches
2.	Textbooks for schools, task solving methods and principles
3.	Content of secondary mathematical teaching
4.	Teaching planning. Links between outcomes, methods and assessment
5.	Mathematical teaching, focusing on students' values and the general and specific skills
6.	Organizing of mathematical teaching
7.	Non-formal teaching of mathematics
8.	Modern teaching (learning), environments, the requirements of the modern teacher

#### Distribution of workload for students (contact and independent work hours)

<b>Lectures</b>	<b>30</b>
<b>Seminars</b>	<b>15</b>
<b>Group work</b>	<b>30</b>
<b>Individual students work</b>	<b>85</b>
<b>Total:</b>	<b>160</b>

#### Structure of cumulative score and value of its constituent parts

Mid-term exam 25%, group work 15%, test 10%, final exam – 50%

#### Recommended reference materials

No	Publication year	Authors of publication and title	Publishing house	Number of copies in		
				University library	Self study rooms	Other libraries
<i>Basic materials</i>						
1	2011	Viduriniojo ugdymo bendrosios programos.	Vilnius: ŠMM	Internetinis šaltinis <a href="http://www.upc.smm.lt/suzinokime/bp/2011/">http://www.upc.smm.lt/suzinokime/bp/2011/</a>		
2	2013	Šiaučiukėnienė, L. Mokymo diferencijavimas edukacinės paradigmos kaitoje: mokslo monografija	Kaunas : Technologija		1	

3	2012	Gaučaitė, R., Kazlauskienė, A., Masiliauskienė, E., Pocevičienė, R., Rūdytė, K. Motyvavimas ir galimybių suteikimas mokymuisi.	Šiauliai: ŠU leidykla			3
4	2008	Petty, G. Įrodymais pagrįstas mokymas.	Vilnius: Tyto alba	10	20	
<b><i>Supplementary materials</i></b>						
1	2006	Šiaučiukėnienė, L. ir kt. Šiuolaikinės didaktikos pagrindai. Vadovėlis.	Kaunas: Technologija			
2	2008	Ko reikia šiuolaikiniam mokytojui? Aktualus mokytojų kvalifikacijos tobulinimo turinys	Vilnius			
3	2005	Marzano R. Naujoji ugdymo tikslų taksonomija	Žara			

**Course programme designed by**

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