Study program: Class Teacher Education

Type and level of studies: Bachelor studies, first cycle degree program

Course unit: Methodology of teaching Mathematics (lower primary)

Teacher in charge: Aleksandra Mihajlovic, PhD, Full Professor

Language of instruction: English

ECTS: 5 ECTS, mandatory

Prerequisites:

Semester: Winter semester and summer semester (V & VI)

Course unit objective

Introducing student to classroom methodology, building students skills and abilities to teach mathematics in grades one to four of primary school; building students skills and abilities to organize and manage classroom, preparing students for permanent professional development.

Learning outcomes of Course unit

Upon completion of this course, students will be able to: know and understand how children learn primary mathematics and how they construct mathematical knowledge; know the content and how to teach it, plan and implement effective teaching and learning.

Course unit contents

Theoretical and practical classes

Part 1 (1 credit): Introduction to Methodology of teaching primary mathematics. Psychological and logical aspects of mathematics teaching (mathematical thinking, reasoning). Developing interest and increasing motivation for learning mathematics in children.

Part 2 (2 credits): Methodological approach to teaching primary mathematics contents: students will study how to teach contents about sets, natural numbers and arithmetical operations, spatial and number relations, fractions, equations and inequalities, geometry and measures.

Part 3 (2 credits): Problem solving (direct and indirect methods and strategies of solving problems). Lesson planning in primary mathematics teaching. Some organizational aspects of primary mathematics teaching. One school visit.

Literature

Teaching student-centred mathematics: grades 3-5 / John A. Van de Wale; Louann H. Lovin Teaching student-centred mathematics: grades K-3 / John A. Van de Walle; LouAnn H. Lovin

Materials from lectures

Number of active t				
Lectures (including tutorials and seminars): 60	Practice: 30	Other forms of classes:	Independent work: 60 hrs	Other classes

Teaching methods

Lectures (including tutorials and seminars, class is a combination of theoretical and practical activities), independent study.

Examination methods (maximum 100 points) Exam prerequisites No. of points: Final exam No. of points: Student's activity during lectures 30 oral examination practical classes/tests written examination Project 2x1 word projects 70 Other Other

Grading system				
Grade	Number of points	Description		
10	91-100	Excellent		
9	81-90	Exceptionally good		
8	71-80	Very good		
7	61-70	Good		
6	51-60	Passing		
5	≤50	Failing		