

Magister profesor matematike/magistrica profesorica matematike

Selected qualifications

Name of qualification

Magister profesor matematike/magistrica profesorica matematike

Translated title (no legal status)

Master of Arts in teaching mathematics

Type of qualification

Diploma druge stopnje

Category of qualification

Izobrazba

Type of education

Master's education

Duration

2 years

Credits

120 credits

Admission requirements

- A completed first-cycle academic higher education programme in the field of mathematics or
- another completed first-cycle study programme in the field of mathematics, if prior to enrolment the candidate has completed the course units that are essential for further study. These course units consist of 26 ECTS credits, which candidates obtain by sitting differential examinations; or
- a completed first-cycle two-subject teacher training programme in the field of mathematics, if prior to enrolment the candidate has completed the course units that are essential for further study. These course units consist of 26 ECTS credits, which candidates obtain by sitting differential examinations.

ISCED field

Field

Izobraževalne znanosti in izobraževanje učiteljev

ISCED subfield

subfield izobraževanje učiteljev s predmetno specializacijo

Qualification level

SQF 8 EQF 7

Second level

Learning outcomes

The qualification holder will be able to: (general competences)

- communicate effectively with students in the Slovene language and lead a class (also as class teacher),
- develop social skills in students, demonstrate understanding of and proficiency in the basic procedures and principles of the counselling interview and work with students,
- create a safe and encouraging learning environment in which students feel accepted and in which difference is respected and intercultural dialogue encouraged,
- (co-)formulate clear rules for discipline and behaviour in the classroom and use appropriate strategies to deal with inappropriate behaviour, aggression and conflict,
- integrate and coordinate objectives, content and forms and methods of learning, while taking into account modern pedagogical, psychological and didactic theories (e.g. theories of learning),
- take into account the developmental characteristics and individual specificities of students and the principles and factors of successful learning: adapt teaching to the individual specificities of students in terms of previous knowledge, interests, learning styles and learning abilities,
- use teaching approaches which encourage the active participation and responsibility of students in building knowledge,
- think creatively and critically and encourage such thinking in students,
- use effective methods to encourage motivation and develop independent learning strategies in students (learning to learn),
- incorporate information and communication technologies into teaching and develop information literacy in students,
- demonstrate proficiency in and rational use of various methods to determine students' knowledge

- and achievements and monitor their progress, both in the field of knowledge and in the field of learning strategies and social skills,
- communicate effectively with teachers and other school staff and with parents and other persons responsible for students,
- work creatively and autonomously,
- participate creatively in research and development projects aimed at improving the quality of work in the field of education,
- demonstrate knowledge of basic education legislation,
- plan, monitor, evaluate and direct own professional development in the process of lifelong learning,
- carry out interdisciplinary integration of curriculum objectives and contents,

(subject-specific competences)

- demonstrate professional proficiency in the syllabuses, contents and concepts of elementary and secondary school mathematics in order to create learning conditions that enable students to build high-quality knowledge (durability, transferability, integrity),
- formulate objectives, plan and implement teaching and evaluate knowledge in the teaching of mathematics for the balanced development of mathematical knowledge in students (conceptual, procedural, problem-based and communication-based knowledge),
- demonstrate an excellent capacity to evaluate, select and use existing learning materials, teaching aids and ICT in the teaching of mathematics (graphic calculators, maths software, interactive whiteboard, internet, etc.),
- provide adequate technical literacy to students in mathematical language,
- include technical terminology from technical and theoretical subjects in the teaching of mathematics in secondary schools,
- demonstrate the highest level of proficiency in the specific organisational forms of teaching mathematics: design of project days, leading study circles (maths, logic, recreational mathematics), mentoring research projects,
- cross-curricular planning and implementation of lessons together with teachers of other subjects,
- demonstrate an excellent capacity to confront modern didactic concepts and incorporate current approaches to teaching (e.g. combined education): incorporate new elements to teaching practice in a critical and considered manner.

Assessment and completion

Examination performance is scored as follows: 10 (excellent); 9 (very good: above-average knowledge but with some mistakes); 8 (very good: solid results); 7 (good); 6 (adequate: knowledge satisfies minimum criteria); 5–1 (inadequate). In order to pass an examination, a candidate must achieve a grade between adequate (6) and excellent (10).

Progression

A condition for progression to the second year is the completion of at least 40 ECTS credits. The subjects completed must include Differential equations, Didactics of elementary school mathematics and Practical training for teaching mathematics I.

Transitions

Third-cycle doctoral study programmes (SQF level 10)

Condition for obtaining certificate

Students must complete all requirements defined by the study programme in order to complete their studies.

Awarding body

University of Maribor, Faculty of Natural Sciences and Mathematics

URL

http://www.fnm.um.si/index.php?option=com_content&view=article&id=401&Itemid=34&lang=en