

**JOSIP JURAJ STROSSMAYER UNIVERSITY OF OSIJEK
FACULTY OF MEDICINE OSIJEK**



**UNIVERSITY GRADUATE STUDY
OF MEDICAL LABORATORY DIAGNOSTICS**

LEARNING OUTCOMES AT THE LEVEL OF THE STUDY PROGRAM

Osijek, 2025.

LEARNING OUTCOMES AT THE LEVEL OF THE STUDY PROGRAM

1. Knowledge	
IU-1	1.1. Expert knowledge in biomedicine and healthcare: applies advanced knowledge from natural sciences, basic and clinical medical sciences in laboratory medicine for the purpose of analyzing, critical evaluation, finding solutions and solving specific professional problems that arise in a medical or scientific research laboratory, as well as in various other work environments.
IU-2	1.2. Expert knowledge in medical-laboratory diagnostics: applies expert knowledge in the application, implementation and evaluation of modern techniques and methods of testing biological samples in biomedical laboratories aligned with current professional guidelines for quality assurance, legal regulations and ethical principles, as well as with the requirements of good laboratory practice in medical-laboratory diagnostics.
2. Skills	
IU-3	2.1. Problem-solving and decision-making: analyze, critically evaluate, find solutions and solve specific professional problems that arise in a medical-diagnostic or scientific-research laboratory, as well as in a wider multidisciplinary environment.
IU-4	2.2. Analytical and technical skills: applies modern analytical methods, techniques and instruments during independent processing and analysis of biological samples in medical laboratories for cytology/cytopathology, cytogenetics, histology/histo-pathology, clinical biochemistry, hematology, transfusion medicine, microbiology, immunology, medical genetics, nuclear medicine, molecular diagnostics and forensics.
IU-5	2.3. Organizational skills: effectively applies financial and organizational principles and supervises the correct and critical selection of work procedures in a medical-diagnostic or scientific-research laboratory suitable for independent work and teamwork.
IU-6	2.4. Communication skills: communicates with co-workers and patients at a high level, and is trained to present and explain new professional and scientific information in the field of biomedicine and healthcare in a comprehensible way at professional and scientific meetings, with a special emphasis on laboratory medicine.
IU-7	2.5. Teamwork skills: contributes to professional and responsible behavior in the work environment in predictable and unpredictable situations, such as working in professional organizations.
IU-8	2.6. Information skills: uses modern information technologies and databases for the purpose of electronic data processing, improvement of professional knowledge and skills, and self-education.
IU-9	2.7. Research skills: critically evaluates and applies scientific knowledge and available data for the purpose of developing and applying new analytical methods and processes and improving existing ones, solving professional problems; preparation of professional and scientific publications, as well as design and management of professional and scientific projects.
3. Independence and responsibility	
IU-10	3.1. Independence: demonstrates independence in the organization and performance of professional and scientific-research tasks and the analysis of professional problems.
IU-11	3.2. Responsibility: applies the legal and ethical principles of the profession in independent work and teamwork in accordance with the rules of the profession and the Code of Ethics and Deontology of Health Workers in Medical Laboratory Activities; is continuously educated and thus contributes to the development of knowledge and skills relevant to professional development.