



**Information for
MSc. Environmental Engineering and Water Management (EEWM)
for the UBT WEB**

Why a Master of Science in "Environmental Engineering and Water Management"?

- ✓ Addresses labor market demands across public and private sectors at both national and international levels;
- ✓ Equips students with comprehensive knowledge of the analysis, assessment and management of the environment, biodiversity, the water cycle, climate change and natural resources;
- ✓ Improves students' competencies in environmental management practices, hydrological planning and environmental policy development;
- ✓ Prepares students with better practical competencies through laboratory work, scientific field trips and professional internships;
- ✓ Has an international and harmonized curriculum in accordance with European Union standards and international good practices.

Key competencies of graduate students

- Develop and implement sustainable approaches to water and natural resource management.
- Design solutions for pollution prevention and control, as well as rehabilitation of degraded areas.
- Manage water supply and wastewater treatment systems in an integrated manner.
- Ensure the efficient management of waste treatment, recycling, and disposal
- Conduct and implement environmental assessments (EIA/SEA) and environmental management plans.
- Use modern technologies, modeling tools and environmental standards in engineering and infrastructure projects.

Potential employers and/or career paths

- ✓ Environmental and water engineers in the public and private sectors, including industry and consultancy firms.
- ✓ Environmental specialist in state institutions and environmental agencies at national and regional level.
- ✓ Environmental specialist in water supply and sewage companies and water infrastructure projects.
- ✓ Experts in environmental projects, environmental rehabilitation and climate change adaptation, including those funded by the EU and international organizations.
- ✓ Scientific researcher in universities, research institutes and environmental technology companies.

- ✓ Advisors in the drafting of environmental policies and strategic planning for sustainable development.

Alumni who can serve as role models

- **Egina Malaj, Ph.D.**, AI Lead, Center of Excellence, Vancouver, British Columbia, Canada
- **Anila Shallari, Ph.D.**, Chercheur associé GRED/IRD, Greater Montpellier, France
- **Viola Saliaga, MSc.**, Project Coordinator for Legal & WFD Compliance, Austrian Development Agency, Tirana
- **Aleksander Peqini, PhD Studies**, Justus Liebig University Giessen, Germany
- **Lura Telhaj MSc.**, Environmental engineer, S.W.O.T Solution Sh.p.k; Research fellow at Justus Liebig University Giessen, Germany
- **Pranvera MZIU, Ph.D.**, Teacher, Kamëz Vocational High School, Tirana

How is the program's interdisciplinarity implemented?

During the development of this program, an interdisciplinary approach was followed, which aims to integrate analytical methods and tools from different disciplines. This approach enables the development of knowledge and innovative solutions to complex problems in the field of environment, water and natural resources. In accordance with international standards (Muster Curricula), the program combines knowledge from natural, social and applied technical sciences, the ratio between them is as follows:

- 21% Credits in Social, Economic and Political Sciences
- 22% Credits in Natural Sciences
- 57% Credits in Applied Technical and Environmental Sciences
- 18 Credits are taught in English

Which Bachelor programs are suggested for this Master

- “Environmental and Water Engineering”
- “Agricultural Sciences and Food Security”
- “Information Technology in Agriculture and Environment”
- “Landscape Planning and Architecture”
- “Forestry Engineering”, etc.

Official list of modules for each semester.

The second cycle program Master of Science (MSc.) in “**Environmental Engineering and Water Management**” will be developed for 2 (two) years or four semesters, in the second year of studies it will be divided into two profiles: **Profile I “Water Management”** and **Profile II “Natural Resources Management”**

The study program consists of a total of 120 credits (ECTS), of which 60 credits are common to both profiles, while 60 credits are specific to each profile.