

## **Why choose the master specialization Sustainable Development and Environmental Management?**

**Are you concerned about the quality of the environment you live in? Would you like to learn how social and economic development is possible while protecting the environment at the same time?** In this case the master specialization Sustainable Development and Environmental Management is for you.

This Environmental Engineering master program in English aims at training future game-changers and leaders capable to understand the integrated nature of the environmental topics and to put into practice a number of environmental management methods and techniques in order to develop a sustainable human society.

### **What will you learn throughout the years of study?**

You will learn the main elements of sustainable development such as prevention of life loss or damage of health and social wellbeing of the local community, ensuring environmental security at local level, communication in the local community, planning, organization – integration, implementation of specific action measures for various categories of local risks.

#### **Core disciplines:**

##### **1<sup>st</sup> Year:**

Fundamentals of sustainable development, Integrated environmental management systems, GIS analysis for environmental studies, Risk assessment and management of hazardous chemical substances, Air quality management, Dosimetry techniques for environmental studies and radiation protection concepts, Environmental legislation and politics at international level, Global climate changes, Integrated management of water resources and wastewater treatment procedures, Risk assessment and disaster management.

##### **Optional courses:**

Fire and explosion risk assessment OR Assessment and analysis procedures in ecological management

##### **Professional Fieldwork**

##### **2<sup>nd</sup> Year:**

Energetic resources and the environment, Management of contaminated sites, Waste management, treatment and recovery, Eco-responsible entrepreneurship and negotiation tactics, Computer-aided design for environmental protection, Ethics and methodology of scientific research, Assessment of ecosystem services, Advanced methods in sampling, preparation and analysis of environmental samples

##### **Optional courses:**

Circular economy OR Applied remote sensing

Population protection against supertoxic chemical agents OR Specific communication strategies

**Practice for the elaboration of the dissertation thesis**

**Dissertation thesis**

In order to give you the best professional training opportunities, we follow closely the requirements of the market as well as the current knowledge necessities in developing our curricula.

**What skills will you possess after completing your studies and how will these help you in the future?**

The professional skills you will develop will prepare you to:

- **Design and conduct complex environmental analyses and assessments** in order to develop and implement action strategies for a sustainable development of the society.
- **Achieve a wider perspective on the sustainable development** by integrating environmental data achieved with other socio-economic parameters to conduct qualitative and quantitative environmental analyses.
- **Use in an interdisciplinary context the specific terminology in the field of environmental management and sustainable development.**
- **Develop experimental skills in order to develop new research works.**

**Beside these key skills, you will develop even more transversal skills**, such as communication abilities, multidisciplinary teamwork capacities, analytical and critical thought on environmental problems and sustainable development.

**After graduation, you may choose various professional trajectories** such as sustainable development expert, pollution control engineer, environmental protection scientist or environmental protection engineer.

Also, you can choose to continue the **doctoral studies**, in Romania (within the Environmental Science Doctoral School) or abroad.