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Abbreviations

CDR	Corporate Digital Responsibility
CSR	Corporate Social Responsibility
D	Deliverable
EC	European Commission
ESG	Environmental, Social, Governance
EU	European Union
GRI	Global Reporting Initiative
HE	Higher Education
KPI	Key Performance Indicator
PRME	Principles for Responsible Management Education
SDGs	Sustainable Development Goals
TL	Task Leader
UN	United Nations
WP	Work Package
WPL	Work Package Leader



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Forewords

This document is the result of a very constructive and efficient collaboration between the MASUDEM program country partners: UPO (WPL), EUBA, MENDELU, ELTE, NO-GRAVITY. Thanks to all, who have actively contributed to it.

UPO, as a work package Leader for the realisation of the Contextual Study, has then setup a dedicated team of researchers for working on it. As from January 2023 the Core team has been meeting almost every week for discussions about the methodology for this task, which was presented and agreed at the kick-off meeting in Bratislava. Recognizing all the efforts and dedication of the UPO team and program country teams, Dr. Michaela Bednárová, Associate Professor at Pablo de Olavide University in Seville, Spain, UPO coordinator and WP1 leader, is willing to say thank you for your time and hard work. Special thanks to main coordinator prof. Anetta Čaplánová, full professor at the EUBA; and other local coordinators, Assoc. prof. Martina Rašticová (MENDELU); Dr. Rita Takács (ELTE); Ing. Gabriel Adámek (NO-GRAVITY); and other contributors, namely: Dr. Carmen Correa (UPO); Dr. Marta Miranda García (UPO); Dr. Ľubomír Darmo (EUBA); Dr. Nataliia Tkalenko (MENDELU); Dr. Anna Gogibedasvili (ELTE); Dr. Viktória Nagy (ELTE); Dr. Ferenc Csizovszky (ELTE); Ing. Mgr. Jozef Wallner (NO-GRAVITY).

The main objective of this report was to provide a comprehensive analysis of leading business schools and their master programs related to sustainability development and management with the aim to identify best practices which would help with the development of new masters' programs at partner countries' institutions in this field.



1 INTRODUCTION

The increasing urgency of global environmental challenges, such as climate change, biodiversity loss, and resource depletion, has led to a growing recognition of the need for the focus on sustainable development and management. Considering the current social and economic developments, master programs in sustainable development and management have become crucial for preparing future leaders, policymakers, and practitioners to address these complex issues.

In recent years, there has been a surge in interest in sustainability issues, as evidenced by the increasing number of international agreements, such as the Paris Agreement on climate change and the Convention on Biological Diversity or the United Nations' 2030 Agenda for Sustainable Development, which includes the 17 Sustainable Development Goals (SDGs) and serves as a blueprint for countries to adopt sustainable practices and develop policies that promote environmental, social, and economic well-being (UN, 2015).

This has led to a growing demand for professionals with expertise in sustainable development and management, capable of designing and implementing innovative solutions to address these challenges. Master programs in this field are designed to equip students with interdisciplinary knowledge, critical thinking skills, and practical experience required to navigate the complex landscape of sustainability challenges and contribute to the global efforts towards achieving the SDGs.

These Master programs often draw from diverse disciplines such as environmental science, economics, policy, and social sciences, providing students with a holistic understanding of the multiple dimensions of sustainable development. Through core courses, electives, and research projects, students gain necessary skills to analyse and develop effective policies, strategies, and technologies that can promote sustainable development at various scales, from local to global levels.

Furthermore, the growing attention to sustainability issues has led universities and research institutions worldwide to develop specialized programs in sustainable development and management, creating a diverse array of educational opportunities for students. These programs not only prepare students for careers in academia, government, non-governmental organizations, and the private sector but also contribute to the global effort to build a more sustainable and equitable future for all. As the world faces unprecedented environmental challenges, these programs are instruments for fostering a preparation of a new generation of professionals who are well-equipped to lead the transition towards a more sustainable and resilient future.

Therefore, this contextual study analyses the leading business schools and their master programs related to sustainability development and management with the aim to identify best practices which would help with the development of new masters' programs at partner countries' institutions in this field.



Thus, first objective is to analyse the state of the art in similar master's programs on the global and EU level. By identifying what most prestigious universities do in this matter, we can get valuable insights and learn from the best examples. Summarized findings will serve us to design new master programs in Sustainable Development and Management in partner institutions.

Nevertheless, solely observing and learning from the current practices is not sufficient to build a highly competitive new master's program, which would sustain the future with its newly identified and emerging threats. To do so, we should combine the historical data (current similar master's programs) but reflect also upon possible upcoming challenges and needs that should be addressed.

Therefore, after analysing what current practices are, we add the implications of the latest research related to corporate digital responsibility (CDR) as a necessary ingredient of sustainability and the need of soft skills training to be considered when designing a new master's program in sustainable development and management. In addition, universities offering sustainability management master programs should not only teach about sustainable aspects but sustainability should be an integrated part of diverse university processes, including research and management. Therefore, this report also provides some insights into how sustainability is anchored at the participating program country universities. Last but not least, this report points out the importance of university supporting services for students' retention in master programs and the role of non-formal education.



2 CONTEXT OF SUSTAINABILITY AND EDUCATION

Authors: Carmen Correa (UPO) and Michaela Bednárová (UPO)

This section provides a brief overview of global and European landscape related to sustainability initiatives and EU initiatives on sustainability education. It also discusses the importance of incorporating the education related to sustainability management to business schools.

2.1 Global and European Landscape Related to Sustainability Initiatives

In September 2015, countries all around the world signed up to the 2030 Agenda for Sustainable Development at the United Nations General Assembly. This agenda provides a shared blueprint for peace and prosperity for people and the planet, and it includes 17 Sustainable Development Goals (SDGs), which are an urgent call for action by all countries (UN, 2015).

Mobilization to cope with sustainability challenges has been initiated from different angles, by different collective actors and through a variety of initiatives.

For instance, as important collective actors in global sustainability, WBCSD represents a CEO-led community of over 200 of the world's leading sustainable businesses working collectively to advance sustainability and embed ESG into decision-making.

As a remarkable initiative in this regard, the UN Global Compact aims to mobilize organizations towards more sustainable patterns of behaviour, by adopting a strategic approach to advance UN Sustainable Development Goals and by aligning their strategies and operations with Ten Principles on human rights, labour, environment, and anti-corruption.

Aligned with the UN Global Compact initiative but focused on the education sector, the Principles for Responsible Management Education (PRME) initiative is a United Nations-supported initiative founded in 2007 to foster commitment around these issues in higher education with the purpose of equipping business students with the knowledge and skills required to face XXI century challenges. According to this scheme, PRME signatory academic institutions will have to work through and report on progress to six principles: purpose, values, method, research, partnership, and dialogue (PRME, 2007).

There are also initiatives conceived to help organizations be transparent and take responsibility for their impacts providing a global common language for organizations to report their impacts regarding sustainability issues (IFRS, 2022; KPMG, 2022). That is the case of the Global Reporting Initiative (GRI), which since 1997, has been working to develop guidelines for voluntary sustainability reporting, becoming today a global standard setter for impact reporting based on multi-stakeholder consultation



process and representing the provider of the world's most widely used sustainability disclosure standards.

Other proactive initiatives to address these challenges comes from the UE, which launch the European Green Deal with the aim to transform the EU into a modern, resource-efficient and competitive economy, and pursuing to ensure three main objectives: no net emissions of greenhouse gases by 2050, economic growth decoupled from resource use, and no person and no place left behind (EC, 2019).

EU's new Taxonomy Regulation is an additional example, constituting a regulatory mechanism designed to support the transformation of the EU economy to meet European Green Deal objectives, including the 2050 climate-neutrality target. Taxonomy Regulation provides a classification tool to determine which economic activities are environmentally sustainable, seeking to clarify this information for different stakeholders (companies, capital markets, policy makers, etc.) to facilitate the investment flow into those activities (EC, 2019; EC, 2020a; EC,2020b).

Climate change depicts significant risks for all entities and economic sectors, producing or exacerbating social problems and conflicts but also requiring organizations to work for climate-change mitigation and adaptation.

Thus, businesses and all organizations have to work individually and collectively to move towards sustainability and embed ESG into decision-making as well as to develop reporting systems and dashboards that help to measure and communicate progress on implementation on ESG strategy and achievement of SDGs.

As underlined in KPMG report 'Getting ready for the next wave of ESG reporting': "A robust sustainability reporting ecosystem will help businesses not only measure progress on executing their ESG strategy, but also support businesses in driving value while mobilizing capital markets to help support innovative and much-needed solutions to the many societal issues we face (KPMG, 2023, p.6)". The latest EU regulation on sustainability reporting, Corporate Sustainability Reporting Directive (CSRD) from 2023 moves to that direction. EFRAG is currently working on European Sustainability Reporting Standards, which represents a step closer to internationally recognized and generally accepted standards for this kind of disclosure (EC, 2023).

2.2 EU Initiatives on Sustainability Education

EU considers education a catalyst for the shift to a more sustainable world and society, claiming to place a strong focus on sustainability in education to facilitate green transition and move to a climate-neutral EU. In compliance with this effort, it is necessary to provide people with the knowledge, skills and attitudes required to cope with and shape the kind of insightful change that is required.



There are many EU initiatives to foster education for the green transition and sustainable development, including the Council Recommendation on learning for the green transition and sustainable development adopted in June 2022, the European Sustainability Competence Framework published in January 2022, the very Erasmus+ program and the establishment of a Community of Practice to connect schools, researchers, public authorities and other bodies using the new competence framework in 2023 (EC, 2022b; EC, 2022c).

Concerning higher education, the Council Recommendation particularly underlines the need to further embed the green transition and sustainable development into programs, syllabuses, and modules in higher education across a range of disciplines, including business studies (EC, 2022a).

Embedding sustainability issues into the curriculum, goes beyond conceptual and topical issues, and requires providing students with specific competences and skills. The European competence framework on sustainability ('GreenComp') identifies the four competence groups related to sustainability that should be acquired by learners of all ages, including: embodying sustainability values (valuing sustainability, supporting fairness, promoting nature), embracing complexity in sustainability (systems thinking, critical thinking, problem framing), acting for sustainability (political agency, collective action, individual initiative) and envisioning sustainable futures (futures literacy, adaptability, exploratory thinking) (Bianchi et al., 2022; Bianchi, 2020).

2.3 Importance of Incorporating Subjects Related to Sustainability in Universities and Business Schools

Global initiatives like the European Green Deal (EC, 2019) in response to the climate change emergency, aligned according to the claims of the UN Agenda 2030 and the proposed SDGs route map, requires taking actions in terms of fostering sustainability education at all levels and get population educated and trained to be able to cope with sustainability issues. Explicitly, the UN SDG 4 target 4.7 call for “all learners to acquire by 2030 the knowledge and skills needed to promote sustainable development, including, among others, through education for sustainable development and sustainable lifestyles, human rights, gender equality, promotion of a culture of peace and non-violence, global citizenship and appreciation of cultural diversity and of culture’s contribution to sustainable development” (UN, 2015).

This kind of education is particularly relevant in universities and business schools, which are supposed to educate students that will be future leaders, managers and workers of organizations.

This is even more necessary considering the current emphasis on Sustainable Finance in the EU. Finance and corporate reporting are supposed to be a traction to foster more sustainable patterns of behavior. Sustainable finance has been conceived as a way to deliver on the green deal and to mobilize private money to support green transition. Fulfilling the requirements of the corresponding regulation - Taxonomy Regulation adopted in 2020, Sustainable Finance Disclosure Regulation (SFDR) 2021 and



Corporate Sustainability Reporting Directive 2022 as well as the forthcoming Directive on Due Diligence will demand knowledgeable professionals in sustainable management, accounting and finance.

Recent legislative and standard-setting efforts by the US Securities and Exchange Commission (SEC), the European Financial Reporting Advisory Group (EFRAG) and the International Financial Reporting Standards (IFRS) Foundation's International Sustainability Standards Board (ISSB) provides additional evidence of the necessity to educate and train business students to deal with all these challenges.

In addition, as underlined in the Exposure Draft IFRS S2 about Climate-related Disclosure, entities may be exposed to climate change risks directly or indirectly through their value chain, but this may also create opportunities for entities focused on climate-change mitigation and adaptation (IFRS, 2022).

Moreover, as underlined by KPMG (2023), those organizations with less experimentation on reporting will have to integrate ESG into corporate risk management systems, establish a board-led governance structure, set up a due diligence process across value chain, prepare for assurance and consider short, medium, and long-term time horizons. Moreover, KPMG (2023, p.10) emphasizes that "Even those companies that are fairly advanced in their sustainability reporting are likely to require significant improvements to the way they gather, process and report data across environmental, social and governance topics across their entire upstream and downstream value".



3 METHODS FOR IDENTIFYING BEST PRACTICES IN MASTER PROGRAMS RELATED TO SUSTAINABLE DEVELOPMENT AND MANAGEMENT

Authors: Michaela Bednářová (UPO) and Marta Miranda García (UPO)

Education plays a key role in shaping individuals and societies, equipping people with the skills and knowledge they need to succeed in their personal and professional lives. To meet the evolving needs of learners, educational institutions need to continually innovate and develop new programs that are effective, engaging, and relevant. In this context, analyzing leading educational programs is essential for developing new joint educational programs that are effective and meet the current needs of learners. One of the most significant benefits of analyzing leading educational programs is the ability to identify best practices. By studying successful programs, institutions can gain valuable insights into what works when it comes to delivering high-quality education. For example, institutions can learn about innovative teaching methods, curriculum design, and assessment strategies that have been successful in other programs.

Another important benefit of analyzing leading educational programs is the timeliness and materiality/relevancy. Education is a constantly evolving field, with new technologies, teaching methods, and learning theories emerging all the time. By studying leading programs, institutions can stay up-to-date with the latest trends and developments in the field. This knowledge can then be used to develop new joint educational programs that incorporate the latest innovations.

Analyzing leading educational programs also enables institutions to benchmark themselves against others to identify gaps and possible areas of improvements.

Finally, analyzing these programs provides a framework for evidence-based program development that would be competitive, effective, and meet the current needs of learners.

3.1 Methods

The lack of a comprehensive ranking of programs focused on sustainable development and management led us to design the following methodology.

Our effort to identify the best practices of business schools in teaching these masters consisted of three steps. First, we focused on well-established and well-regarded programs from recognized universities, which offer relevant programs, even though they are frequently focused predominantly on environmental sustainability. These programs were selected based on factors such as academic reputation, curriculum focus, faculty expertise, research output, and graduate employability.

To get more insights into best practices in similar masters related to sustainability, the second and third step was to identify the best master programs based on the QS ranking for top 10 EU universities in



Social Sciences and Management and Eduniversal Ranking for sustainable management master programs.

To identify the best master's programs in sustainable development and management at business school in the EU, we started by applying the QS ranking in Social Sciences and Management to see which universities are considered the most prestigious and well-regarded in this field. The QS World University Rankings is a ranking system that evaluates universities based on a number of different factors. While this ranking system does not specifically evaluate sustainability programs, it can be a useful starting point for identifying the best master's programs related to sustainability at business schools in the EU. Thus, top 10 universities in the EU were identified and analyzed in terms of what they do regarding the Master in Sustainable Development and Management. To do so, we filtered our list to only show universities that offer a sustainability-related program at a master's level. Then, we examined the specific master's programs offered by business schools on our list and identified the modules and other relevant data such as duration, format, etc. of the program.

Finally, to complete our analysis, we tried to identify those master's, which are ranked the best. Therefore, the Eduniversal Best Master ranking was applied. This ranking classifies the 4000 best Masters and MBA programs in the world and it is determined by the survey, which takes into consideration responses from three important stakeholders' groups: deans and directors of the programs, recruiters, and graduating students. The results of the surveys from these three groups are used to determine the ranking of programs in 30 fields of study. For the purposes of our study, we used the keyword "sustainable management". All of these programs come from the 1,000 institutions represented in 154 countries selected through the Eduniversal Official Selection.

3.2 Limitations of the Methods Applied

It's important to note that while the QS ranking system can be a helpful starting point for identifying the best master's programs in sustainability at business schools, it should not be the only factor we consider. Therefore, we complemented it by the Eduniversal master ranking, which also takes into account the opinion of deans, recruiters and students and our own approach based on aspects such as academic reputation, curriculum focus, faculty expertise, research output, and graduate employability of the programs.

Nevertheless, there might be other important factors to be considered including program accreditations, alumni outcomes, etc. Therefore, future research may want to consider consulting other ranking systems, such as the Financial Times Masters in Management Ranking or the Bloomberg Businessweek Best Business Schools Ranking, or other databases, to get a more comprehensive view of the top master programs related to sustainability.



4 OVERVIEW OF THE BEST PRACTICES OF MASTER PROGRAMS RELATED TO SUSTAINABLE DEVELOPMENT AND MANAGEMENT

Authors: Anetta Čaplánová (EUBA); Ľubomír Darmo (EUBA); Martina Rašticová (MENDELU); Nataliia Tkalenko (MENDELU); Rita Takács (ELTE); Anna Gogibedavili (ELTE); Viktória Nagy (ELTE), Ferenc Csizovszky (ELTE).

This chapter identifies the best practices in delivery of master program in this area by providing an overview of top universities or master programs.

4.1 Top World Master Programs

Programs described in this section were obtained from the universities that are well-known for their academic excellence, innovation, and strong reputation in the field of sustainable development and environmental management. Selected programs discussed below offer a comprehensive and interdisciplinary approach to sustainable development, covering relevant topics such as environmental policy, economics, governance, and management. Another aspect is the faculty expertise of the faculty members associated with these programs, who often conduct cutting-edge research in the field of sustainable development. Research output is another factor considered, since universities with a strong research focus provide students with access to new knowledge, ideas, and networks in the field. Graduate employability is also very important to take into account, since programs that demonstrate strong graduate employability often provide students with the skills, connections, and resources necessary to succeed in the job market and contribute positively to the field of sustainable development. Global university rankings and recommendations by independent organizations and experts in the field of sustainable development are also considered to ensure that the selected programs have been widely recognized for their quality and impact.



4.1.1 Programs Focused on Sustainability and Management

This subsection describes the master programs related to sustainability and management. While these programs typically address environmental aspects, such as environmental management, environmental economics, or environmental policy, the diverse elective courses enable students to specialize in various fields and adopt an interdisciplinary approach.

Sustainability Master program, Harvard University, USA

This program is offered through Harvard University Extension School¹. It emphasizes an interdisciplinary approach, integrating knowledge from diverse fields such as business, policy, and science.

Key features of the program are linked to its flexibility, as the program is designed to accommodate working professionals most courses offered in the evening or online. Students can choose to study full-time or part-time and take up to five years to complete the degree.

The curriculum is based core courses, elective courses and cap stone project. The program requires 12 courses for completion. Core courses cover subjects such as environmental policy and management, ecological principles, and quantitative analysis. Elective courses allow students to customize their learning experience based on their interests and career goals. Students must also complete a capstone project demonstrating their ability to apply knowledge and skills acquired throughout the program to address a real-world environmental management problem.

Students must complete core courses designed to provide students with a solid foundation in the field and they include: Environmental Management, Sustainable Development, Principles of Environmental Science of Environmental Management.

The remaining eight courses can be selected from a wide range of electives, allowing students to customize their learning experience. Electives cover topics such as Climate Change, Conservation Biology, Environmental Economics, and Environmental Law, Urban Planning and Design and Natural Resource Management.

Students must complete a capstone project demonstrating their ability to apply knowledge and skills acquired throughout the program to address a real-world environmental management problem. The capstone project typically consists of a research paper or a practical project under the guidance of a faculty advisor.

¹ <https://extension.harvard.edu/academics/programs/sustainability-graduate-program/#outcomes>



The program emphasizes professional development, providing students with career services and resources to help them succeed in the job market after graduation and provide students abundant networking opportunities of the Harvard university.

MPhil in Environmental Policy, University of Cambridge, UK

This program² focuses on the intersection of policy, economics, and the environment, providing students with a strong foundations in environmental policy analysis.

The program is full-time and typically takes one year to complete. It consists of a combination of core courses, elective courses, and a dissertation.

Core courses cover environmental economics (Environmental Economics and Policy), environmental law (Legal Aspects of Environmental Policy), and research methods (Quantitative Research Methods).

Students can choose elective courses from a wide range of topics, such as Environmental Policy Analysis, Climate Change: Science, Economics, and Policy, Resource and Environmental Management, Planning Policy and Practice, Sustainable Development and Environmental Governance.

Students are required to complete a research-based dissertation of up to 12,000 words on a topic related to environmental policy. This allows students to apply their knowledge and skills to a specific issue and develop their research capabilities. Students work under the supervision of a faculty member and submit their dissertation during the summer term.

The program adopts an interdisciplinary approach, combining insights from economics, law, and political science, which enables students to develop a holistic understanding of environmental policies and their implementation.

Students have access to the extensive research resources of the University of Cambridge, including libraries, research centers, and academic experts in the field of environmental policy.

The Department of Land Economy, which provides the program, offers a wide range of career support services to help students find internships, job opportunities, and further study options. Students can also connect with alumni and other professionals in the field through networking events and seminars.

MSc in Environmental Economics and Climate Change, London School of Economics and Political Science, UK

² <https://www.landecon.cam.ac.uk/postgraduate-study/environmental-policy>



This program³ offers a rigorous grounding in environmental economics and policy analysis, with an emphasis on climate change. It is designed for students seeking careers in environmental policy-making, consulting, and research.

The program is full-time and typically takes one year to complete.

The MSc in Environmental Economics and Climate Change program consists of core courses, elective courses, and a dissertation. The curriculum covers topics such as environmental and resource economics, climate change economics, and policy, econometrics, and environmental valuation. Students are required to take the following core courses: Environmental and Resource Economics, Environmental and Climate Change: Science, Economics, and Policy, Introductory Course in Mathematics and Statistics (a pre-sessional course, non-assessed), Econometrics for Environmental Economics (half unit)

Students can choose elective courses from a wide range of topics to tailor their studies according to their interests and career goals. Elective courses include, e.g., Environmental Valuation: Principles, Techniques, and Applications, Energy and Climate Policy, Advanced Topics in Environmental Economics and Climate Change, Environmental Regulation: Implementing Policy.

Students are required to complete a research-based dissertation of up to 10,000 words on a topic related to environmental economics and climate change. The dissertation allows students to apply their knowledge and skills to a specific issue and develop their research capabilities.

The program adopts an interdisciplinary approach, drawing on insights from economics, policy, and climate science. This enables students to develop a holistic understanding of environmental and climate change issues.

LSE offers a range of career support services to help students find internships, job opportunities, and further study options. Students can also connect with alumni and other professionals in the field through networking events and seminars.

MSc in Nature, Society, and Environmental Governance, University of Oxford, UK

The program⁴ examines the complex relationship between humans and the environment, focusing on governance, policy, and management. It aims to provide students with an interdisciplinary understanding of the complex relationships between society, nature, and environmental governance. The program is

³ <https://www.lse.ac.uk/study-at-lse/Graduate/degree-programmes-2023/MSc-Environmental-Economics-and-Climate-Change>

⁴ <https://www.ox.ac.uk/admissions/graduate/courses/msc-nature-society-and-environmental-governance>



offered by the School of Geography and the Environment and focuses on critical social science perspectives and policy-relevant research.

The program is full-time and typically takes one year (three terms) to complete.

The program offers a curriculum that combines core courses, elective courses, and a research dissertation. The curriculum covers a wide range of topics, including environmental governance, political ecology, sustainable development, and conservation. All students are required to take core courses that provide a foundation in environmental governance (Foundations in Nature), political ecology (Society, and Environmental Governance), and research methods (Research Methods in Nature, Society, and Environmental Governance).

Students can choose from a wide range of elective courses offered by the School of Geography and the Environment and other departments within the University of Oxford. Elective courses cover various topics, such as climate change, biodiversity conservation, and environmental economics.

As part of the program, students are required to complete a research dissertation (15,000 words) on a topic related to nature, society, and environmental governance. The dissertation provides an opportunity for students to apply their knowledge and skills to a specific research question and develop their research capabilities.

The program offers an optional two-week field course, which provides students with hands-on experience in conducting research on environmental governance and policy issues. The field course typically takes place in a European country and offers an opportunity for students to engage with local stakeholders and organizations working on sustainability challenges.

The University of Oxford offers various career support services, including internship opportunities, job placement assistance, and networking events. Students can connect with alumni and other professionals working in the field of nature, society, and environmental governance through seminars, conferences, and workshops.

Master of Environmental Management, Yale University, USA

Yale's School of the Environment offers a flexible curriculum that allows students to focus on areas such as ecosystem conservation, climate change adaptation, and sustainable development.

The Master of Environmental Management program at Yale University⁵ is offered by the Yale School of the Environment. It aims to provide students with the knowledge and skills needed to address complex

⁵ <https://environment.yale.edu/academics/masters/mem>



environmental challenges and contribute to sustainable development through leadership roles in various sectors.

The program is full-time and typically takes two years to complete.

The program offers a flexible and interdisciplinary curriculum, allowing students to tailor their studies according to their interests and career goals. The program covers topics such as environmental policy, ecosystem science, natural resource management, and environmental economics.

All students are required to take core courses that provide a foundation in environmental science, policy, and management. Core courses include: Foundations of Environmental Policy and Politics, Environmental Economics, Environmental Law and Policy, Ecosystem Science and Management.

Students can choose from a wide range of elective courses offered by the Yale School of the Environment and other departments within Yale University. Electives cover topics such as climate change, renewable energy, environmental justice, and conservation biology.

Students have also the option to pursue one or more specializations, which provide focused expertise in specific areas of environmental management. The examples of specializations include: Climate Change Science and Solutions, Conservation and Development, Energy and the Environment, Sustainable Land and Water Resources Management, Urban Ecology and Environmental Design.

The program requires students to complete a capstone project, which allows them to apply their knowledge and skills to real-world environmental challenges. Students can choose from various capstone formats, such as research papers, policy memos, or multimedia projects.

Master of Development Practice, University of California, Berkeley, USA

The Master of Development Practice program at the University of California⁶, Berkeley, is a professional degree program designed to provide students with the skills and knowledge necessary to pursue careers in sustainable development. The interdisciplinary curriculum focuses on a range of topics, including economics, environmental science, public health, and social policy.

The program is full-time and typically takes two years to complete.

The program offers a comprehensive and interdisciplinary curriculum that covers core courses, electives, and practical experiences, such as internships and a capstone project.

⁶ <https://mdp.berkeley.edu/>



All students are required to take core courses that provide a foundation in development practice. Core courses include: Introduction to Development Practice, Economics for Development, Quantitative Methods for Development Practice, Sustainable Development Goals.

Students can choose from a wide range of elective courses offered by various departments within UC Berkeley, depending on their interests and career goals. Elective courses cover various topics related to sustainable development, such as: Climate Change and Energy, Food Systems and Agriculture, Global Health.

As part of the program, students are required to complete a summer internship between their first and second years of study. The internship provides hands-on experience in the field of development practice and helps students build their professional networks.

In their final semester, students work in teams to complete a capstone project that addresses a real-world development challenge. The capstone project provides an opportunity for students to apply their knowledge and skills to practical problems and develop their project management and teamwork abilities.

The program is delivered through a combination of lectures, seminars, and workshops. Students also have access to resources and support from UC Berkeley's faculty and research centers, such as the Blum Center for Developing Economies.

UC Berkeley offers various career support services, including internship opportunities, job placement assistance, and networking events. Students can connect with alumni and other professionals working in the field of sustainable development through seminars, conferences, and workshops.

MSc in Environmental Sciences, ETH Zurich, Switzerland

The program⁷ offers a comprehensive education in environmental sciences, with a focus on sustainable development, ecosystem management, and environmental policy.

The MSc in Environmental Sciences program aims to provide students with a comprehensive understanding of environmental issues and equip them with the skills needed to address complex sustainability challenges. The program adopts an interdisciplinary approach, combining insights from various fields such as earth sciences, ecology, and environmental economics.

The program is full-time and typically takes two years (120 ECTS) to complete.

⁷ <https://ethz.ch/en/studies/master/degree-programmes/system-oriented-natural-sciences/environmental-sciences.html>



The program offers a flexible and interdisciplinary curriculum, allowing students to tailor their studies according to their interests and career goals. The curriculum covers a wide range of topics, including environmental systems, natural resource management, climate change, and pollution.

All students are required to take core courses that provide a foundation in environmental science and policy, which include: Environmental Systems and Processes, Environmental Data Analysis, Environmental Sciences Colloquium.

Students can choose from a wide range of elective courses offered by ETH Zurich. Elective courses cover various topics, such as environmental economics, ecosystem services, and sustainable development.

The MSc in Environmental Sciences program allows students to choose from various specializations, which provide focused expertise in specific areas of environmental studies. The examples of specializations include: Atmosphere and Climate, Biogeochemistry and Pollutant Dynamics, Ecology and Evolution, Environmental Policy and Economics, Human-Environment Systems, Remote Sensing and Geoinformation.

As part of the program, students are required to complete a Master's thesis (30 ECTS) in their chosen specialization. The thesis project provides an opportunity for students to apply their knowledge and skills to a specific research question, and develop their research capabilities.

Master in Sustainable Development, Uppsala University, Sweden

This program⁸ combines natural sciences, social sciences, and humanities to provide students with a holistic understanding of sustainable development.

It is designed to provide students with the interdisciplinary knowledge and skills needed to address complex sustainability challenges. The program is offered jointly by the Department of Earth Sciences and the Department of Economics, combining natural and social science perspectives on sustainable development.

The program is full-time and typically takes two years (120 credits) to complete. The curriculum of the Master in Sustainable Development program is designed to provide a comprehensive understanding of sustainable development through a combination of core courses, elective courses, and a master's thesis.

All students are required to take core courses that cover essential topics in sustainable development, such as environmental economics, systems ecology, and environmental policy. Core courses include:

⁸ <https://www.uu.se/en/admissions/master/selma/utbplan/?pKod=THU2M>



Natural Resources and Sustainable Development, Environmental Economics, Earth System Science, Environmental Policy and Development.

Students can choose elective courses from a wide range of topics to tailor their studies according to their interests and career goals. Elective courses cover areas such as energy systems, climate change, environmental governance, and sustainable land and water management.

The Master in Sustainable Development program adopts an interdisciplinary approach, drawing on insights from fields such as earth sciences, economics, and policy. This enables students to develop a holistic understanding of sustainable development issues and prepare for careers in various sectors, including government, NGOs, and the private sector.

In the final semester of the program, students are required to complete a master's thesis (30 credits) on a topic related to sustainable development. The thesis provides an opportunity for students to apply their knowledge and skills to a specific research question, and develop their research capabilities.

The program has a strong international focus, with students and faculty from diverse backgrounds. This provides a rich learning environment where students can exchange ideas and learn about sustainability challenges from different perspectives.

Master of Environment, Australian National University (ANU), Australia

This program⁹ offers a flexible curriculum, allowing students to focus on areas such as environmental policy, biodiversity conservation, and climate change adaptation.

The program is designed to provide students with an interdisciplinary understanding of environmental issues and equip them with the skills needed to address complex sustainability challenges. It is offered by the Fenner School of Environment and Society, which is known for its research expertise in environmental and sustainability sciences.

The program is full-time and typically takes two years to complete. Part-time study options are also available for domestic students.

The program offers a flexible and interdisciplinary curriculum, allowing students to tailor their studies according to their interests and career goals. The curriculum covers a wide range of topics, including environmental policy, natural resource management, climate change, and conservation biology.

⁹ <https://programsandcourses.anu.edu.au/program/MENVI>



All students are required to take core courses that provide a foundation in environmental science and policy. Core courses include: Environmental Science and Policy, Environmental Policy and Management, Environmental Science Research Methods.

Students can choose from a wide range of elective courses offered by the Fenner School of Environment and Society and other departments within ANU. Elective courses cover various topics, such as environmental economics, water resource management, and renewable energy.

The Master of Environment program allows students to choose from various specializations, which provide focused expertise in specific areas of environmental studies. Some examples of specializations include: Climate Science and Policy, Environmental Policy, Sustainable Development, Water Science and Policy.

As part of the program, students can undertake a research project, providing an opportunity to apply their knowledge and skills to real-world environmental challenges. Students can work with faculty members or external organizations on research projects aligned with their interests and career goals.

MSc in Environmental Sciences, Wageningen University & Research, the Netherlands

The program emphasizes the development of innovative solutions to pressing environmental problems, with a focus on the management of natural resources and the environment¹⁰.

The program aims to provide students with a comprehensive understanding of environmental issues and equip them with the skills needed to address complex sustainability challenges. The program adopts an interdisciplinary approach, combining insights from various fields such as ecology, environmental economics, and policy.

The program is full-time and typically takes two years (120 ECTS) to complete.

The program offers a flexible and interdisciplinary curriculum, allowing students to tailor their studies according to their interests and career goals. The curriculum covers a wide range of topics, including environmental management, climate change, biodiversity, and pollution.

All students are required to take core courses that provide a foundation in environmental science and policy. Core courses include: Environmental Science and Systems, Environmental Quality and Governance, Advanced Environmental Sciences.

¹⁰ <https://www.wur.nl/en/Education-Programmes/master/MSc-programmes/MSc-Environmental-Sciences.htm>



Students can choose from a wide range of elective courses offered by Wageningen University & Research. Elective courses cover various topics, such as environmental economics, ecosystem services, and sustainable development.

The MSc in Environmental Sciences program allows students to choose from various specializations, which provide focused expertise in specific areas of environmental studies. Some examples of specializations include: Aquatic Ecology and Water Quality Management, Climate Studies, Environmental Policy and Economics, Soil, Water, and Atmosphere.

As part of the program, students are required to complete a thesis project (36 ECTS) and an internship (24 ECTS). The thesis project provides an opportunity for students to apply their knowledge and skills to a specific research question, while the internship offers practical experience in a professional setting related to their area of interest.

4.1.2 Programs Focused on Development and Economics

Master programs in Development Economics are designed to provide students with a comprehensive understanding of economic development, its challenges, and potential solutions. These programs typically offer a diverse range of courses that cover various aspects of development economics.

MSc in Development Studies, London School of Economics and Political Science, UK

The MSc program in Development Studies focuses on the political, economic, and social dimensions of development¹¹. The program is designed for students who are interested in understanding the complex processes of development and the challenges faced by developing countries.

Students can choose from a wide range of elective courses, allowing them to specialize in specific areas of interest.

LSE is known for its strong research focus and international academic reputation, making it a top choice for students interested in development economics.

The program is full-time and typically takes one year to complete. The program offers a structured and rigorous curriculum that covers core courses as well as elective courses in specialized areas. The program offers a comprehensive and interdisciplinary curriculum that covers core courses in

¹¹ <https://www.lse.ac.uk/study-at-lse/Graduate/degree-programmes-2023/MSc-Development-Studies>



development theory and practice, as well as elective courses that allow students to explore specific topics in-depth.

All students are required to take core courses that provide a foundation in development theory and practice. Core courses include: Development: History, Theory and Policy, Political Economy of Development, Research Methods for Development.

Students can choose from a wide range of elective courses offered by the Department of International Development and other departments within LSE. Elective courses cover various topics related to development, such as: Economic Development Policy, Gender and Development, Global Health and Development, Conflict and Development.

As part of the program, students are required to complete a dissertation (on a topic related to development). The dissertation provides an opportunity for students to apply their knowledge and skills to a specific research question and develop their research capabilities. The program is delivered through a combination of lectures, classes, and seminars.

MA in Public Administration in International Development, Harvard University, USA

The Harvard Kennedy School at Harvard University offers a Master in Public Administration in International Development program¹², which is designed for students who are committed to careers in international development and public service. The program focuses on providing rigorous training in economics, political science, and management, equipping students with the skills and knowledge needed to tackle pressing global challenges and promote sustainable development.

The program is full-time and typically takes two years to complete. The program offers a comprehensive and interdisciplinary curriculum that covers core courses in economics, political science, and management, as well as elective courses that allow students to explore specific topics in-depth.

All students are required to take core courses that provide a foundation in the theory and practice of international development. Core courses include: Microeconomic Theory and Public Policy, Macroeconomic Theory and Policy, Econometrics and Quantitative Methods, Management, Finance, and Regulation of Public Infrastructure, Political and Economic Development.

Students can choose from a wide range of elective courses offered by the Harvard Kennedy School and other departments within Harvard University. Elective courses cover various topics related to

¹² <https://www.hks.harvard.edu/educational-programs/masters-programs/master-public-administration-international-development>



international development, such as: Global Health and Development, Education and International Development, International Trade and Investment Policy, Human Rights and Development.

As part of the program, students are required to complete a summer internship between their first and second years of study. This internship provides hands-on experience in the field of international development and helps students build their professional networks.

In their final semester, students work on a capstone project that addresses a real-world development challenge. The capstone project provides an opportunity for students to apply their knowledge and skills to practical problems and develop their project management and teamwork abilities.

The program is delivered through a combination of lectures, seminars, workshops, and case studies. Students will also have access to resources and support from Harvard University's faculty and research centers, such as the Center for International Development.

MPhil in Economics for Development, University of Oxford, UK

The University of Oxford offers a nine-month MPhil in Economics program¹³, which allows students to specialize in development economics. This program provides students with a solid grounding in economic theory, econometrics, and various areas of applied economics. Students specializing in development economics will study topics such as poverty, inequality, human development, and economic growth.

The program provides a comprehensive and rigorous training in economic theory, econometrics, and various areas of applied economics. Students specializing in Development Economics will study topics such as poverty, inequality, human development, and economic growth.

The MPhil in Economics program offers a structured and rigorous curriculum that covers core courses in economic theory and econometrics, as well as elective courses in specialized areas, including Development Economics.

All students are required to take core courses that provide a strong foundation in economic theory and econometrics. Core courses include: Microeconomics, Macroeconomics, Econometrics.

¹³ <https://www.ox.ac.uk/admissions/graduate/courses/msc-economics-development>



Students can choose from a wide range of elective courses related to this field, such as: Development Economics: Micro Aspects, Development Economics: Macro Aspects, Political Economy of Institutions and Development.

The degree is formally assessed through examination at the end of the summer term. This comprises four written papers: microeconomic theory, macroeconomic theory and international trade, quantitative methods, and development economics. The dissertation is also to be prepared.

The program is delivered through a combination of lectures, classes, and seminars. Students will also attend weekly workshops where they can present and discuss their research with peers and faculty members.

Master's degree program in Economics and Finance and Sustainability, The Ca' Foscari University of Venice, Italy

This program is designed to provide students with a strong foundation in economic and financial theory, as well as an understanding of the principles and practices of sustainable development¹⁴. The program is full-time and typically takes two years to complete.

The program offers a comprehensive curriculum that covers core courses in economics and finance, along with electives focusing on sustainability and related topics.

All students are required to take core courses that provide a strong foundation in economics and finance. Core courses include: Advanced Microeconomics, Advanced Macroeconomics, Econometrics, Financial Economics.

Students can choose from a range of elective courses offered by the Department of Economics and other departments within the university. Elective courses related to sustainability may include: Environmental and Resource Economics, Climate Change Economics and Policy, Sustainable Finance, Energy Economics, Environmental Policy and Governance.

As part of the program, students are required to complete a Master's thesis, which provides an opportunity to apply their knowledge and skills to a specific research question related to economics, finance, and sustainability.

¹⁴ <https://www.unive.it/pag/43595>



The program is delivered through a combination of lectures, seminars, and workshops. Students will have access to resources and support from the university's faculty and research centers.

4.2 Top EU Master Programs

To complete our analysis of the best practices, we provide an overview of universities in the European Union regarding the creation and development of master's educational programs in sustainable management. Ten programs were selected from the top EU universities based on the QS Ranking in the field of Social Sciences and Management.

4.2.1 Programs Focused on Sustainability and Management

While this category focuses mostly on environmental aspects, reflecting the close association between sustainability and environmental sustainability, a wide range of elective courses enable students to adopt an interdisciplinary approach.

The MSc in Global Business & Sustainability, Erasmus University Rotterdam, The Netherlands

The MSc in Global Business & Sustainability program¹⁵ is designed to provide students with knowledge, skills, and attitude for meaningful careers in a new paradigm of business such as creating new business solutions to tackle a real societal problem and pitch it to a multi-stakeholder jury. The elective portfolio is updated annually to reflect the fast-changing business sustainability landscape and is closely connected with practice.

The program curriculum covers a wide range of topics, including sustainable supply chain management, corporate social responsibility, sustainable finance, sustainable marketing, and environmental management. In addition to these core topics, students can choose from a variety of elective courses to tailor the program to their individual interests and career goals. Core courses are compulsory and will be offered during the autumn semester (26 EC). Master electives (18 EC) are offered during the spring semester, of which one elective can be chosen from another MSc program. During the year, students work on a master thesis project (16 EC).

Students understand organizations embedded within sustainable socio-ecological systems. They learn tools and frameworks that enable applying knowledge to create sustainability solutions. Also, students discover how all of this works in practice through extensive alumni network of global change makers including CEOs, governmental politicians, professors, and social entrepreneurs. Students also can

¹⁵ <https://www.rsm.nl/education/master/msc-programmes/msc-global-business-sustainability/>



participate in a range of extracurricular activities, such as sustainability-themed conferences, guest lectures, and networking events.

Learn strong analytical and problem-solving skills – supported by interactive learning such as simulations, live business cases and role-plays – and develop interpersonal skills such as negotiation, presenting and working on interdisciplinary projects.

Upon completion of the program, graduates will have a deep understanding of the interplay between sustainability and business, as well as the skills and knowledge required to drive sustainable business practices in a global context. Graduates of the program are well-positioned to pursue careers in a range of industries, including consulting, finance, marketing, and supply chain management, among others.

Specific courses include: Sustainability Leadership & Planetary Boundaries, Global Business Strategies, Sustainability Ethics, Sustainable Behavior, Research Methodology I, Personal Career Narrative, Sustainability Grand Challenges.

The duration of the master's program is 12 months and it is offered in English.

Master's of Science in Sustainable Development , KU Leuven, Belgium

Master's of Science in Sustainable Development program¹⁶ offers a transversal core program on sustainable development and two tracks of specialization: a Space & Society track and an Ecology track. The distinctive strength of this master's program is an interdisciplinary character that bridges societal and ecological sustainability challenges while engaging with real-world settings and communities.

The common core involves the building up and integration of fundamental expertise in sustainable development, including theory, methodology and practical applications in both ecology and social science. It comprises academic levelling training, courses covering different sustainability aspects, the formulation of an individual research portfolio, as well as a field trip in the Global South, an internship and a thesis.

The Space & Society track focuses on the societal component of sustainability transition, including social, economic, political and cultural dimensions.

The Ecology track focuses on both the conservation of biodiversity and the sustainable use of biodiversity at all organizational levels (species, genes and ecosystems). Integration between both tracks will mainly be done through sustainable development practice at the local community level.

¹⁶ https://onderwijsaanbod.kuleuven.be/opleidingen/e/SC_53903372.htm%2523activetab=selectie&bl=all#bl=01



A major methodological innovation introduced by this program is the Sustainable Development Living Lab, a mobile platform through which the ICP community applies sustainability knowledge to problems of the Global South. The lab connects students, staff from the KU Leuven and Global South partner institutions from Africa, Asia and Latin America, but also practitioners and policy-makers, NGOs, representatives of the private sector, among others. This program trains future sustainability leaders acquainted with the necessary interdisciplinary knowledge, skills and methodologies to address and solve intertwined socio-ecological challenges hindering the construction of more sustainable paths of development.

Specific courses include: Introduction to Geoprocessing, Introduction to Cartography, The Sustainable Development Challenge, Academic Leveling: Space, Society and Ecology, Geography of Development, Global Change, Ecosystems and Sustainability, Current Topics in Conservation Biology, Fieldwork in the Global South.

The duration of the program is 24 months, and it is taught in English.

Master in Sustainability and Energy Management, Università Commerciale Luigi Bocconi, Italy

The Master in Sustainability and Energy Management¹⁷ at the University of Bologna is a postgraduate program that provides students with the skills and knowledge necessary to pursue a career in sustainable energy management. The program is designed for students who want to learn about the latest trends and innovations in the field of sustainable energy, with a focus on the management of energy resources.

The program is structured into three modules: the first module focuses on energy and environmental management, the second module covers renewable energy technologies and applications, and the third module is dedicated to energy planning and management. Students will have the opportunity to learn about topics such as sustainable development, energy efficiency, climate change, energy policy, and renewable energy systems.

The program is taught by experienced professors and industry professionals who bring real-world experience to the classroom. Students will also have the opportunity to participate in field trips and site visits to companies and organizations that are leading the way in sustainable energy management, corporate sustainability, energy and environment. Every year the Master attracts several leading companies, agencies and NGOs who deliver presentations, exposing our students to their potential employers.

¹⁷ https://www.unibocconi.eu/wps/wcm/connect/bocconi/sitopubblico_en/navigation+tree/home/programs/specialized+masters/masem+-+master+in+sustainability+and+energy+management/



It is the first Specialized Master program at Bocconi to have introduced the use of wireless devices (e.g. laptop or tablet) and advanced and interactive academic software as well as webinars in the classroom, in order to enhance the student learning experience. Therefore, all students will be required to bring their own wireless device for class work.

Upon completion of the program, students will have gained the skills and knowledge necessary to pursue a career in a wide range of industries, including energy consulting firms, energy utilities, government agencies, and non-profit organizations. Graduates of the program will be able to apply their knowledge to create sustainable energy solutions that benefit both society and the environment.

The course offer includes subjects such as: CSR and Corporate Sustainability, Energy Economics, Environmental Economics, Sustainable Strategies, The Economics of Renewables and Energy Saving Technologies, Environmental Law, Geopolitics and Energy Transition, Corporate Finance for Green Business.

The duration of the program is 12 months, and it is taught in English.

The Master's in Environmental Building Design and Management program, University Navarra, Spain

The Master's in Environmental Building Design and Management program¹⁸ teaches students how to measure the effectiveness of environmental measures implemented in buildings to minimize their impact on the environment. To assess the actual behavior of buildings, students use simulation software and monitoring tools such as sensors, dataloggers, thermo-flowmeters, blower doors, and thermographic cameras.

The program has a close connection with the research projects of the Department of Construction, Installations, and Structures at the School of Architecture. Additionally, it collaborates with other national and international research groups, making it a training program that incorporates the latest advances and outcomes in environmental technologies and innovations related to building design and management.

The program made up of four modules, three of which - the Sustainable design, Internship and Work End of Master's Degree- are compulsory. In addition, a fourth module is optional, which will allow students to choose between an intensification in Advanced Sustainable design or in management of Companies. In the module of design Advanced Sustainable, the aspects related to the design and the sustainable quantification of buildings are studied in depth, preparing the student to face advanced

¹⁸ <https://en.unav.edu/web/masters-degree-in-environmental-design-and-management-of-buildings>



simulation, monitoring and testing of buildings, new materials and construction systems, new sustainable certification systems. The module of management of companies, which will intensify the training in management of companies, directing the student in the acquisition of knowledge oriented to the professional activity, from general questions of business and project management. As the field of design and management of environmental buildings becomes more globally focused, the MDGAE program aims to provide students with an international professional profile. This is facilitated through an international placement opportunity where students can train at a university or technology center abroad, specifically in the United Kingdom or Germany. Furthermore, students who complete the advanced course in sustainability will have an additional chance to train at an internationally renowned university in addition to the placement during the sustainable design module.

The completion of the Final Project Master's Degree (TFM) in companies within the sector is a vital aspect of the MDGAE student's training internship. This provides a unique opportunity to apply all the knowledge and skills gained during the program in a real-life setting. By completing the TFM at a company, students can experience the professional reality, acquire the necessary professional skills that can improve their employability, and develop their entrepreneurial capacity.

Specific courses include: Principles of sustainability, Energy management (passive measures), Energy and water management (active measures), Materials and waste management, Environmental certification, Management of other environmental aspects.

Duration is of 12 months and it includes 3 internships. It is offered in both English and Spanish language.

Master of Biodiversity Territory Environment, Université Paris 1 Panthéon-Sorbonne, France

Master Biodiversity Territory Environment¹⁹ is a graduate program offered by the Université Paris 1 Panthéon-Sorbonne. This program provides students with advanced knowledge and skills in the fields of biodiversity, territorial management, and environmental sustainability. This pertains to current issues regarding the scientific and practical aspects of managing biodiversity in a given area, whether in the public or private sector. This encompasses projects aimed at conserving and managing biodiversity and promoting coexistence with living organisms. Examples of such projects include large infrastructure development, as well as urban and rural development. The program consists of two modules: from the definition of biodiversity to its implementation in projects; from the concept of a biodiversity project to its implementation.

The program is aimed at students who have a strong interest in ecology, environmental science, and sustainability, and who want to develop the skills and knowledge necessary to become experts in these

¹⁹ <https://www.masterbioterre.com/>



areas. Students in the Master BIOTERRE program will have the opportunity to study a wide range of topics, including biodiversity conservation, ecological management, environmental policy, sustainable development, and more. They will also have the opportunity to participate in field trips and other practical activities that will allow them to apply their knowledge in real-world situations.

The program offers courses such as: Biodiversity in the field of different disciplines; Biodiversity dynamics and diagnostics; Project design and biodiversity; Project management, operation, rehabilitation and biodiversity.

The program is designed for 12 months and it is offered in both English and French language.

Master in Sustainable Development, Environmental and Geomatics Management, Université Paris 1 Panthéon-Sorbonne, France

This master study is an interdisciplinary program²⁰ that combines knowledge from the fields of: sustainable development (economic, social, and environmental dimensions of sustainable development, green energy, climate change, and social responsibility); environmental science (ecology, biodiversity, natural resource management, and environmental monitoring); geomatics (geospatial data and tools to analyze and manage environmental information, GIS, remote sensing, and spatial analysis).

The DDMEG program is designed for students with a background in environmental science, geography, geomatics, or related fields. The program includes both theoretical and practical coursework, as well as a research project or internship. Graduates of the program are well-equipped to pursue careers in a wide range of fields related to sustainable development and environmental management, including consulting, government agencies, NGOs, and research institutions.

Specific courses include: Environmental Law and Regulations, Sustainable Development and Corporate Social Responsibility, Environmental Economics and Finance, Biodiversity Conservation and Management, Social and Environmental Justice.

The duration of the program is 24 months and it is offered in French.

The Master in Environmental Policy, Sciences Po, France

The Master in Environmental Policy is a multidisciplinary program that aims to prepare a new generation of professionals such as policy makers, project managers, analysts, and auditors who can address

²⁰ <https://formations.pantheonsorbonne.fr/fr/catalogue-des-formations/master-M/master-risques-et-environnement-KBURPBB4/master-parcours-developpement-durable-management-environnemental-et-geomatique-ddmeg-KBURQ3XY.html>



environmental issues globally. The program covers the fundamental concepts in environmental sciences and techniques, which enable students to comprehend the primary constraints in policy-making and strategic decision-making processes in the public and private sectors. Program consists of thematic blocks: Environmental Economics, Sciences and Policies, Climate, Environmental Governance, Sustainable Finance, Environmental Management.

The curriculum of the program includes introductory classes on earth sciences, climate change, and biodiversity that focus on sustainable development and environmental issues. The program aims to equip students with the skills required to analyze and understand public and private strategies on environmental and sustainable development issues. Moreover, students develop their analytical skills to serve as mediators between scientists, private operators, managers, or public officials. The program emphasizes practical and technical skills in policy and project design, risk analysis, project management, auditing, policy design, management, and evaluation in fields like environment, health, nutrition, and more.

The program provides training in the latest methods for studying biodiversity, climate change, and the 'Earth system' such as ecology, climatology, modelling, etc. It also introduces students to the legal, economic, and social aspects of sustainable development.

It offers a variety of courses, such as: Introduction to Environmental Economics; Natural Resource Economics; From Climate Science to Climate Intervention?; Climate Change: Causes and Consequences; Major Oceanic Environmental Challenges: a Multi-Disciplinary Scientific Perspective; Ecological Science and Nature based Solutions: Issues and Challenges; Critical Political Ecology of Water; Climate Geopolitics: International Relations in a Warming World; Dilemmas of Energy Transitions; Decarbonization and Renewable Sources; European Energy Policies.

The completion of the program takes 24 months and it is offered in English language.

The MSc in Sustainable Tropical Forestry, Copenhagen Business School, Denmark

The MSc in Sustainable Tropical Forestry²¹ offers a comprehensive introduction to the subject matter and culminates in the Sustainable Tropical Forestry School, which involves fieldwork in a developing country. The first year of study is completed at one of three partner institutions: University of Copenhagen, Bangor University, or Technische Universität Dresden. The primary goals for the initial year of the SUTROFOR program are multifaceted. Firstly, it aims to provide students with a solid foundation of fundamental knowledge related to the principles and procedures that underpin sustainable

²¹ <https://studies.ku.dk/sutrofor/>



tropical forestry development. This knowledge will take into account the social and environmental factors that impact this field, providing a well-rounded education.

Secondly, the program seeks to enhance students' theoretical and practical skills in a variety of areas, including numeracy, communication, information technology, teamwork, self-management, and professional development. By doing so, students will be well-equipped to succeed in their future careers in the context of tropical forestry.

Finally, the program aims to install the values of scholarship in its students. This includes fostering a sense of inquisitiveness, introspection, honesty, open-mindedness, evidence-based reasoning, and cooperation. By doing so, SUTROFOR hopes to produce graduates who not only possess the necessary knowledge and skills to succeed but who also embody the values necessary to make a positive impact in the field of sustainable tropical forestry development.

Students can select a specialization to be completed at a different partner institution, meaning they cannot complete both years of study at the same institution. Specializations offered include Forests and livelihoods in developing countries (Copenhagen), Agroforestry systems (Bangor), Tropical forest management (Dresden), Environmental management and policies for tropical forests (Montpellier), and Social and environmental responsibility in tropical forestry (Padova). The Montpellier specialization is offered in French and requires proficiency in the French language. Specialization “Forests and livelihoods in developing countries” focuses on natural forests and participatory management, a comprehensive understanding of economics. Agroforestry systems program aims to educate individuals on the fundamental principles and procedures that form the basis of agroforestry. Program “Tropical forest management” specializes on forest plantations and urban forestry. Specialization “Environmental management and policies for tropical forests” studies interactions between human and biophysical processes that drive structure and functioning of tropical forests from the local to global scales, and are able to implement or appraise environmental actions targeted at tropical forest ecosystems. Specialization “Social and environmental responsibility in tropical forestry” is dedicated to main theoretical concepts, international framework and practical tools related to ethics in forestry.

Specific courses include: Climate Change and Forestry: monitoring and policies, Preparing Field Work in the Tropics, Sustainable Tropical Forestry.

The duration of the program is 24 months and it is taught in English.



4.2.2 Programs Focused on Social Aspects and Innovation

The Master program in this category emphasizes the importance of sustainability and social innovation. It covers subjects such as design thinking for innovation, socially responsible investing, shaping innovating businesses and others.

The MSc Sustainability and Social Innovation program, HEC Paris, France

The MSc Sustainability and Social Innovation program²² at HEC Paris is designed to prepare students for leadership roles in sustainable and socially responsible organizations. The program focuses on the intersection of business, society, and the environment, and provides students with the tools and knowledge to develop sustainable solutions to complex social and environmental challenges.

The program is divided into three modules, each of which focuses on a specific aspect of sustainability and social innovation. The first module provides a foundation in sustainability theory and business strategy, and covers topics such as sustainability reporting, environmental management, and sustainable development. The second module focuses on social innovation and covers topics such as social entrepreneurship, social impact assessment, and corporate social responsibility. The third module is dedicated to sustainability leadership and covers topics such as stakeholder engagement, sustainable finance, and ethical leadership.

Students have the opportunity to apply to the Norwegian School of Economics (NHH) in order to get an MSc in Economics & Business Administration, with a Major in Energy, Natural Resources and the Environment (double-degree program).

Every year, students go on a study trip to observe sustainable development issues and to study the measures already implemented or those to be developed. The study trip takes place in France or in a neighboring country. The objective is to understand how local public and private organizations are responding to current societal and environmental challenges.

The program offers the following courses: The Changing Business Environment; Design Thinking for Innovation; Climate, Resources and Governance; Social Innovation; Socially Responsible Investing (ESG); Sustainable Operations Management; Strategy for Sustainability: Shaping Innovative Business Models; Data Science for Sustainable Business; Sustainable Corporate Finance; Decarbonization and Climate Strategies for Organizations; Energy Management in the Company; Ecological Accounting: from the Organization to the Ecosystem; Systemic Shocks & Sustainable Development; Sustainable Urban Development: Key Strategic and Organizational Challenges.

²² <https://www.hec.edu/en/master-s-programs/specialized-masters/master-sustainability-and-social-innovation>



The duration of the program is 12 months, and it is taught in English.

4.2.3 Programs Focused on Development and Economics

These programs typically offer a diverse range of courses that cover various aspects of development economics. In the analysed sample, we have identified only one program in this category, which deals with important issues in development and economics, such as poverty, inequality, sustainability, and globalization.

The Research Master International Development Studies, University of Amsterdam, The Netherlands

The Research Master International Development Studies²³ at the University of Amsterdam is an interdisciplinary program that prepares students for research-oriented careers in the field of international development. The program provides a comprehensive understanding of development issues, policies, and practices, with a focus on critical analysis and innovative research methods and sustainable development.

The program is designed for students who have completed a Bachelor's degree in a related field, such as social sciences, economics, political science, or anthropology. Students will take courses in research methodology, development theory, and substantive issues in development, such as poverty, inequality, sustainability, and globalization.

The program attracts a diverse student body from all over the world. Students will have the opportunity to engage in research projects with international organizations, NGOs, and research institutes, gaining hands-on experience in the field of development.

During the second year of the program, students conduct independent study for the master thesis. This is usually done as a fieldwork. In addition, during this time, students complete their individual portfolio (see below) which is made up of personally tailored professional and academic activities. The portfolio component of the program is a distinctive feature that offers significant value to students. It is self-directed and accounts for 15 ECTS in the course. Students have the flexibility to construct an academic or professional profile, or a blend of both, that will equip them for further study or entry into the workforce.

²³ <https://www.uva.nl/en/programmes/research-masters/international-development-studies-research/international-development-studies-research-msc.html?origin=5BOaRAofTjCccATraJp2XA>



The portfolio is undertaken concurrently with field research and can include diverse activities such as research or professional internships.

After completing the thesis students prepare an academic article based on their thesis in collaboration with their supervisor and design a final “communication product” to share the most relevant points of their research with key stakeholder groups.

Upon completion of the program, graduates will have the skills and knowledge to pursue doctoral studies in development studies or related fields, or to work in research and policy positions in international development organizations, government agencies, or academia.

The course offer includes subjects such as: Sustainable and Inclusive Economics; Education, Development and Social Justice; Urban Perspectives in Development; Environment, Development and Conflict; Critical Development Theory and Social Movements.

The duration of the program is 24 months, and it is taught in English.

4.3 Top Master Programs Eduniversal Ranking

In this section, programs ranked based on the Eduniversal Best Master ranking are described. This ranking classifies best Masters and MBA programs on the global level. It considers a variety of aspects such as responses from deans and directors of the programs, recruiters, and graduating students in 30 fields of study. For the purposes of our study, programs from the category “sustainable management” were analyzed.

4.3.1 Programs Focused on Sustainability and Management

These master programs typically address environmental issues, such as climate change, energy efficiency, renewable energy, waste management, water security and others.

The Master of Environment, The University of Melbourne, Australia

The Master of Environment program at the University of Melbourne²⁴ is a campus-based program available to both domestic and international students. It offers 12 streams of study, including climate change, environmental management and science, public policy, sustainable cities, and more, with the option of designing a tailored stream. The program has two intakes per year in February and July.

²⁴ <https://study.unimelb.edu.au/find/courses/graduate/master-of-environment/>



To be accepted into the program, students must have completed an undergraduate degree in a cognate discipline with a weighted average mark (WAM) of at least 65%, or an undergraduate degree in any discipline with a WAM of at least 65% and two years of relevant documented professional experience since graduation.

The Master of Environment is a 200-point program consisting of 16 subjects, with 25 points in core subjects and 175 points in elective subjects. Elective subjects include applied research projects, industry internships, and overseas field trips. Each specialization has specific courses worth varying points, and students need to collect a total of 200 points over a two-year period. For instance, in the Development specialization, there are two core subjects (Environmental Sustainability and Partnerships for Sustainable Futures) worth 12.5 points each, five specialization subjects, and numerous courses in the Compulsory Capstone Experience module worth 12.5, 25, or 50 points. Elective subjects are worth 12.5 points each.

There are 12 specializations that students can choose from in consultation with an academic advisor, including Development, Conservation and Restoration, Integrated Water Catchment and Management, Waste Management, Environmental and Public Health, Education and Social Change, Governance, Policy and Markets, Sustainable Cities, Sustainable Regions, Energy Efficiency, Modelling and Implementation, and Climate Change. Additionally, students can design a tailored specialization.

The program duration is 24 months full-time or 48 months part-time, and the language of instruction is English. Each of the 12 specializations has a tailored combination of courses that students can choose from with the help of an academic advisor.

Msc in Environment and Sustainability, the Monash University, Australia

The MSc in Environment and Sustainability program²⁵ offered by Monash University's Faculty of Science is designed for students who have a keen interest in the environment and sustainability after their Bachelor's studies. This program offers 5 specializations that students can choose from: Environment and Governance, Corporate Environmental and Sustainability Management, Environmental Security, International Development and Environment, and Leadership for Sustainable Development.

It takes 2 years full-time or 4 years part-time to complete the degree, with a maximum completion time of 4 years. The program consists of 96 credit points, and students need to complete 4 parts (Part A, B, C, and D) in 3 study areas within the 2-year time frame.

²⁵ <https://www.monash.edu/science>



Part A comprises core studies in Environment and Sustainability, Part B includes specialisation preparatory studies, Part C consists of specialist studies, and Part D encompasses advanced practices. These 4 parts add up to 96 credit points and are a requirement for obtaining the degree.

The program consists of 4 units, each contributing 24 credit points, from the Parts A, B, C, and D, respectively. The Master Core Units (Part A) and the Specialisation Preparatory Units (Part B) are compulsory for all students, along with other core courses such as Global Challenges and Sustainability, and Perspectives on Sustainability. The Specialist Units (Part C) and Advanced Practice Units (Part D) offer students the freedom to choose courses based on their specializations and interests, with options such as Research Pathways, Coursework, and Project/Internships.

In conclusion, this MSc in Environment and Sustainability program is a great option for students who have an interest in the environment and sustainability. The program offers a range of specializations and a variety of courses that allow students to tailor their degree according to their interests and career aspirations. The program can be completed in 24 months full-time or 48 months part-time, and the language of instruction is English.

The Master of Green Business and Policy, the Korea Advanced Institute of Science and Technology (KAIST) College of Business, Korea

The Master of Green Business and Policy²⁶ at the Korea Advanced Institute of Science and Technology (KAIST) College of Business is a full-time postgraduate program that specializes in climate change, green growth policy, and energy shortage challenges. It provides students with knowledge of global policies and administrative capabilities from the perspectives of climate change and green growth, and an understanding of green industry and green technology trends. The program requires students to earn 45+ credits of coursework at KAIST College of Business, complete research reports each year, maintain a minimum GPA of 3.0, and graduate within 4 semesters.

There are three different types of courses available: Green Finance Track Courses, Green Policy Track Courses, and Green Business Track Courses. Mandatory major courses include Green Business Theory, Green Technologies and Green Industries, and Studies on Green Growth Strategy. The program also offers a wide range of elective courses such as Research Methodology for Green Business, Environmental Issues and Policy Analysis, Energy and Environment Economics, Green Technology R&D and Green Industry Policy, Environmental and Energy System Risk Management, Green Innovation and Strategy, Green Fund Investment Strategy, Green Derivatives, Green Marketing, Creating Green Business and Commercialization, Climate Change and Green Business, Green Value Chain and Carbon Management, Climate Change and International Collaboration, Green City, Green

²⁶ <https://www.greengrowthknowledge.org/academic-programmes/search>



Transportation, Green Production and Carbon Reduction, Green Accounting, Valuation of Green Firms, Carbon Emission Trading Market and Carbon Finance, Environmental Policy, Green Resource Policy, Green Growth Policy, Security for Information and Energy Infrastructure, Green Macroeconomics, Food, Forest and Water Policy, Special Topics in Green Business, Special Lecture in Green Business, Special Topics in Green Business and Policy, Case Analysis of Renewable Energy Business, and Case Study in Green Finance.

The program also requires students to complete credits in research, such as Green Project: Sustainability Projects, Green Finance Projects, and Thesis for Graduate Students. Moreover, the program facilitates interactions between the students and leaders from various fields such as academia, policy circles, international organizations, business communities, and CSOs.

Starting in 2023, the program will launch a newly designed full-time Master's program in the field called Impact MBA. The program duration remains 24 months, and the language of instruction is Korean.

Master program Environmental Management, University of Warsaw, Poland

The Master's program in Environmental Management²⁷ is a full-time, two-year program in Warsaw, Poland. It is a collaboration between the university's faculties of management, biology, and chemistry, and is tailored towards students with backgrounds in environmental studies, biology, chemistry, or management. The program offers a practice-oriented approach that covers the business aspects of environmental protection. To be accepted into the program, applicants must hold a Bachelor's or Master's degree and successfully complete a recruitment interview.

The program aims to provide a comprehensive understanding of the theoretical and practical aspects of environmental protection aligned with the State Environmental Policy and European Commission guidelines. Students will acquire knowledge in financial and economic measures of environmental management and protection, modeling and simulation techniques in business processes, and advanced computer technology used in environmental management. In addition, the program covers the latest analytical technologies used in soil, water, and air improvement and remediation, the biological basis of environmental management and protection, "green chemistry" technologies, and sustainable natural resource exploitation.

The program is taught in English and is tuition-free for Polish students. Students will receive instructions from experienced management science scholars and practitioners with extensive backgrounds in technology, environmental impact assessment, analytics, laboratory and field work related to ecology,

²⁷ <https://timo.wz.uw.edu.pl/environmental-management/>



renewable energy, water management, waste management and biotechnology, financial and legal affairs.

The program consists of four modules. Module I covers management courses, Module II covers biology courses, Module III covers chemistry courses, and Module IV focuses on summarizing activities. During the first semester, students are introduced to management, project management, environmental management, environmental economics, quantitative methods, and IT for business at the Faculty of Management. The subsequent semesters aim to provide students with hands-on experience, including site visits, consulting projects, drafting planning documents, and interpreting analytical data.

Overall, the Master's program in Environmental Management is an excellent opportunity for students seeking a practice-oriented approach to environmental protection that covers the business aspects. The program is designed to provide students with comprehensive knowledge and practical skills in environmental management, making them well-equipped to take on roles in the field. The duration of the program is two years, and it is taught in English.

Master of Sustainability, The University of Sydney, Australia

The Master of Sustainability program²⁸ offered by the University of Sydney is highly regarded and lasts for 1.5 years for full-time students, with the option of part-time study. The program is based in Sydney, Australia and requires a Bachelor's degree for admission, with no specific requirements for the degree.

The program's strengths lie in its multidisciplinary approach, which draws expertise from various fields such as business, economics, law, health, agricultural and environmental science, energy and engineering, design, and technology. The courses are taught by renowned researchers, who are international leaders in their respective fields. Industry professionals also contribute as guest speakers and mentors, providing valuable insights into a range of workplaces.

The Master of Sustainability degree is highly flexible and can be tailored to suit each student's individual path. Students have the freedom to select electives that build on foundational sustainability topics and align with their own interests. A wide range of electives is available for students, which focus on built environment, education, business, environmental science, health, global development, social entrepreneurship, and policy.

The curriculum spans 1.5 years, divided into three semesters, with a research project in the final semester of the program.

²⁸ <https://www.sydney.edu.au/courses/courses/pc/master-of-sustainability.html>



The first semester covers sustainability topics such as energy and resources, sustainability in business, and leadership. The second semester includes subjects such as food and water security, sustainable development, population health, and law and policy. Both semesters can be modified based on students' interests.

The University of Sydney's Master of Sustainability program provides students with a comprehensive and practical understanding of sustainability issues from various perspectives. The program's flexibility and multidisciplinary approach make it an excellent choice for students seeking to gain expertise in sustainability and advance their career in this rapidly growing field.

The duration of the program is 1,5 years (full-time), and it is taught in English.

4.3.2 Programs Focused on Social Aspects and Innovation

These programs emphasize engagement with stakeholders through partnerships and open innovation processes, while also focusing on comprehensive and strategic management of social projects guided by principles of social responsibility and ethics.

The Master's degree Creative Sustainability, Aalto University, School of Business, Finland

The Master's degree Creative Sustainability at the Aalto University²⁹ - School of Business is an international Master's Program in Creative Sustainability (CS). It is a joint Master's degree program of the School of Arts, Design and Architecture, the School of Business and the School of Chemical Engineering. Creative Sustainability provides a multidisciplinary learning platform in the fields of design, business and chemical engineering. Students also have possibilities to take selected courses from architecture. Anyone with a bachelor's degree in design, business administration, economics or chemical engineering can apply. It is a multi-disciplinary topic characterized by growing momentum. Its purpose is to create specialized managers and professionals and prepare them for industrial and service companies, international agencies, nonprofit organizations and public authorities.

Students can choose from 3 specializations on the master program that offer 3 different degrees: Master of Arts, M.Sc. Degree in Technology and M.Sc. Degree in Economics and Business Administration.

Major studies consist of three parts: an advanced major studies part consisting of 60 credit points, thesis writing part consisting of 30 credit points and an elective studies part consisting of 30 credit points.

²⁹ <https://www.aalto.fi/en/creative-sustainability/study-structure-for-creative-sustainability-masters-programme-2020-2022>



Students can reach different learning outcomes such as: Multidisciplinary approach, Systems thinking, Sustainable use of materials, Design thinking, Sustainability management.

Students can choose if they'd like to take Creative Sustainability as either a major or a minor program during their master studies.

In addition to this master's degree there are others related to sustainability: Nordic Master Programme in Innovative Sustainable Energy Engineering; Master's Programme in Environmental Pathways for Sustainable Energy Systems; Master's Programme in Advanced Materials for Innovation and Sustainability AMIS (EIT Raw Materials).

Specific courses include also courses related to psychology such as Healing Practices & Resilience Strategies & across Art Design Ecology & Psychology. Problem-solving skills are listed as main learning outcomes of the thesis module.

The program lasts 24 months and it is offered in English.

The Executive Master in Sustainability and Business Innovation, University Bologna, Italy

The Executive Master in Sustainability and Business Innovation³⁰ aims to equip professionals with the skills and tools needed to lead sustainability, circular economy, and social innovation processes within their organizations. By training action leaders who can adapt business models to meet current challenges and opportunities, the program enables organizations to invest in individuals who can manage changes across various corporate functions. Participants will join a community of innovative managers who integrate economic, social, and environmental challenges, while also engaging with stakeholders in the territory through partnership and open innovation processes.

This is the only program in Italy that offers strategic-level sustainability and social innovation courses, which are then applied to different corporate functions. It includes 10 courses that cover general management, sustainability, and business innovation, with each module containing courses, focus sessions, and opportunities to exchange ideas with industry professionals. Participants will also visit leading companies for sustainability and network with partners of Bologna Business School. To apply, interested individuals should book an interview with the course directors. The program is designed to ensure the correct order of activities, allowing participants to delve deeper into each specific field. The program comprises 10 courses that build on one another, allowing participants to gain in-depth knowledge of each discipline. Classroom activities include traditional lectures, case studies, and accounts from corporate professionals. There are also three workshops that analyze key aspects of

³⁰ <https://www.bbs.unibo.eu/master-executive/sustainability-and-business-innovation-2/>



sustainability, social innovation, and circular economy with university professors, managers, and professionals. Additionally, there are 25 weeks of distance learning, during which participants will study course materials, complete exercises, discuss company cases, and exchange views with colleagues and educational tutors on the school's e-learning platform.

The program also includes two company visits, which provide an opportunity for participants to exchange ideas with managers and entrepreneurs in the field. Furthermore, there are four or more evening meetings with company managers who share their managerial experiences with the participants.

The program offers the following courses: Operations & Industry 4.0, Business Ethics and Stakeholder Theory, Business and Global Strategy, Circular Economics and Value Chain, Social Innovation, Sustainable Finance, Measuring Sustainable Performance, Marketing for Sustainability, SDGs, From Corporate Social Responsibility to Creating Shared Value and the B Corp model, Introduction to Climate Change.

The duration of the program is 12 months (part-time, with 30 classroom days) and it is offered in Italian language.

Master in the social investment management, Universidad del Pacífico Escuela de Gestión Pública, Peru

The Gestión de la Inversión Social program³¹ at Universidad del Pacífico Escuela de Gestión Pública is a two-year, full-time Master's program located in Lima, Peru. The program aims to equip students with the necessary knowledge and skills to design, implement, and evaluate social projects that align with the Sustainable Development Goals (Agenda 2030).

To be eligible for the program, applicants must have a Bachelor's degree. Students will learn a multidisciplinary methodology that combines practical and theoretical aspects to develop critical and strategic thinking, research and analysis, technical, personal, and professional skills. The curriculum focuses on the comprehensive and strategic management of social projects, based on solid principles of social responsibility and ethics. The program is divided into four cycles, each focusing on a specific aspect of social project management.

Cycle I focuses on the tools for policy management and analysis, including subjects such as socio-political analysis tools for managers, fundamentals of statistics and sampling techniques, and Stata software for household survey databases. Students also have the opportunity to learn about social

³¹ https://www.up.edu.pe/egp/maestrias/gestion-inversion-social/contactenos/?utm_source=organic-web-egp&utm_medium=contacto&utm_campaign=gestion-inversion-social



investment programs and projects, Microsoft Excel, qualitative research, and the multidimensionality of social problems.

Cycle II focuses on the formulation, evaluation, and operational management of social investment. This includes subjects focused on strategic planning and budgeting programs applied to social investment, identification and formulation of social investment, analysis of efficiency and effectiveness, equity and transparency of social investment, and financial management of social investment. Students will also learn about management of information systems.

Cycle III covers social investment monitoring and evaluation, including subjects focused on monitoring and follow-up, impact assessment basics, quantitative and qualitative research methodology, design, and evaluation techniques, and infrastructure impact assessment case studies. In this cycle, students also have the opportunity to participate in research workshops.

Cycle IV focuses on social responsibility and cross-cutting issues of social investment, including the introduction to CSR and the Sustainable Development Goals (SDGs), the design of a strategy and organizational structure for CSR management, inclusive business and social entrepreneurship, the negotiation and resolution of social conflicts, and the communication and impact of social management. Students will once again participate in a research workshop.

One strength of this program is its networking opportunities. The program also monitors social impact with a methodology that allows for optimal investment of resources, and a training model based on competencies and focused on corporate social responsibility.

The program duration is 24 months, and the language of instruction is Spanish.

4.3.3 Programs Focused on Development and Economics

These master programs typically offer courses related to various aspects of development and economics such as international trade and development, macroeconomics, sustainable policies, etc.

The Master's in Economics - Major in Development and Trade, the Nova School of Business and Economics - Universidade Nova de Lisboa, Portugal

The Master's in Economics - Major in Development and Trade at the Nova School of Business and Economics³² - Universidade Nova de Lisboa encompasses five key components: basic structure, mandatory courses, areas of expertise, electives, and skills accelerator modules. The areas of expertise include Sustainability, Business and Data Analytics, International Development, Macroeconomics and

³² <https://www.novasbe.unl.pt/en/programs/masters/international-development-public-policy/program>



Financial Markets, Public Policy, Banking, Financial Regulation, and Supervision. Additionally, Nova SBE offers a Master's in International Development and Public Policy program.

In the Sustainability area of expertise, students are exposed to global sustainability over time and how the green transition addresses the challenges of climate change and environmental degradation while also promoting economic and societal transformation by integrating the three pillars of sustainable development: economic, social, and environmental. Students gain familiarity with topics such as Energy and Climate Change, Fundamentals of Environment and Sustainability, Sustainability Evaluation of Policies, Plans and Projects, Sustainability in Organizations, Impact Investments, Environmental Policy, Policy Evaluation, and Global Energy Markets.

Nova SBE is committed to promoting sustainable development goals through ambassadors, internships, a girls-for-girls mentorship program, and activities engaging with civil society organizations and student clubs. In the first semester, students are required to take the Career Development Program - Mastering Your Career course and participate in the Mentoring Program, which is mandatory.

Specific courses in the Sustainability area of expertise include Energy and Climate Change, Economics of Education, Environmental Policy, Finance and the Transition to Net Zero, Sustainability Evaluation of Policies, Plans and Projects, Sustainability in Organizations, and Sustainable Finance.

The program duration is 18 months and it is offered in English.

The Master in Development Practice, Universidad de los Andes, Colombia

The Master in Development Practice³³ at the Universidad de los Andes, Colombia-School of Management, is a two-year, part-time postgraduate program designed to manage development challenges and train professionals to lead and inspire change by developing solutions for economic well-being, social equity, and environmental sustainability. The program aims to train leaders for the innovative and sustainable development of organizations that positively impact society. It is an interdisciplinary program that integrates the areas of management, natural sciences, and social sciences, bringing together professionals from different institutions and public and private organizations.

The program offers a basic core in management and sustainable development with two complementary cycles. The first is an in-depth cycle where students can delve deeper into a particular area of development management and practice by taking elective credits, either in the universities of the MDP network or in the different faculties of the Universidad de los Andes. The integrative cycle is where they will take courses that allow them to concentrate on particular development disciplines.

³³ <https://administracion.uniandes.edu.co/programas/posgrados/maestria-gerencia-y-practica-del-desarrollo/>



A fundamental element of the program is students' exposure to the practice of development through two field assignments. During the two inter-semester periods, students will develop applicable work for an organization or project in different regions of Colombia. The school will develop a network of organizations linked to the MDP for this purpose.

The total number of credits is 42, and the curriculum is divided into 29 required courses, six practical courses, and seven elective courses. Common compulsory courses include: Environmental Sciences, Financial Planning (Cycle 1), Organizations, Sustainable Development Goals (SDG) (Cycle 2), and Social and Environmental Entrepreneurship (Cycle 3). Required and exclusive Management Development Program (MDP) courses include Development Theories (Cycle 1), Strategic Management (Cycle 2), Economic Analysis for Development Practice, Regional Development (Cycle 3), and Governance (Cycle 4). Mandatory courses directly related to practice are Regional Analysis (Cycle 2) and Sustainability Lab (Cycle 4). An International Summer School is held between Cycle 2 and 3.

Teaching and learning take place through master classes that focus on theoretical approaches, case studies (national and international), workshops that offer practical exercises, simulation games, seminars, and project-based learning.

The duration of the program is 24 months and it is offered in Spanish language.



5 ANALYSIS AND SUMMARY OF TOP MASTER PROGRAMS

Author: Michaela Bednářová (UPO)

The growing need for professionals in the field of sustainability has led to the establishment of numerous undergraduate and graduate programs focused on sustainable development and management. These programs aim to ensure that future development does not adversely impact the environment or place undue burdens on the society. Consequently, many higher education institutions now offer programs in sustainability or development, often tailored to their primary areas of teaching and research.

The study conducted on master programs related to sustainability offered globally reveals that the mode of study is predominantly in-person learning, followed by a blended approach that combines classroom-based and distance learning. However, an increasing popularity of distance learning or a mixed approach is also observed. The duration of these master programs ranges from 12 to 24 months, including an internship period in some cases, and culminates in a master thesis or capstone project. The language of instruction is primarily English, with some programs being bilingual or offering courses in Spanish, French, Italian, or Korean. The target audience for these programs includes not only university students but also working professionals.

Common features

The overview of best practices gives us some insights not only into the current offer of Master programs related to sustainable development and management (or similar) on the global level but also to the common features of these programs that should be followed when designing a competitive Master program in this area that would meet the needs of 21st century. The following aspects can contribute to provide students with a comprehensive and valuable educational experience.

- *Part-time/full-time program,*
- *Evening classes for working professionals,*
- *Multidisciplinary approach to address complex sustainability challenges,*
- *Combination of core and elective courses,*
- *Capstone projects/research project/master's thesis,*
- *Field trip/ internship/ company visits,*
- *Renowned researchers or industry professionals as lecturers, guest speakers or mentors,*
- *Creation of labs such as Sustainable Development Living Lab (KU Leuven),*
- *Joint approach combining natural and social science perspective bridging societal and ecological sustainability challenges,*
- *Students participating in extracurricular activities such as conferences, networking events,*



- Existence of alumni network of global change makers including CEOs, governmental politicians, professors and social entrepreneurs (Erasmus University Rotterdam).

Regarding the offer of the subjects, Figure 1 provides some insights based on the word frequency collected from all analysed master programs.



Figure 1. Word frequency of master programs’ subjects

Source: Authors’ elaboration

To analyze the programs content wise, we have divided them into **three main categories**: those focused on **sustainability and management** (normally, with a strong focus on environmental aspects), those focused on **social aspects and innovation**, and those centred on **development and economics** (Table 1).

<i>Programs focused on Sustainability and Management</i>	Sustainability Master program, Harvard University, USA
	MPhil in Environmental Policy, University of Cambridge, UK
	MSc in Environmental Economics and Climate Change, London School of Economics and Political Science, UK
	MSc in Nature, Society, and Environmental Governance, University of Oxford, UK
	Master of Environmental Management, Yale University, USA
	Master of Development Practice, University of California, Berkeley, USA
	MSc in Environmental Sciences, ETH Zurich, Switzerland

	Master in Sustainable Development, Uppsala University, Sweden
	Master of Environment, Australian National University (ANU), Australia
	MSc in Environmental Sciences, Wageningen University & Research, the Netherlands
	The MSc in Global Business & Sustainability, Erasmus University Rotterdam, The Netherlands
	Master's of Science in Sustainable Development , KU Leuven, Belgium
	Master in Sustainability and Energy Management, Università Commerciale Luigi Bocconi, Italy
	The Master's in Environmental Building Design and Management program, University Navarra, Spain
	Master of Biodiversity Territory Environment, Université Paris 1 Panthéon-Sorbonne, France
	The Master in Environmental Policy, Sciences Po, France
	The MSc in Sustainable Tropical Forestry, Copenhagen Business School, Denmark
	Master in Sustainable Development, Environmental and Geomatics Management, Université Paris 1 Panthéon-Sorbonne, France
	The Master of Environment, The University of Melbourne, Australia
	Msc in Environment and Sustainability, the Monash University, Australia
	The Master of Green Business and Policy, the Korea Advanced Institute of Science and Technology (KAIST) College of Business, Korea
	Master program Environmental Management, University of Warsaw, Poland
	Master of Sustainability, The University of Sydney, Australia



<i>Programs focused on Development and Economics</i>	MSc in Development Studies, London School of Economics and Political Science, UK
	MA in Public Administration in International Development, Harvard University, USA
	MPhil in Economics for Development, University of Oxford, UK
	Master's degree program in Economics and Finance and Sustainability, The Ca' Foscari University of Venice, Italy
	The Research Master International Development Studies, University of Amsterdam, The Netherlands
	The Master's in Economics - Major in Development and Trade, the Nova School of Business and Economics - Universidade Nova de Lisboa, Portugal
	The Master in Development Practice, Universidad de los Andes, Colombia
<i>Program focused on Social Aspects and Innovation</i>	The MSc Sustainability and Social Innovation program, HEC Paris, France
	The Master's degree Creative Sustainability, Aalto University, School of Business, Finland
	The Executive Master in Sustainability and Business Innovation, University Bologna, Italy
	Master in the social investment management, Universidad del Pacífico Escuela de Gestión Pública, Peru

Table 1. Categories of master programs

Source: Authors' elaboration

Master's programs in sustainability and management are commonly offered by top-ranked universities worldwide. While these programs cover a wide range of core and elective courses, they share some key features. Core courses typically address environmental aspects, such as environmental management, environmental economics, or environmental policy, reflecting the close association between sustainability and environmental sustainability. However, the diverse elective courses enable students to specialize in various fields and adopt an interdisciplinary approach. It is common to find overlapping courses among universities and programs, with core courses often including Environmental



Economics, Environmental Policy, Research Methods, Environmental Management, Sustainable Development, or Development Economics. Another notable characteristic of these programs is the requirement for a final project, which may take the form of a master's thesis, research-based dissertation, or capstone project, allowing students to demonstrate the skills they acquired during the program. Furthermore, these programs emphasize interdisciplinary studies, incorporating courses from areas such as biology, ecology, economics, law, political science, statistics, and econometrics. Many programs also offer internships or other field study opportunities for practical experience.

Another category is formed by master programs focused mainly on **social aspects and innovation**. This category would include master in sustainability and social innovation, creative sustainability, social investment management, and sustainability and business innovation. Absolvents will join a community of innovative managers who integrate economic, social, and environmental challenges, while also engaging with stakeholders in the territory through partnership and open innovation processes. The curricula also focus on the comprehensive and strategic management of social projects, based on solid principles of social responsibility and ethics. The courses include but are not limited to: Creative sustainability, Operations & Industry 4.0, Business Ethics and Stakeholder Theory, Social Innovation, From Corporate Social Responsibility to Creating Shared Value. Programs also focus to strengthening resilience strategies and problem-solving skills of students.

Similar patterns emerge for the third group of programs, those focused on **development economics**. These programs are also well-established at top-ranked universities worldwide and share numerous features. Despite their diversity, we can identify core courses that form the backbone of these programs, including Macroeconomics, Microeconomics, Development Economics, Public Policy, Econometrics, Research Methodology, and Finance. Elective courses complement the core curriculum, either deepening students' understanding of development and sustainability or broadening their economic analysis skills. Like the sustainability-focused programs, students in these programs are required to complete a final project, which may be a capstone project, thesis, or dissertation. The interdisciplinary nature of these programs is also evident, incorporating elements from economics, econometrics, finance, management, political science, and other fields to provide a comprehensive understanding of development economics.

As the demand for skilled professionals in the fields of sustainability and development continues to grow, it becomes increasingly important to ensure that graduates from these programs are equipped with the necessary knowledge and skills to tackle complex challenges. To achieve this, universities offering these programs place a strong emphasis on interdisciplinary learning, allowing students to gain a holistic understanding of the various factors influencing sustainable development.



The flexibility offered by elective courses enables students to tailor their education to their specific interests and career goals. This adaptability ensures that graduates from these programs are prepared to contribute effectively to the evolving landscape across diverse sectors.

The emphasis on practical experience through internships, field studies, and final projects ensures that students have the opportunity to apply their theoretical knowledge to real-world situations. This experience is invaluable for preparing graduates for careers in sustainability and development, as it helps them develop the problem-solving skills and professional networks necessary to succeed in their chosen fields.

If looking into the future, the role of master's programs in sustainable development and management, environmental aspects, social aspects and innovation, as well as development economics, will become even more crucial. The ongoing global challenges, such as climate change, resource scarcity, and social inequality, require innovative solutions and a workforce equipped with the knowledge and skills to implement them. By continually adapting and updating their curricula, these programs can ensure that graduates remain at the forefront of their fields, ready to confront emerging challenges and contribute to sustainable development efforts worldwide.

Moreover, fostering international collaboration and exchange among universities offering these programs can further enhance the quality of education and share best practices. By encouraging students and faculty to engage with their counterparts from different cultural and regional backgrounds, universities can promote the development of diverse perspectives and ideas, which are essential for addressing complex global problems.

Another essential aspect of these programs is their ability to develop leadership skills and social responsibility in students. By emphasizing the importance of ethical decision-making, critical thinking, and effective communication, graduates are prepared to become effective leaders and change agents in their respective industries, regardless of it being in a public sector, non-governmental organizations, or private sector.

Master's programs in these three categories, play a vital role in shaping the future of sustainable development across the globe. Through their interdisciplinary and practically focused learning, they prepare a skilled and socially responsible workforce, able to tackle the world's most pressing challenges.



6 HOW SUSTAINABILITY IS ANCHORED AT THE PROGRAM COUNTRY UNIVERSITY

While teaching activities related to sustainability are important to prepare future leaders who will need to address continuous global challenges such as climate change, social inequality, etc., it should not be performed in isolation. Therefore, research activities; strengthening partnerships with businesses, government, and civil society; and promoting sustainability by setting an example for others to follow through committing to sustainability in their own operations and engaging in sustainability initiatives, is crucial to move toward a sustainable future. Thus, in this study, program countries also explain how sustainability is anchored at their institutions. This can serve as an overview of best practices of program country universities with strong commitment to sustainability.

6.1 Mendel University in Brno (MENDELU) and Sustainability

Authors: Martina Rašticová (MENDELU) and Nataliia Tkalenko (MENDELU)

MENDELU is a Czech university with sustainability as one of its core values. The University has implemented sustainability in various aspects of its operations, including research, teaching, and community engagement. MENDELU has a number of research centers and groups that deal with topics related to sustainability. MENDELU has research centers and groups that deal with topics related to sustainability, such as Center of Excellence for Sustainable and Energy Efficient Buildings. It conducts research on sustainable building design and energy efficiency, while the Renewable Energy Research Center focuses on renewable energy and its integration into the energy system. Other research areas related to sustainability in MENDELU include sustainable agriculture, forestry, and water management.

The Faculty of AgriSciences is implementing scientific projects on topics: Implementation of ecosystem services with a focus on water balance in viticultural practice (2021-2025), Healthy Buxus – the basis of environmentally sustainable plant protection of historical gardens and parks and public greenery (2022-2025). The Faculty conducts research on sustainable soil management, biodiversity conservation, and ecosystem services, which aimed to provide evidence-based recommendations for farmers, policymakers, and practitioners to implement sustainable solutions.

The Faculty of Regional Development and International Studies has its research goal on analyze the diversity and dynamics of biotic communities in relation to environmental factors: Development of effective tools to monitor and assess the ecological status and ecosystem services of ponds and to improve communication with stakeholders (2022-2025).

The Faculty of Business and Economics conducts research on sustainability-related topics, such as sustainable supply chain management, corporate sustainability reporting, and sustainable finance. The



research aims to contribute to the development of sustainable business practices as well as to provide evidence-based recommendations for businesses and policymakers. Thus, modelling of economic systems, including productivity, efficiency and sustainability topics was provided by Research Team Bioeconomic modelling. Another research team Smart Society is engaged in the research of 3 sub-areas – socio-economic, consumer behavior and management choice. The last area focuses on the impact of the process of integration, globalization, and development of the agricultural-food sector as part of the new conditions of the European integrated market. One of the faculty project - SmartFood (2022-2025) aims reducing food waste in cooperation with some ministries and departments.

In terms of teaching, sustainability is integrated into many of MENDELU's programs and courses. At the undergraduate level, the Bachelor's degree in Business Administration and Management offers a specialization in Corporate Social Responsibility. This program covers topics such as sustainable management, ethical decision-making, and stakeholder engagement. Students learn about the role of businesses in society and the importance of sustainability in business practices.

The Faculty of Forestry and Wood Technology offers a Master's degree in Sustainable Forest and Nature Management, which focuses on sustainable forest management practices and their impact on biodiversity and ecosystem services.

The Faculty of Regional Development and International Studies offers a Master's degree in Regional Development and Environmental Policy, which focuses on sustainable development, environmental policy, and natural resource management. The program includes courses on sustainable tourism, sustainable agriculture, and environmental governance, among others. The main courses that cover sustainable development are: Environmental Policy and Planning, Rural Development, and Sustainable Tourism.

Another faculty at MENDELU, the Faculty of Agri Sciences conducts a Master's degree in Agroecology, which focuses on sustainable agriculture, food systems, and rural development. The program includes courses on agroecology, sustainable food production, and rural development: Sustainable Agriculture, Soil Conservation and Management, and Forest Ecosystems Management.

At the graduate level, the Faculty of Business and Economics offers a Master's degree in Business Economics and Management with a specialization in Sustainable Business. This program focuses on sustainable management practices and the role of businesses in achieving sustainable development goals: sustainable finance, circular economy, and sustainable supply chain management. In addition to these degree programs, the faculty offers courses that cover sustainability-related topics, such as Sustainable Development and Corporate Social Responsibility. These courses are available to students from various degree programs.



MENDELU is planning to implement a master's interdisciplinary degree program Circular Economy. It is the result of collaboration of Faculty of Business and Economics, Faculty of Forestry and Wood Technology, Faculty of Agri Sciences. This program focuses on practical approaches to circular economy issues and responds to current economic, environmental and social changes. The program meets, among other things, the requirement to create ESG (environmental, social, governance) reporting, that is, the concept of sustainable management in the field of environmental and social factors and risk management factors) at the enterprise and company level. The main courses of program are Bioeconomy, Environmental Policy in Regional Development, Environmental Studies, and Global Climate Change.

Additionally, MENDELU contributes to the expansion of professional economic, social and natural knowledge in the context of a multidisciplinary approach that reflects the legislative and social needs in connection with the implementation of sustainable development goals. MENDELU is committed to promoting sustainability in research, teaching, and campus operations, and is contributing to the development of sustainable solutions for the region and beyond.

6.2 ELTE and its Approach to Sustainability

Authors: Rita Takács (ELTE); Anna Gogibedavili (ELTE); Viktória Nagy (ELTE), Ferenc Csizovszky (ELTE).

ELTE actively fosters inclusion and sustainability through various activities, university policies or projects. ELTE has been participating in the **CHARM-EU** (*Challenge-driven, Accessible, Research-based, Mobile European University*) European University alliance since 2019 that aims to create a new university model towards a more sustainable and inclusive future. The alliance is aligned with the European Values, the European Green Deal and the sustainable development goals (SDGs). All faculties of ELTE are participating in the alliance's work including more than 100 employees. It offers the joint Master's Degree program is in **Global Challenges for Sustainability**, a program of 90 credits (ECTS) consists of seven modules divided in 3 phases. Phase one consists of 30 ECTS credits in 3 modules: Sustainability, Social Innovation and Transdisciplinary Research. Phase 2 offers 3 thematic pathways from which students can choose (Food, Water, Life and Health). In this phase student choose 3 modules in one theme (30 ECTS). The phase 3, the capstone phase, is a synthesis of the prior learning via a final challenge-driven project. For 30 ECTS is when students work on a real-life sustainability challenge which is based on their original disciplinary field (experimental learning). Mobility is embedded in the CHARM-EU curricula. Participation in mobility during the Phase 2 is obligatory. In Phase 2 according to the field of choice students have to move to a different university from the Phase 1 location. In Phase 2 there is furthermore possibility for group blended mobility (optional). In addition in Phase 3 there is a possibility for Individual phase mobility



as well as optional. Capstone challenges of 2022-23 are following: The Blue label challenge: how to connect business to take action for ocean conservation; Heritage and sustainability on film; How to build strong and active garden communities; The SDG14 challenge: how to connect business to take action for ocean conservation; From agro-energy to green hydrogen; Environmental monitoring for reconciling humanity and the planet: human-livestock-wildlife; Green restoration for African food sovereignty; Communicating the seaweed revolution; Seaweed recovery; Understanding climate change sensitivity of watersheds and agro-ecological zones for selected countries in Southern Africa; Social Supermarkets: a positive contribution to sustainable food systems?; Build critical mass for sustainable business; One Planet Fellowship mentoring programme.

Since September 2021 more than 220 student mobility and around 40 educational mobility took place in the frame of CHARM-EU among the partner universities.

ELTE is member of the **EIT** (The European Institute of Innovation and Technology), which is strengthening Europe's capacity to innovate since 2008, with a network of 3 000 partners and over 60 innovation hubs. ELTE is participating in the **EIT Digital Master School** with a two-year master programme with eight technical Majors and a Minor in Innovation & Entrepreneurship. Students in this programme study at two different European universities and they receive MSc double degrees, and a certificate of the European Institute of Technology. Innovation and entrepreneurship, business skills are core aspect of the training. EIT Digital is acknowledged as the European Commission's preferred partner for EU activities in digital area.

EIT has set up to date nine Knowledge and Innovation Communities (KIC), which is composed of leading companies, research labs and universities addressing and solving global challenges, like climate change, renewable energy etc. The newest one is **EIT Culture& Creativity**, of which the only Hungarian founding partner is ELTE. Its mission is to strengthen innovation and power Europe's green and digital transformation.

ELTE is part of the **InnoChange** consortium project as well (Driving Change and Capacity Building Towards Innovative, Entrepreneurial Universities) which is part of a joint EIT Community activity, the **EIT's HEI Initiative**: Innovation Capacity Building for Higher Education. EIT HEI Initiative helps higher education institutions in capacity building for teaching innovation and entrepreneurship. Participants and stakeholders of the InnoChange Project are: managers, educators, mentors, university teachers, students, PhD students, non-academic staff and others.

Its guidelines include fostering a sustainable innovation ecosystem that enables technology development and innovation with an open mindset, promotes responsible and inclusive exploitation of resources. It includes supporting economic sustainability, supporting social sustainability, supporting environmental sustainability, strengthening partnerships for sustainability among partners, developing an understanding of sustainability in all dimensions.



ELTE participated in the **Uni-ECO** project as well, aiming to raise awareness about sustainability on university campuses, collaborate and contribute to the successful attainment of sustainable campuses. The Uni-ECO project takes inspiration in the Sustainable Development Goals, is also rooted in the Green Deal cooperation between 5 European universities

The **SusTrainable** - Promoting Sustainability as a Fundamental Driver in Software Development Training and Education is an ERASMUS+ consortium project in which ELTE has been participating which objective is to train the future software engineers in all aspects of sustainability into software engineering practice. This consortium consists of researchers and educators of 7 countries, 10 universities.

ELTE is committed to sustainability through the efforts of a non-governmental organization (NGO) called **ELTE EKSZ** („Együtt a Környezettudatos Szemléletért” – „Together for an Environmentally Conscious Approach”), which was established as a project in 2008 and has since gradually expanded into a program. The initiative was originally launched as a student-led endeavor with the support of institutional actors, driven by a bottom-up approach. The main pillars of the organization are institutional waste management, biodiversity conservation, environmental education, and policy-making, and the majority of its members are ELTE citizens.

The organization began with selective waste collection and recycling in university buildings and dormitories by purchasing paper and plastic eco-bins. However, since 2017, simple waste segregation has developed into a more complex domain of environmentally responsible waste management. The organization now strives to reuse waste as raw materials and recycle everything that is reusable and repurposable.

Biodiversity conservation is another area of focus for ELTE EKSZ. It includes the establishment of bee pastures, bird protection, mulch mowing, planting drought-tolerant plants in university gardens with the change of environment kept in mind, composting, and the creation of fruit gardens at the Erdős Pál dormitory.

In addition to promoting environmental sustainability, the organization serves as a community builder at the university. Given that most of the work is carried out by volunteers, maintaining their motivation and fostering a close-knit community is crucial. The organization offers workshops and lectures on environmental consciousness and sustainability. Students who complete 30 hours of volunteer work for EKSZ receive 3 elective credits.

The organization, which is always evolving and adheres to the 2015 waste management act, saves ELTE millions of valuable forints annually through volunteer work and low-budget solutions and methodologies. EKSZ is responsible for organizing and implementing selective waste management at the university.



The NGO is involved in several other noteworthy domains, including awareness-raising campaigns, DIY and craft workshops that utilize waste as a raw material, gauging the degree of environmental awareness in offices, departments, and dormitories, animal conservation, and garden maintenance.

ELTE EKSZ collects 400-450 tons of environmentally responsibly managed waste each year, with a waste capacity of 115,000 liters and a composting capacity of 55,000 liters. The organization has 50-200 volunteers involved in its activities every year, and its animal conservation program rescues 50 avian ducks and 10 hedgehogs annually.

6.3 Sustainability as a Major Concern in Pablo de Olavide University (UPO)

Author: Carmen Correa (UPO)

Sustainability is a relevant issue in Pablo de Olavide University (UPO) and a major concern at the board level. Entrusting the University Chancellor's Delegate for Sustainable Campus with the responsibility to inspire, drive, nurture and embed a proactive culture that embraces sustainability issues, UPO is particularly focused on developing energy transition (photovoltaic plant and energy efficiency program), safeguarding biodiversity, promoting sustainable mobility, fostering SDGs and Agenda 2030, protecting UPO lagoons and wetlands, running sustainable vegetable gardens, running a radio programme on sustainability, raising awareness through a programme on sustainable and healthy food, calculating carbon footprint and certifying carbon footprint calculation and reduction by means of a GHG emission's reduction plan for campus decarbonisation.

Pablo de Olavide University also coordinates the International Campus of Excellence of Environment, Biodiversity and Global Change, CEI CamBio³⁴. CEI CamBio is a meeting point around the environment, biodiversity and global change, representing a network of over 200 members and standing as a platform for the projection of joint projects in environmental issues.

In addition, UPO is starting to incorporate certain environmental criteria to foster more sustainable public procurement, and it is also facilitating the purchase of natural and local products to university staff and students.

Beyond governance and more operational issues referred above, sustainability issues also reach teaching and research activities. Research staff from different departments engage in conceptual and empirical research on climate change and sustainability issues, including departments involved in the Faculty of Business Administration, where staff is conducting sustainability related research in the field of Accounting, Finance, Management, Human Resource Management, Innovation and Marketing.

³⁴ <https://www.upo.es/ceicambio/wpceic/>



The Faculty of Business Administration of UPO is a signatory of the Principles for Responsible Management Education (PRME), the Higher Education version of the Global Compact United Nations initiative. The Faculty of Business Administration offers a course on Accounting for Corporate Social Responsibility in the degree of Accounting and Finance and a course on Corporate Social Responsibility in the degree of Business Administration. The University also has a research Center called CICSMA – Centro de Investigación en Contabilidad Social y Medioambiental (CICSMA) (Center for Social and Environmental Accounting Research). This center, pioneered by Francisco Carrasco and Carlos Larrinaga, organize since 1997 an international conference on social and environmental accounting research where academics from the Spanish network and other countries meet every two years to share and advance research in this field. The meeting is a part of the conferences sponsored by the Center for Social and Environmental Accounting Research (CSEAR), based at the University of St Andrews (Scotland). Founded by Professor Rob Gray, CSEAR provides a meeting point for researchers from around the world interested in studying how accounting contributes to a more sustainable society, helping to promote quality and relevant research and teaching, as well as to foster the collaboration with professionals and regulators in the field of social and environmental accounting.

6.4 Sustainable Development and Management in Activities and Curriculum of the University of Economics in Bratislava (EUBA)

Authors: Anetta Čaplánová (EUBA) and Ľubomír Darmo (EUBA)

The University of Economics in Bratislava (EUBA) emphasizes the importance of sustainability in all aspects of the institution, including managerial and administrative processes, research activities, and the mission. The university's mission and vision statements include principles of sustainability, development, and responsibility, which are also reflected in The Plan of Sustainable Development, a comprehensive document outlining the university's commitment to sustainable practices and responsible behavior in all areas of development.

To promote sustainability and development in education, EUBA offers courses that cover a wide range of topics, such as environmental economics, green marketing, innovation management, project management, development economics, sustainable development, regional development, sustainability of natural resources, and corporate social responsibility. In addition, the university supports students' engagement with sustainability and development through events like the Sustainability festival, which is an international competition for student teams to identify and solve problems in different countries.

EUBA also recognizes the importance of sustainability and development in research activities. The establishment of the Research Institute of Trade and Sustainable Business at the Faculty of Commerce provides support for research teams and encourages cooperation between academic, public, and



private sectors. The university regularly hosts workshops and conferences featuring international speakers to engage students and scholars with these critical topics.

6.5 Comparative Analysis

Author: Michaela Bednárová (UPO)

In an increasingly interconnected world, the role of universities in driving sustainable development has gained significant importance. As we embark on the path towards a more sustainable future, it becomes crucial to examine the efforts and contributions of universities in promoting sustainability through research, partnerships, alliances, and teaching. We believe that a synergy of all these dimensions is crucial to move towards a sustainable future. This brief comparative analysis (Table 2) aims to shed some light on the diverse approaches and initiatives undertaken by program country universities, focusing specifically on their research (activities, groups, and projects) related to sustainability, their partnerships with institutions, businesses, communities, governments, and their commitment to sustainable campus practices. By exploring these dimensions, we can gain some understanding of how universities are shaping the sustainability landscape and fostering positive change on a global scale. As we can observe in Table 2, all program country institutions are aware of the importance of this synergy.

Aspect	MENDELU	ELTE	UPO	EUBA
Research	+++	++	++	++
Teaching	+++	++	+	++
Partnerships	++	+++	++	+
Sustainable campus	++	+++	+++	++

Table 2. Comparative analysis of sustainability aspects at universities

Source: Authors' elaboration



7 TOWARDS A COMPREHENSIVE CURRICULUM MEETING THE NEEDS OF 21ST CENTURY

Author: Michaela Bednárová (UPO)

7.1 The Importance of Soft Skills Training in HE

There is a large body of academic literature on the importance of soft skills, with many recent studies highlighting their significance in today's workforce (Bak et al., 2019; Garcia-Alvarez et al., 2022; Ghosh, 2022; Lozano-Fernandez and Ortega-Cabrejos, 2022; Sucio and Lacatus, 2014; Succi and Canovi, 2022).

Overall, these studies suggest that soft skills are crucial for success in today's workforce and should be emphasized in education and training programs. The importance of soft skills in sustainable management has been increasingly recognized in recent academic literature as well.

Lozano-Fernandez and Ortega-Cabrejos (2022) analysed the importance of soft skills and the need to incorporate them in a higher education curriculum. Their study found that skills such as communication skills, teamwork, problem-solving and time management are among the most necessary skills to be developed in students for their future social and professional development. Similarly, Suci and Lacatus (2014) highlight the importance of soft skills in economic education within the complex context of a knowledge-based society. Succi and Canovi (2022) examined employers' perceptions regarding the importance of soft skills. Their findings show that 86% of respondents indicate an increased emphasis on soft skills over the last decade. Bak et al. (2019) explored the soft skills demand in supply chain management area. Their results suggest that soft skills such as behavioural skills, communication, planning, initiative and negotiation are considered the most relevant.

Various authors confirmed that soft skills improve the employability of students in the changing and competitive present job market (Succi and Canovi, 2022; Ghosh, 2022; Garcia-Alvarez et al., 2022).

These studies highlight the importance of soft skills, emphasizing the need for leaders and managers to develop and utilize these skills in order to create more sustainable and responsible organizations.

7.2 The Importance of CDR as an Integral Part of Sustainability

Corporate Social Responsibility (CSR) is related to threats related to environmental, social and governance (ESG) issues. Nevertheless, over the last decade, we have been witnessing a shift in a business model, which is mostly influenced by technology. Thus, with the rapid evolution of new technologies such as artificial intelligence (AI), automation and automated decision making (ADM), machine learning (ML), etc., we are facing new threats which should be addressed accordingly.



Therefore, a new aspect of corporate responsibility has raised, referred to as a corporate digital responsibility (CDR). Academic literature is still trying to contextualize this topic, understand the scope of it and provide definitions. Table 3 lists some definitions of CDR.

<p>“ ... a voluntary corporate orientation to ensure a responsible use of digital technologies.” Weißberger and Marrocco (2022)</p> <p>“ ... a set of shared values and norms guiding an organization’s operations with respect to the creation and operation of digital technology and data.” Lobschat et al. (2021)</p> <p>“ ... an extension of a firm’s responsibilities which takes into account the ethical opportunities and challenges of digitalization.” Herden et al. (2021)</p> <p>“ ... a set of practices and behaviors that help an organization use data and digital technologies in a way that is socially, economically, and environmentally responsible.” Wade (2020)</p>
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Table 3. CDR definitions

Source: Authors’ elaboration

Some authors, and even companies, view digital responsibility as an integral part of sustainability. As Figure 2 suggests, sustainable development needs digital transformation. Yet, digital transformation requires digital responsibility, which would foster trust that would eventually enable digital transformation.



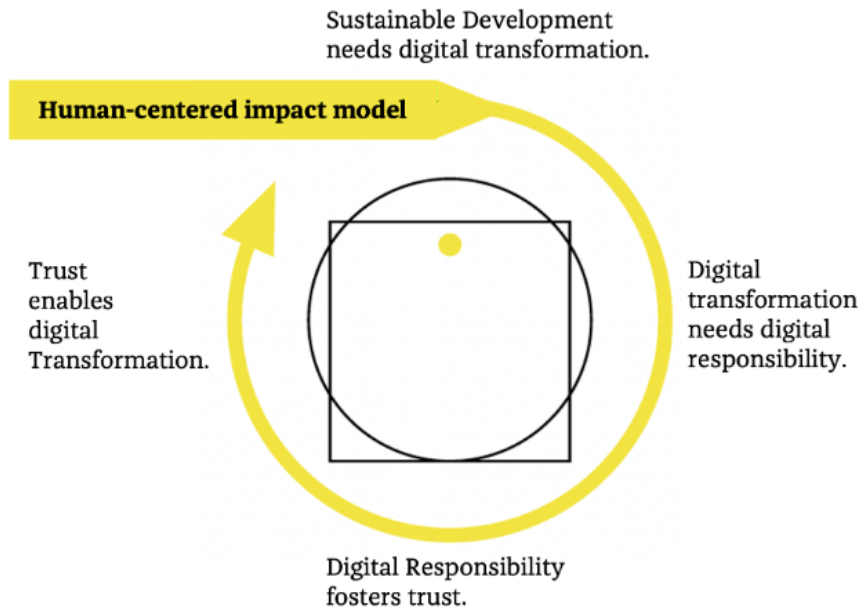


Figure 2. Sustainability and Digital Responsibility

Source: Identity Valley

Hence, responsible digitalization is crucial to sustainability. The awareness of digital responsibility or CDR varies from country to country. There are countries, such as Germany, which are more advanced in this matter and count with initiatives such as Digital responsibility goals (DRGs) or CDR code for corporate disclosure.

In today's digital age, businesses are increasingly relying on technology to enhance their efficiency in production processes, marketing, human resources and other areas. Nevertheless, the increased use of digital technologies also presents significant challenges related to data privacy, cybersecurity and even raise certain ethical questions. Therefore, including a module related to corporate digital responsibility in the Master in Sustainable Development and Management program should be considered. The module could cover topics such as digital risks, cybersecurity, data protection, trustworthy algorithms, etc. Incorporating such a module into the Master in Sustainable Development and Management could equip students with the relevant knowledge and skills necessary to manage the sustainability challenges posed by digital technology and enable them to develop more comprehensive and sustainable solutions.

8 THE ROLE OF STUDENT SERVICES AND NON-FORMAL EDUCATION

8.1 The Importance of Student Service Related to Retainment in Masters' Programs

Authors: Rita Takács (ELTE); Anna Gogibedasvili (ELTE); Viktória Nagy (ELTE), Ferenc Csizovszky (ELTE).

The Student Support Centre plays a key role in promoting students' academic success and preventing student dropout. ELTE, one of the consortium partners has such centre. Its complex prevention and promotions program includes among others: curriculum development; student trainings; mentor program; mental health services; community building activities.

Courses and trainings

The most important pillar of the prevention program is a special course developed and designed for the first-year students both on the BSc and on the MSc programmes. It aims academic, social and cultural integration of students, and building strong peer communities in the university.

The courses have different names and content, as they are adjusted to the specificities of the target groups: BSc students vs. MSc students, but their structure is similar. They are aimed to support students through the transition period to a new educational system, a new life phase, new environment, and in case of international students to a new culture and a new country. For BSc students the main focus is on the change from higher education system to university education, and the challenges of the emerging adulthood after the teenage period. Living far from their families, managing their everyday life, in case of foreign students in a different culture and country. For MSc students the focus is more on getting used to the requirements of a different higher educational system than what they have experienced and helping them to set attainable career goals.

On the MSc programme the course name is: *Preparation course for Master studies and learning skills.*

The structure of course on the MSc programme is the following:

- Training sessions: soft-skill development training held by a psychologist trainer
- Mentor class: a weekly conversational class, lead by a Mentor teacher and a Senior student

The Mentor class is an informal forum-like class that promotes information flow and offers professional guidance. The first-year students get to know more about the university, culture, and local way of life. They also receive guidance regarding administrative issues and procedures. Adding to this general



guidance, they receive mentoring in their professional field of science and how to access academic opportunities. This class offers a trusting community where students can look for solutions to their challenges in a safe space.

The Mentor teacher is an academic professional from their studied field, and the Senior student is a higher year student who went through a selection-and training process, who can help students with their own experiences as a peer.

The Training is soft skill development training sessions, which goal is to equip students with necessary soft skills that they are going to rely on during their studies and later entering the labour market as professionals as well. On the other hand, the training is designed to facilitate the forming of strong peer communities by its team building nature, which can be a protective factor during the university studies in student retention. Some of the topics the training covers are: teamwork, leadership, intercultural sensitivity, professional identity, time management, stress management, etc.

The course credit value is 2 ECTS, weekly 3 practical classes (2 academic hours training + 1 academic hour mentor class). One academic hour equals 45 minutes. The total number of lessons: between 43-45 academic hours/ semester.

The course is obligatory in the first semester and it can not be postponed to later semesters. Without completing the course, students can not graduate.

Needs of MSc students that are addressed during the mentoring:

- Guiding and supervising the students fulfilling their degree requirements
- Guiding and assisting the students selecting their thesis or dissertation research
- Guiding and improving the students through their professional development

ELTE also provides students with elective courses, like Team management, or free training- workshops which are separate events, and not a part of an academic course (Time management, Relationships workshop etc.).

Mental health services

Mental health services like individual psychological counselling is a free available service at ELTE. The individual counselling topics are not exclusively academics and study related. Students can book an appointment for counselling in family, relationship, life phase related matters, performance anxiety, stress management, social life related difficulties, homesickness, cultural shock, career guidance, emerging adulthood, self-awareness. It can be a coaching session consisting of a couple of meetings, or a psychological counselling process that can last even throughout more semesters. However, the



problematic area has to be well defined. The psychotherapy support to students in the frames of the university is not provided. In necessary cases, students are directed to mental health care providers.

Community building

This service includes the support of peer-to-peer activities. There are voluntarily organized peer-to-peer mentoring groups with the aim to promote social life on the university campus and beyond, by organizing events like: city walk, language clubs, intercultural night etc.

Some special attention areas with first year international students relates to cultural diversity. Students come from completely different cultural, religious, family, and socio-economical backgrounds and might have different academic motivations. The potential problems they might face relate to cultural shock, homesickness, language barrier, etc. Therefore, the main focus here is to enhance their level of adaptation and motivation.

8.2 The Role of Non-Academic Sector and Its Approach to Sustainable Management Education

Author: Gabriel Adámek (No-gravity) and Jozef Wallner (No-gravity)

The non-academic sector has been gaining in importance when it comes to delivering master programs related to sustainable development and management. As the demand for sound management capabilities and lasting practices is growing, more companies are looking towards non-academic sources for their educational needs. Through providing specialized courses, these entities can offer relevant understanding into the difficulties of handling resources with an eye toward long-term sustainability. From project planning to budgeting methods, such curriculums provide workers with the tools they need to make knowledgeable decisions regarding how best to reach their targets in terms of sustainability. With a focus on both practical knowledge and theoretical comprehension, these classes can give learners a robust base from which they may access the domain of sustainable development and management confidently.

Overview of Non-Academic Sector's Role in Provision of Master Program Related to Sustainable Development & Management

As the need to protect our environment increases, it is essential that we have professionals who understand how sustainability can be achieved. For those looking to develop their knowledge in this field, master programs connected to sustainable development and management can provide a comprehensive overview of key principles such as its definition, importance, and strategies for implementation. The non-academic sector offers an outstanding chance to gain real-world experience



relevant to coursework through internships or fellowships with decision makers devoted to creating solutions that promote environmental protection or social justice causes. Moreover, mentorship programs offer young professionals the opportunity to acquire practical skills which they can use when studying topics like climate change adaptation and renewable energy initiatives.

Benefits of Master Programs for Sustainable Development & Management

Non-academic entities, such as businesses and public organisations, are essential in the provision of master programs related to sustainable development and management. Students can benefit tremendously from such opportunities; experience gained through internships or work placements gives them direct exposure to the challenges faced by these companies when it comes to sustainability initiatives that they can integrate into their classroom learning. Moreover, mentors may be available to provide guidance on how best to apply knowledge acquired during study.

Furthermore, funding opportunities for students pursuing a master's degree related to sustainable development and management include scholarships or grants from government departments or private foundations – providing financial assistance which eases some of the burden associated with attending university courses in this field. Additionally, working with an organisation within this sector during studies will give graduates access not only to current trends but also new technologies that could revolutionise their future career prospects within this field - helping enhance employability.

Finally, further training opportunities offered by many organisations - such as seminars or workshops focused on topics relevant for those already employed in these sectors and those just starting out - can greatly enrich both groups beyond what is typically offered at universities etc., offering yet another avenue whereby graduate students may broaden their horizons.

Challenges Faced by Non-Academic Sectors Providing Master Programs

Non-academic entities have been making great strides in providing master programs concerning sustainable development and management. Distinguished for their progressive strategies, these organizations keep striving to bring about beneficial transformations to the world. However, several obstacles hinder them from offering such courses with success. Firstly, they tend to be restricted by inadequate resources necessary for delivering a quality education; this includes a lack of financial means to secure qualified instructors who can teach advanced classes related to sustainability and managerial matters. Additionally, it is also difficult for them to find faculty members experienced in teaching graduate level lessons on sustainability or managerial topics. Furthermore, accessing technology needed for digital learning modules designed especially for sustainable development and managerially oriented subjects often proves challenging as many students need access to up-to-date information regarding current trends so as better understand the subject at hand during master program courses on this topic area. Lastly, accreditation requirements imposed by universities or other



educational governing bodies complicate these organizations' ability of offering authenticated graduate degrees linked with sustainability and management without proper accreditation from an accredited university or college institution recognized by such governing body. Thus, it is imperative that these establishments comprehend what kind of authorization is mandated before being able to provide legitimate postgraduate degree programs associated with sustainability and managements issues within their organization's scope.

Examples of Successful Non-Academic Providers of Master Program on Sustainable Development & Management

The non-academic sector has a significant part to play in the provision of master programs associated with Sustainable Development and Management. There are organizations that specialize in promoting sustainable practices and initiatives within particular fields, which do not typically focus on education but offer courses, seminars and other learning materials for those wishing to gain an insight into issues related to sustainability. Notable examples include The Clean Air Act Alliance (CAAA), Global Green USA, The Environmental Defense Fund (EDF) and The Nature Conservancy (TNC).

The CAAA offers information regarding air quality regulations as well as classes such as environmental law, clean energy technology and green building design principles. Global Green USA is a leader when it comes to sustainability campaigns advocating climate protection by providing grants for projects aimed at reducing carbon emissions. EDF aims to secure people's health through protective environmental measures while TNC works with local communities throughout North America towards land preservation goals.

These organisations provide educational resources which allow individuals without a traditional academic background the chance for professional development in the field of sustainable development or management. They have access to experts who can assist them in understanding topics like social justice advocacy; policy analysis; economic strategy; communication techniques; research methods; project management skills; problem solving strategies etc., all necessary tools used when developing solutions contributing towards global objectives of sustainability.

Necessary Skills Required for Effective Participation in the Non-Academic Sectors' Provision of Sustainability and Management

The need for individuals to participate in master programs related to sustainability and management has become increasingly important, hence certain skills and qualities are essential. The ability to think strategically, be analytically savvy, creatively solve problems and communicate effectively are all fundamental traits for those taking part in such initiatives. Moreover, possessing a strong ethical code is necessary as it enables them to make decisions that benefit the environment while also reducing resource consumption. These attributes not only help produce successful outcomes on an individual



level but also create an atmosphere where participants can learn more about sustainable practices through collaboration between universities and non-academic organizations.

Impact Assessment Tools Used by the Non-Academic Sector to Gauge Effectiveness and Outcomes

When it comes to the non-academic world investing in master programs with regards to sustainable development and management, measuring impact is a must. Assessment tools make it possible for these organizations to assess how successful they are in realizing their mission goals. These instruments can give invaluable insight into how their activities are making a difference in the respective communities. They let them measure how well they're achieving their aims as well as evaluating the success of implemented initiatives or projects.

One popular tool used by such institutions is social return on investment (SROI). This approach helps calculate the financial value of certain activities so that an overall positive result stemming from implementing changes may be determined; SROI offers entities operating within limited resources an effective way to figure out if they're making real progress when it comes to generating social benefit from each dollar spent on a project or initiative .

Another type of assessment instrument employed by non-academic entities is program logic models (PLMs). PLMs provide an overview of intended activities and expected outputs, allowing organizations recognize any potential snags that could obstruct them from succeeding with certain endeavors. The models also supply guidance about which elements should be monitored so that progress towards objectives may be tracked over time, helping guarantee plans remain on course throughout implementation stages up until completion.

Qualitative surveys might also prove beneficial while trying to gauge impact within this sector's context. Qualitative surveys offer direct feedback from participants which provides understanding into why some outcomes were accomplished or not achieved, thereby aiding decisions concerning upcoming techniques or approaches that need to be taken going forward so that desired results may possibly be gained more effectively and efficiently down the road.

Strategies Adopted By the Non-Academic Sector to Enhance Success Rate in Delivery of Sustainability and Management Master Programs

In the modern age, organizations are placing a heavy emphasis on sustainable development and management. To understand how non-academic sectors can contribute to providing master programs in these areas, there are several approaches taken by them. Firstly, collaboration between educational institutions and other stakeholders from both academic and non-academic fields is essential for success as it provides multiple insights into sustainability practices and management theories. Additionally, private businesses that specialize in such topics may be called upon for their expertise or mentorship for students enrolled in such courses - presenting an opportunity to learn from experienced professionals



on a more personal level than traditional methods alone. Finally, simulation exercises have been increasingly implemented which enable students to apply theoretical concepts while also bridging the gap between academia and industry standards outside of universities - giving graduates a higher chance of succeeding beyond graduation.

Best Practices Identified from Global Experiences with Respect to the Role Played by the Non-Academic Sectors in Delivering Sustainable Development & Management Programs

In recent times, the involvement of non-academic institutions in providing Master's programs related to sustainable development and management has become increasingly prominent. As organizations and governments have come to recognize the necessity of taking steps towards developing their environmental sustainability, they are turning to non-academic sectors for direction and proficiency. In response, numerous universities have set up master courses that centre around ecological sustainability and governance. These typically involve coursework encompassing topics such as climate change, conservation of natural resources, energy efficiency, waste disposal, public policy-making and corporate social obligation - along with other connected subjects.

Furthermore, students enrolled in these classes are presented with the opportunity to gain a global perspective on best practices through interactions with guest speakers from different countries. For instance those studying international climate change adaptation may hear from an expert from India about how local communities there have modified traditional farming methods for enhanced resistance against varying weather patterns; or a student learning about water conservation might be informed about pioneering rainwater harvesting techniques that are being used by farmers in Africa or South America. With this information learners can obtain valuable knowledge regarding how people across the world are tackling global issues associated with sustainable development and management which can help them better understand what strategies could possibly be most effective when they enter their careers.

Moreover it is also possible for those attending these courses to discern various approaches adopted by diverse nations or regions concerning matters like pollution reduction or energy efficiency initiatives which could then serve as examples they could either replicate back home or adapt based upon local needs if need be; not forgetting hearing first-hand reports from people who have already implemented successful solutions provides them inspiration for potential endeavours that could potentially be carried out at individual level -or even organizationally once they embark upon professional practice after graduating. Additionally, such experiences will enable students to identify zones where further research is needed so future professionals will possess appropriate tools when addressing similar problems within their own organisations/communities down the track.



9 CONCLUSIONS

There is a growing need for graduates of Master's in Sustainable Development and Management in the labour market. This is because sustainability has become a critical issue for organizations across industries, and there is an increasing demand for employees who have the knowledge and skills to manage sustainability initiatives and implement sustainable practices.

Employment in environmental and sustainability-related occupations is projected to grow by 8% from 2019 to 2029, which is much faster than the average for all occupations. This growth is being driven by a range of factors, including increased demand for clean energy, greater awareness of environmental issues, and growing interest in sustainable business practices.

In addition to this overall trend, there are specific industries where the need for sustainability professionals is particularly acute. For example, the renewable energy sector is growing rapidly and is expected to continue to do so in the coming years. This sector requires employees with the knowledge and skills to develop and implement sustainable energy solutions.

Similarly, the manufacturing industry is under pressure to reduce its environmental impact, and requires employees who can manage sustainability-related projects and implement sustainable practices.

Overall, the need for graduates of Master's in Sustainable Development and Management is growing across a range of industries, as organizations seek to become more environmentally and socially responsible. By acquiring the skills and knowledge needed to promote sustainability, graduates of such programs can make a positive impact on the labour market and contribute to creating a more sustainable and equitable world.

Therefore, university education in sustainable development and management is key for preparing future business leaders, mitigating environmental and social risks, creating value, meeting stakeholders' expectations, and contributing to sustainable development. Thus, business schools have a great responsibility to provide their students with necessary knowledge and skills needed to address environmental, social and other challenges, to help businesses contribute to a more sustainable future. Nevertheless, we should not omit the role and advantages of non-formal education in this matter and how masters program designed in the collaboration with non-academic educational organizations might benefit of such cooperation.

When it comes to the content of modules, new trends such as CDR or soft skills should be mentioned as well. The academic literature underlines the increasing role and importance of teaching soft skills in education and the need to incorporate them in a higher education curriculum. Soft skills are an essential component of success in any career, and this is especially true in the field of sustainable development and management. While technical skills are necessary for carrying out specific tasks and projects, soft



skills are critical for effective communication, collaboration, problem-solving, and leadership. According to Garcia-Alvarez et al. (2022), universities should incorporate so called pedagogies for employability, which would strengthen the link between the academic setting and the socio-occupational reality and thus will ensure that graduates make a smooth transition to the world of work.

On the other hand, the increasing reliance on digital technologies in business operations necessitates a focus on CDR. Thus, CDR as a new aspect of sustainability is gaining momentum on the global level and therefore should be reflected in the curriculum, if we want to design a comprehensive and up-to-date master program.

Master's programs in sustainable development and management at business schools vary in their specific course offerings and curriculum, but here are some common categories:

- *Programs focused on sustainability and management*
- *Programs focused on social aspects and innovation*
- *Programs focused on development economics.*

The analysed master programs tend to have an interdisciplinary character and focus on combination of compulsory and elective courses. Having an option to combine those courses can allow students to gain foundational knowledge while also having the flexibility to explore their interests and passions within the field.

When it comes to the organization of Master's programs, there are certain best practices that can make a program stand out, be more competitive on the global level, and provide students with a comprehensive and unique educational experience.

First, offering part-time and full-time options can accommodate students with different schedules and goals. This kind of flexibility can be helpful for working professionals who want to continue their education while still maintaining their careers. Providing evening classes for working professionals can make it easier for them to attend classes without having to sacrifice their work commitments.

A multidisciplinary approach is also one of the key aspects in addressing complex sustainability challenges. Combining various fields and perspectives, such as natural and social sciences, can help students gain a comprehensive understanding of the issue and develop well-rounded solutions.

Capstone projects, research projects, or master's theses can provide students with hands-on experience and allow them to apply their learning to real-world problems.

Field trips, internships, and company visits can give students the opportunity to see sustainability in action and gain practical experience in the field.



Having renowned researchers or industry professionals as guest speakers or mentors can provide students with invaluable insights and connections with the field.

Creating labs or living labs, such as the Sustainable Development Living Lab at KU Leuven, can provide students with a space to experiment and innovate in a real-world setting.

A joint approach, such as the one between the Department of Earth Sciences and the Department of Economics, can bridge societal and ecological sustainability challenges by combining natural and social science perspectives.

Extracurricular activities, such as conferences and networking events, can provide students with opportunities to connect with others in the field and gain a broader understanding of sustainability issues.

Finally, having an alumni network of global change makers, including CEOs, government officials, professors, and social entrepreneurs, as at the Erasmus University Rotterdam, can provide students with ongoing support and connections in the field beyond their time in the program.

Overall, incorporating these best practices can create a comprehensive and valuable educational experience for Master's students in the field of sustainability.

The specific modules offered will depend on the program and the business school, which may be influenced by national/regional policies and general commitment to sustainability and SDGs of the country or institution and other factors related to specialization of the study program.



10 EXECUTIVE SUMMARY

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This contextual report provides an overview of master's programs in sustainable development and management, focusing on the current state of the field and emerging trends in the world and in the EU. Sustainable development and management is an increasingly important area of study, as businesses and organizations face growing pressure to address environmental and social challenges.

The report begins by outlining the key features of sustainable development and management, including the principles of sustainability, sustainable development goals (SDGs), the importance of sustainability curriculum at business schools, recent initiative of UN and the EU in the field of sustainability education, and the challenges and opportunities of implementing sustainability in practice. The report then provides an overview of the current landscape of master's programs in sustainable development and management, including the types of programs offered, the institutions offering them, and the geographic distribution of programs.

Emerging trends in the field are also highlighted, such as the growing emphasis on transversal (soft) skills and digitalization in sustainability development context.

Finally, the report concludes with recommendations for future and action in the field of sustainable development and management. These include the need for continued innovation and experimentation in sustainability education, the importance of building partnerships between businesses and academic institutions, and the need for increased collaboration and knowledge-sharing across sectors.

Overall, this contextual report provides valuable insights into the current state of Master's programs in sustainable development and management and summarizes the main features of those programs. It will be of interest to students, academics, business professionals, policymakers, and other stakeholders seeking to stay informed about the latest trends in sustainability education, in particular, on a Master level.

The elaboration of this study started in January 2023 and it was a collaborative task among MASUDEM program country institutions, namely UPO (WPL), EUBA, MENDELU, ELTE and NO-GRAVITY. UPO was in charge of describing the context of sustainability education, methodological approach, analysis, and description of new trends such as soft skills and CDR as integral parts of a competitive Master curriculum, and drawing main conclusions. EUBA, MENDELU and ELTE described in depth Masters related to this topic in leading institutions. In addition, all academic institutions described how sustainability is anchored at their university. Last but not least, ELTE and NO-GRAVITY provided interesting insights into the importance of student services related to retainment and the role of non-academic organizations in education related to sustainable development and management.



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