

# Postgraduate Certificate Environmental and Energy Management in Organizations



## Postgraduate Certificate Environmental and Energy Management in Organizations

- » Modality: online
- » Duration: 6 weeks
- » Certificate: TECH Global University
- » Credits: 6 ECTS
- » Schedule: at your own pace
- » Exams: online

Website: [www.techtute.com/us/engineering/postgraduate-certificate/environmental-energy-management-organizations](http://www.techtute.com/us/engineering/postgraduate-certificate/environmental-energy-management-organizations)

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# 01

# Introduction

This Postgraduate Certificate program offers a detailed training in the organization of companies with a study focused on the management of all aspects related to the environment and sustainable development. The historical, current and future environmental problems will be discussed in detail, focusing on critical aspects such as atmospheric, residual and aquatic pollution. An opportunity to update and complement your knowledge with the quality of the best online university in the current educational panorama.







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*A comprehensive and up-to-date immersion into the most innovative aspects of Environmental and Energy Management in Organizations"*

Throughout this program we will analyze the competency and regulatory frameworks, in which the producer levels, the distribution of competencies and public actions in environmental matters will be developed.

Major international agreements on sustainability such as the Paris Agreement and the United Nations Sustainable Development Goals will be covered. As well as the 2050 Roadmap and the National Integrated Energy and Climate Plan (Spain), analyzing the contribution of organizations to the fulfillment of the objectives established in each of the agreements.

Finally, we will delve into the circular economy, developing in depth the fundamentals, legislation and strategies related to it. In addition to communication, preparation and development of sustainability reports and non-financial reports.

By completing and passing the evaluations of this program, the student will obtain a solid knowledge of the rules and regulations to be applied in relation to Environmental and Energy Management in Organizations. A complete, high-intensity program, which will allow students to incorporate into practice the most up-to-date knowledge in this field of work. A highly interesting subject due to its current relevance and the mandatory integration of the standards that will be studied in the program.

With an approach focused on efficiency, this program has been created to allow students to optimize their efforts and achieve the best learning results in the shortest possible time. Additionally, as it is a 100% online program, the student is not constrained by fixed timetables or the need to move to another physical location, but can access the contents at any time of the day, balancing their professional or personal life with their academic life.

This **Postgraduate Certificate in Environmental and Energy Management in Organizations** contains the most complete and up-to-date educational program on the market.

The most important features of the program include:

- ◆ Practical cases presented by experts in Environmental and Energy Management in Organizations
- ◆ The graphic, schematic, and practical contents with which they are created, provide scientific and practical information on the disciplines that are essential for professional practice.
- ◆ Practical exercises where the self-assessment process can be carried out to improve learning
- ◆ Its special emphasis on innovative methodologies
- ◆ Theoretical lessons, questions to the expert, debate forums on controversial topics, and individual reflection assignments
- ◆ Access to content from any fixed or portable device with an Internet connection.



*An intensive and highly effective program that will place you among the most highly skilled in the environmental and energy management sector"*

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*A study focused on practice, using the best audiovisual systems in the educational market, to provide you with an immersive learning experience"*

Supported by excellent multimedia content, developed with the latest educational technology, this program will provide the professional with situated and contextual learning, i.e., study in a simulated environment that will provide immersive learning programmed to train in real situations.

The design of this program focuses on Problem-Based Learning, which means the student must try to solve the different real-life situations of that arise throughout the academic program. For this purpose, the professional will be assisted by an innovative interactive video system, developed by renowned and experienced experts in Environmental and Energy Management in Organizations

*A 100% online program that will allow you to combine your studies with your professional work with maximum organizational flexibility.*

*Integrate the requirements that current environmental management standards demand in any project or organization into your way of working.*



# 02

# Objectives

The Postgraduate Certificate in Environmental and Energy Management in Organizations has the general objective of boosting the performance capacity of professionals in this field so that they can incorporate the main advances in this field of work and intervention.







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*The objective of this program is to give you the most comprehensive and up-to-date knowledge in Environmental and Energy Management in Organizations”*



## General Objectives

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- ◆ Gain an in-depth understanding into business organization and climate change mitigation strategies
- ◆ Develop a solid understanding of the main energy sources used globally and innovations in the energy industry
- ◆ Gain an in-depth understanding of electrical energy, breaking down the main consuming equipment and its applications
- ◆ Master the most commonly used fuels and fuel consuming equipment
- ◆ Training in the use of environmental and energy tools



*Professional growth that will give you the upgrade boost you've been looking for"*





## Specific Objectives

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- ◆ In-depth study of the organizational foundations of companies
- ◆ Understand and concisely learn the current regulatory framework, international agreements and the SDGs
- ◆ Analyze aspects related to sustainable development and current environmental and energy issues
- ◆ Gain an in-depth understanding of the circular economy and its environmental benefits
- ◆ Understand and internalize the function, systematics and applicability of sustainability reports



04

# Course Management

A multidisciplinary teaching staff will offer the most up-to-date and comprehensive knowledge in this field, accompanying the professional during the learning process and making available their experience and real vision of the profession. A unique opportunity to learn directly from experts in this field of work.





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*You will learn from experts in this sector, who will provide you with a specific and direct vision of the reality of this field of work”*

## International Guest Director

With an exceptional professional career, Sarah Carson has focused her research on environmental compliance and sustainability in higher education. For more than 3 decades, she has been part of Cornell University's research team charged with implementing and analyzing the impact of policies for the care of natural resources. Thanks to her experience in this area of expertise, she has been chosen to lead the Office of Campus Sustainability at Cornell University.

In this way, this expert directs the electricity supply projects, aimed at reducing the carbon footprint of the higher education center. As such, she has implemented innovative technologies that help, for example, to maintain high temperatures during the winter in the educational facilities. Specifically, her team has opted to implement a renewable geothermal heat source called "ground-source heat", the beneficial results of which have already been reported in several global impact reports.

At the same time, she has actively participated in the energy policy of New York, related to the generation of renewable energy. To this end, she has collaborated in the volunteer program for the Regional Greenhouse Gas Initiative in this US state. The latter is based on the Cap and Trade model, which allows the university, the local government and other participants to claim renewable energy credits.

As for her academic life, Carson holds a degree in Natural Resources Management and Policy from North Carolina State University. She also holds a degree in Environmental Science and Policy from the School of Environmental Science and Forestry at the State University of New York.



## Ms. Carson, Sarah

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- Director, Office of Sustainability, Cornell University, New York, United States
- Head of Campus Climate Action, Cornell University, New York, USA
- Environmental Management Specialist, Cornell University
- Environmental Information Officer, Cornell University
- B.S. in Natural Resource Management and Policy from North Carolina State University
- B.S. in Environmental Science and Policy from the State University of New York

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*Thanks to TECH, you will be able to learn with the best professionals in the world”*

## Management



### Mr. Abreu Acosta, Guzmán

- ◆ Technician in the area of Territorial Planning and Management at Gestión y Planeamiento Territorial y Medioambiental de Canarias S.A.
- ◆ Degree in Law
- ◆ Occupational Health and Safety Auditor, Specialization in OSHAS 18001
- ◆ Degree in Environmental Sciences. UNIVERSITY OF HUELVA
- ◆ Lawyer in his own law firm, specialized in Urban Development and Environmental Law
- ◆ Freelance consultant specializing in Risk Prevention, Quality and Environment

## Professors

### Mr. Espinosa, César

- ◆ Head of the Environment Service of Arona City Council
- ◆ Degree in Law
- ◆ Recipient of the IV Felipe González Vicent Prize, Faculty of Law ULL in 1994.
- ◆ UNESCO Global Geopark El Hierro Technical Manager
- ◆ Technical Manager El Hierro World Biosphere Reserve
- ◆ Legal Coordinator of the Department of Rural and Marine Affairs and the Environment of the Island Council of El Hierro (2011-2015).
- ◆ Technical Project Manager

### Mr. Palanco, César

- ◆ Director - Manager INTENSA PROMILAB
- ◆ Industrial Engineer. Mechanical Intensification
- ◆ Industrial Technical Engineer. Industrial Electronics Specialty
- ◆ Construction Manager
- ◆ Installation and testing technician
- ◆ Purchasing Manager TOGOGAS Huelva S.L.
- ◆ Installation technician TOGOGAS Huelva S.L.
- ◆ Commercial Delegate TOGOGAS Huelva S.L.



**Ms. Granell García, Lilia**

- ◆ Manager and Administrator of Recap Canarias Finance
- ◆ Degree in Physical Sciences, specializing in Fundamental Physics.
- ◆ Recap ibérica Financa, ltd.
- ◆ Technical and commercial director SOTEC group
- ◆ Technical and commercial director SEIFERMANN
- ◆ CEO of CERCAN

**Mr. Contreras Acuña, Manuel**

- ◆ Teacher (Secondary, Vocational Training)
- ◆ Doctor in Chemical Sciences Faculty of Experimental Sciences, University of Huelva
- ◆ Master's Degree in Instrumental Techniques in Chemistry, Faculty of Experimental Sciences, University of Huelva.
- ◆ Triple Master's Degree in Occupational Health and Safety, Quality and Environmental Management
- ◆ Interim Substitute Professor Department: Chemistry and Materials Science
- ◆ Contract Researcher Department: Chemistry and Materials Science

**Mr. Toscano, Manuel**

- ◆ Professor of the Department of Earth Sciences of the University of Huelva.
- ◆ Degree in Geological Sciences from the University of Granada.
- ◆ Technical Engineer in Drilling and Mining Prospecting
- ◆ Technical Engineer in Energy, Fuels and Explosives Resources
- ◆ Degree in Mine Exploitation from the University of Huelva
- ◆ Author and/or co-author of more than ninety national and international contributions.
- ◆ National and international projects financed by the Andalusia Council, the Spanish government and the European Union.

**Mr. Bueno Márquez, Pedro**

- ◆ Technician of the Directorate General of Vocational Training, Ministry of Education and Sports
- ◆ Chemical Engineering 1997 - 2002 University of Huelva
- ◆ Postgraduate Course on Renewable Energy Management and Development, Catholic University of Avila
- ◆ Technical Teacher of Vocational Training. Department of Education and Sports
- ◆ Andalusian Energy Agency Technician
- ◆ Project Engineer. Aldesa Engineering & Services
- ◆ Project Engineer. Andalusian Studies Group (Grande S.L.)

# 03

## Structure and Content

The syllabus of this program includes all the necessary contents to reach a wide and updated knowledge in all the aspects involved in the adequate management of the environmental impact, in relation to the new existing requirements and in the field of energy efficiency, with the consideration and analysis of all the existing possibilities in this field. A program specifically created to provide our students with a continuous process of skills improvement that will boost their real capacity for intervention.





“A stimulating and flexible learning process that will allow you to go through all the knowledge areas you need to intervene as an expert in this field”



## Module 1. Environmental and Energy Management of Organizations

- 1.1. Organizational and Business Fundamentals
  - 1.1.1. Organizational Management
  - 1.1.2. Types and Structure of an Organization
  - 1.1.3. Standardization of Business Management
- 1.2. Sustainable Development: Business and Environment
  - 1.2.1. Sustainable Development. Objectives and Goals
  - 1.2.2. Economic Activity and its Impact on the Environment
  - 1.2.3. Corporate Social Responsibility
- 1.3. Environmental and Energy Issues. Scope and Current Framework
  - 1.3.1. Major Current Environmental Problems: Waste, Water, Food
  - 1.3.2. Energy Issues. Demand, Consumption and Source Distributions
  - 1.3.3. Current Energy Projections
- 1.4. Competence and Regulatory Framework
  - 1.4.1. Legal framework, The Five Producing Levels of Environmental Regulations
  - 1.4.2. Competence Framework: the Distribution of Competencies in Environmental Matters
  - 1.4.3. Public Actions and Competencies in Environmental Matters and Regulation of Classified Activities
- 1.5. European Summits and the Paris Agreement
  - 1.5.1. EU Climate Targets
  - 1.5.2. European Summits
  - 1.5.3. The Paris Agreement
- 1.6. The 2030 Agenda and the Sustainable Development Goals
  - 1.6.1. The 2030 Agenda: Background, Approval Process and Content
  - 1.6.2. The 17 Sustainable Development Goals (SDGs)
  - 1.6.3. SDG Compass Guide
- 1.7. Roadmap 2050. National Energy Transition
  - 1.7.1. Roadmap 2050 Objectives. Key Points
  - 1.7.2. Economic, Industrial and Social Transition
  - 1.7.3. Strategy for Pollutant Emission Reduction Decarbonization Plans







- 1.8. National Integrated Energy and Climate Plan
  - 1.8.1. Key Aspects of the Plan
  - 1.8.2. Health and Economic Impacts of the PNIEC 2021-2030
  - 1.8.3. Objectives and Results of the National Integrated Energy and Climate Plan, 2021- 2030
- 1.9. Circular Economy
  - 1.9.1. The Circular Economy
  - 1.9.2. Legislation and Strategies to Support the Circular Economy
  - 1.9.3. Circular Economy System Diagrams
- 1.10. Sustainability Reports
  - 1.10.1. Communication of Social Responsibility Management
  - 1.10.2. Law 11/2018 Non-Financial Reporting
  - 1.10.3. The Process of Preparing a Sustainability Report according to GRI



*Advance your skills with the most interesting study systems on the online teaching scene"*

04

# Methodology

This training program offers a different way of learning. Our methodology uses a cyclical learning approach: **Relearning**.

This teaching system is used, for example, in the most prestigious medical schools in the world, and major publications such as the **New England Journal of Medicine** have considered it to be one of the most effective.





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*Discover Relearning, a system that abandons conventional linear learning, to take you through cyclical teaching systems: a way of learning that has proven to be extremely effective, especially in subjects that require memorization"*

## At TECH we use the Case Method

Our program offers a revolutionary method of skills and knowledge development. Our goal is to strengthen skills in a changing, competitive, and highly demanding environment.

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*At TECH, you will experience a way of learning that is shaking the foundations of traditional universities around the world”*



*We are the first online university to combine Harvard Business School case studies with a 100% online learning system based on repetition.*





### **A learning method that is different and innovative.**

This intensive Engineering program at TECH Global University prepares you to face all the challenges in this field, both nationally and internationally. We are committed to promoting your personal and professional growth, the best way to strive for success, that is why at TECH Global University you will use Harvard case studies, with which we have a strategic agreement that allows us, to offer you material from the best university in the world.

**“** *Our program prepares you to face new challenges in uncertain environments and achieve success in your career”*

*The student will learn, through collaborative activities and real cases, how to solve complex situations in real business environments.*

The case method is the most widely used learning system by the best faculties in the world. The case method was developed in 1912 so that law students would not only learn the law based on theoretical content. It consisted of presenting students with real-life, complex situations for them to make informed decisions and value judgments on how to resolve them. In 1924, Harvard adopted it as a standard teaching method.

What should a professional do in a given situation? This is the question that you are presented with in the case method, an action-oriented learning method. Throughout the program, the studies will be presented with multiple real cases.

They will have to combine all their knowledge and research, and argue and defend their ideas and decisions.

## Relearning Methodology

TECH is the first university in the world to combine Harvard University case studies with a 100% online learning system based on repetition, which combines 8 different didactic elements in each lesson.

We enhance Harvard case studies with the best 100% online teaching method: Relearning.

*In 2019, we obtained the best learning results of all online universities in the world.*

At TECH, you will learn using a cutting-edge methodology designed to train the executives of the future. This method, at the forefront of international teaching, is called Relearning.

Our university is the only university in the world authorized to employ this successful method. In 2019, we managed to improve our students' overall satisfaction levels (teaching quality, quality of materials, course structure, objectives...) based on the best online university indicators.



In our program, learning is not a linear process, but rather a spiral (learn, unlearn, forget, and re-learn). Therefore, we combine each of these elements concentrically.

This methodology has trained more than 650,000 university graduates with unprecedented success in fields as diverse as biochemistry, genetics, surgery, international law, management skills, sports science, philosophy, law, engineering, journalism, history, and financial markets and instruments. All this in a highly demanding environment, where the students have a strong socio-economic profile and an average age of 43.5 years.

*Relearning will allow you to learn with less effort and better performance, involving you more in your training, developing a critical mindset, defending arguments, and contrasting opinions: a direct equation for success.*

From the latest scientific evidence in the field of neuroscience, not only do we know how to organize information, ideas, images and memories, but we know that the place and context where we have learned something is fundamental for us to be able to remember it and store it in the hippocampus, to retain it in our long-term memory.

In this way, and in what is called neurocognitive context-dependent e-learning, the different elements in our program are connected to the context where the individual carries out their professional activity.



This program offers the best educational material, prepared with professionals in mind:



#### Study Material

All teaching material is produced by the specialists who teach the course, specifically for the course, so that the teaching content is highly specific and precise.

These contents are then applied to the audiovisual format, to create the TECH online working method. All this, with the latest techniques that offer high quality pieces in each and every one of the materials that are made available to the student.



#### Classes

There is scientific evidence suggesting that observing third-party experts can be useful. Learning from an Expert strengthens knowledge and memory, and generates confidence in future difficult decisions.



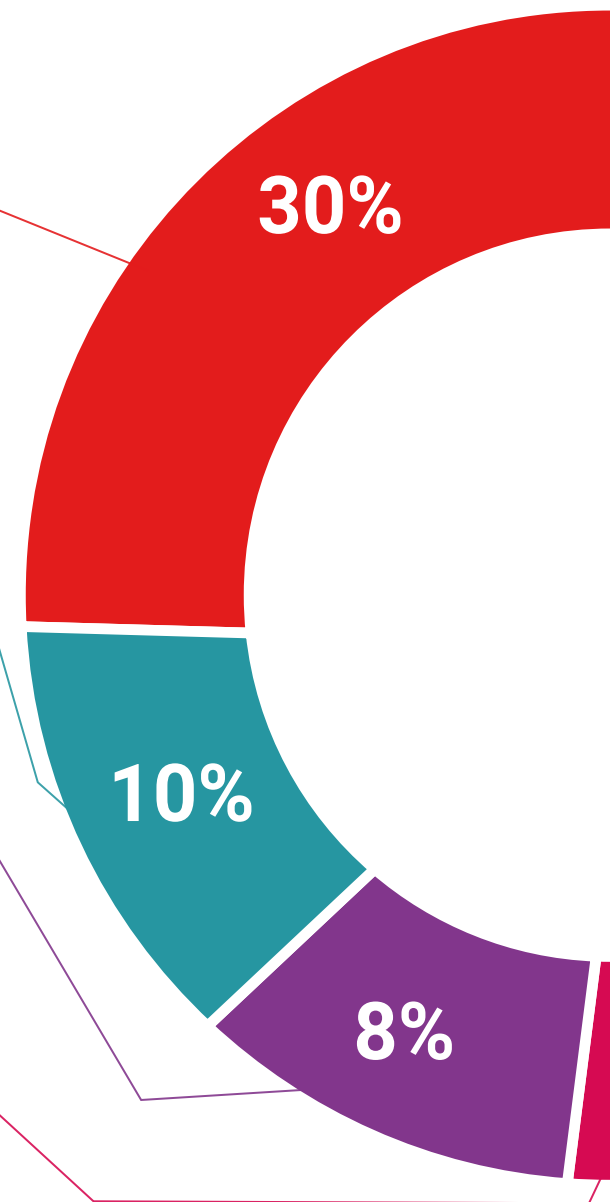
#### Practising Skills and Abilities

They will carry out activities to develop specific competencies and skills in each thematic area. Exercises and activities to acquire and develop the skills and abilities that a specialist needs to develop in the context of the globalization we live in.



#### Additional Reading

Recent articles, consensus documents and international guidelines, among others. In TECH's virtual library, students will have access to everything they need to complete their course.







**Case Studies**

They will complete a selection of the best case studies in the field used at Harvard. Cases that are presented, analyzed, and supervised by the best senior management specialists in the world.



**Interactive Summaries**

The TECH team presents the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

This exclusive multimedia content presentation training Exclusive system was awarded by Microsoft as a "European Success Story".



**Testing & Retesting**

We periodically evaluate and re-evaluate students' knowledge throughout the program, through assessment and self-assessment activities and exercises: so that they can see how they are achieving your goals.



05

# Certificate

The Postgraduate Certificate in Environmental and Energy Management in Organizations guarantees students, in addition to the most rigorous and up-to-date education, access to a Postgraduate Certificate issued by TECH Global University.



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*Successfully complete this training program  
and receive your university certificate  
without travel or laborious paperwork”*

This program will allow you to obtain your **Postgraduate Certificate in Environmental and Energy Management in Organizations** endorsed by **TECH Global University**, the world's largest online university.

**TECH Global University** is an official European University publicly recognized by the Government of Andorra ([official bulletin](#)). Andorra is part of the European Higher Education Area (EHEA) since 2003. The EHEA is an initiative promoted by the European Union that aims to organize the international training framework and harmonize the higher education systems of the member countries of this space. The project promotes common values, the implementation of collaborative tools and strengthening its quality assurance mechanisms to enhance collaboration and mobility among students, researchers and academics.

This **TECH Global University** title is a European program of continuing education and professional updating that guarantees the acquisition of competencies in its area of knowledge, providing a high curricular value to the student who completes the program.

Title: **Postgraduate Certificate in Environmental and Energy Management in Organizations**

Modality: **online**

Duration: **6 weeks**

Accreditation: **6 ECTS**



\*Apostille Convention. In the event that the student wishes to have their paper diploma issued with an apostille, TECH Global University will make the necessary arrangements to obtain it, at an additional cost.



future  
health confidence people  
education information tutors  
guarantee accreditation teaching  
institutions technology learning  
community commitment  
personalized service innovation  
knowledge present  
development language  
virtual classroom



**Postgraduate Certificate**  
Environmental and Energy  
Management in Organizations

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