

# Postgraduate Certificate Web Servers



## Postgraduate Certificate Web Servers

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

Website: [www.techtute.com/us/information-technology/postgraduate-certificate/web-servers](http://www.techtute.com/us/information-technology/postgraduate-certificate/web-servers)

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# 01

# Introduction

TECH has designed this high-level program for computer engineers to update their knowledge of Web Servers with the help of professionals with years of experience in the sector and with the most innovative didactic material on the market. This high-level program covers end-to-end web server management, from secure installation of different operating systems, identification of the best operating systems for each case, to building a secure infrastructure with which to host high-performance web pages.



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*All the subjects and areas of knowledge have been compiled in a complete and up-to-date syllabus, in order to bring the student to the highest theoretical and practical level"*

This intensive course aims to cover all the tasks involved in server administration, both VPS and dedicated servers, dedicated development environments, hosting different types of platforms and the acquisition of competence in the use of Linux terminals, all of which are essential for proper service administration and monitoring.

There are no basic concepts; in the administration and preparation of a web server: every command line, monitoring process and optimization parameter counts toward correctly operating a complete web service, including hosting external clients within the servers themselves.

You will also study one of the most important parts of the administration, security and Backups, fundamental to protecting yourself on the internet: protect a web services infrastructure without relying on third parties, fully manage a wide range of operating systems, control panels and web services among others.

This Postgraduate Certificate has been created by a team of expert teachers with multi-faceted skillsets and a wealth of experience and specialized knowledge in their respective fields. As it is a 100% online program, the student will not have to neglect their personal or professional commitments. At the end of the program, students will have updated their knowledge and will be in possession of a prestigious Postgraduate Certificate that will allow them to advance personally and professionally.

This **Postgraduate Certificate in Web Servers** contains the most complete and up-to-date educational program on the market. Its most notable features are:

- ◆ The examination of case studies presented by experts on Web Servers
- ◆ Graphic, schematic, and practical contents which provide scientific and practical information on the disciplines that are essential for professional practice
- ◆ Practical exercises where self-assessment can be undertaken to improve learning
- ◆ A special emphasis on innovative methodologies
- ◆ Theoretical lessons, questions to the expert, debate forums on controversial topics, and individual reflection assignments
- ◆ Content that is accessible from any fixed or portable device with an Internet connection



*A unique specialization program that stands out due to the quality of its contents and its excellent teaching staff"*

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*You will specialize in Web Servers under the guidance of professionals with years of experience in the sector and with the most innovative educational methodology”*

The program's teaching staff includes professionals from the sector who pour their work experience into this Postgraduate Certificate, as well as renowned specialists from leading societies and prestigious universities.

The multimedia content, developed with the latest educational technology, will provide the professional with situated and contextual learning, i.e., a simulated environment that will provide immersive learning designed for real situations.

This program is designed around Problem-Based Learning, whereby the professional must try to resolve the different professional practice situations that arise during the academic year. For this purpose, the student will be assisted by an innovative interactive video system created by renowned and experienced experts.

*A unique opportunity to specialize in User Interface Programming and Design from renowned professionals with years of experience in the sector.*

*Deepen your knowledge in the field of computer technologies by including in your area of expertise the most advanced aspects of this line of work.*



# 02 Objectives

The objective of this specialization is to equip professionals working with Web Servers, with the necessary knowledge and skills to operate, using the most advanced protocols and techniques available. Through a work approach that is fully adaptable to the student, this Postgraduate Certificate will progressively lead them to acquire the skills that will propel them to a superior professional level. A unique program designed by professionals with extensive experience in the sector.



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*Succeed with the best and acquire  
the knowledge and skills you need  
to work with Web Servers”*



## General Objectives

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- ◆ Establish a strategy for a web environment under development and production
- ◆ Install and manage a complete web hosting service
- ◆ Fully optimize production web hosting services
- ◆ Develop Backups and a secure environment against external attacks
- ◆ Identify and solve problems and adversities in real environments

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*A comprehensive and highly relevant course for the IT professional, which will allow you to compete among the best in the industry”*





## Specific Objectives

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- ◆ Develop a real high-availability working environment
- ◆ Determine the necessary parameters to create a cloud hosting service
- ◆ Examine the different versions of operating systems that best suit your needs
- ◆ Establish a web administration environment focused on external customers
- ◆ Set up configurations for private/public networks
- ◆ Create a complete hosting service for any type of website or platform
- ◆ Examine security settings for Anti-malware, viruses, brute force attacks and others
- ◆ Analyze a high security backup system with redundancy
- ◆ Identify and solve problems in real environments

# 03

# Course Management

In line with its maxim of offering an elite education for all, TECH counts on renowned professionals so that the student acquires a solid understanding of Web Servers. This Postgraduate Certificate has a highly qualified team with extensive experience in the sector, who will supply students with the best tools to develop their skills during the course. Thus, students have the guarantees they need to specialise at an international level in a booming sector that will catapult them to professional success.



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*In this Postgraduate Certificate you will be able to combine the efficiency of the most advanced learning methods with the flexibility of a program created to adapt to your schedule, without sacrificing quality”*

## Management



### Mr. Gris Ramos, Alejandro

- Technical Engineer in Computer Management
- CEO & Founder of Club de Talentos
- CEO Persatrace, Online Marketing Agency
- Business Development Director at Alenda Golf
- Director of PI Study Center
- Director of the Web Applications Engineering Department at Brilogic
- Web Programmer at Grupo Ibergest
- Software/Web Programmer at Reebok Spain
- Technical Engineer in Computer Management
- Master's Degree in Digital Teaching and Learning, Tech Education
- Master's Degree in High Abilities and Inclusive Education
- Master's Degree in E-Commerce
- Specialist in Latest Technologies Applied to Teaching, Digital Marketing, Web Applications and Internet Business Development



## Professors

### Mr. Boix Tremiño, Jorge

- ◆ Founder of HostingTG
- ◆ Founder of GrupoTG
- ◆ Co-founder of TiendaWebOnline
- ◆ Graphic Designer at Intergon2000
- ◆ Graphic Designer at Ibertex
- ◆ IT Project Manager at Xion Animation
- ◆ Sales and Marketing Director at Kingest
- ◆ Computer Engineer at UNED
- ◆ Business Excellence Award from the Institute for Professional Excellence.
- ◆ European Medal for Merit at Work by the European Association for Economy and Competitiveness.

# 04

## Structure and Content

The syllabus has been designed with a view to educational efficiency, carefully selecting the contents to offer a comprehensive course, which includes all the fields of study that are essential to achieve real knowledge of the subject. It includes the latest updates and developments in the field. Thus, a program has been established with modules that offer a broad overview of Web Servers. From the first module students will see their knowledge expanding, which will enable them to develop professionally, knowing that they can count on the support of a team of experts.



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*A high-quality Postgraduate Certificate that will allow the student to advance quickly and steadily in the acquisition of knowledge, with the scientific rigor of world class teaching"*

## Module 1. Web Server Administration

- 1.1. Selecting a Work Environment
  - 1.1.1. Operating Systems (Windows or Linux)
  - 1.1.2. Distribution Differences
    - 1.1.2.1. Choosing the Right Operating System
    - 1.1.2.2. Test Working Environment (Development)
    - 1.1.2.3. Professional Working Environment (Production)
- 1.2. Installing and Configuring the Virtual Work Environment
  - 1.2.1. Installing VirtualBox for Windows Development Environment
    - 1.2.1.1. Installation of Windows Server Environment
    - 1.2.1.2. Initial Configuration and Networks for Windows Server
    - 1.2.1.3. Installation of Components for Production
    - 1.2.1.4. Windows Server Optimization
  - 1.2.2. Installing Linux Visual Environment
    - 1.2.2.1. Installation and Configuration of Centos (Operating System for the Enterprise Community)
    - 1.2.2.2. Ubuntu Server Installation and Configuration
    - 1.2.2.3. Debian Installation and Configuration
- 1.3. Command Terminal
  - 1.3.1. Directories and CHMOD Permissions
    - 1.3.1.1. Disk and File Management
  - 1.3.2. Service Analysis
  - 1.3.3. Problem Detection and Analysis/LOGS
  - 1.3.4. Resource Monitoring
    - 1.3.4.1. Commands and Automation
  - 1.3.5. Editors and Administration Commands
- 1.4. Networks
  - 1.4.1. IP Theory and ISO/TCP Models
  - 1.4.2. IP Utilities and Commands
  - 1.4.3. Network and File Configuration
  - 1.4.4. SCP, FTP, SAMBA, NFS Protocols and Services
  - 1.4.5. DNS Service Installation and Configuration
- 1.5. Installation and Control Panels
  - 1.5.1. Selecting an Adequate Control Panel
    - 1.5.1.1. Configuration and Optimization
  - 1.5.2. Installing cPanel
    - 1.5.2.1. Configuration and Optimization
  - 1.5.3. Installing Plesk
    - 1.5.3.1. Configuration and Optimization
  - 1.5.4. Installing Directadmin
    - 1.5.4.1. Configuration and Optimization
- 1.6. Installing Core Web Services
  - 1.6.1. Installing Apache
    - 1.6.1.1. PHP/PHP-FPM Installation
  - 1.6.2. Installing MySQL
  - 1.6.3. Installing MariaDB
  - 1.6.4. Installing PHPmyadmin
  - 1.6.5. Installing Exim/Dovecot
- 1.7. Optimizing Web Services, Databases and E-mail
  - 1.7.1. Installing Nginx
    - 1.7.1.1. Configuring and Launching Nginx
  - 1.7.2. Optimizing Apache
  - 1.7.3. Optimizing PHP/PHP-FPM
  - 1.7.4. Optimizing MySQL
    - 1.7.4.1. Data Analysis Tools
  - 1.7.5. Optimizing Exim
- 1.8. Backups in Production Environments
  - 1.8.1. Backups
  - 1.8.2. Planning a Secure Environment
    - 1.8.2.1. Base Commands - CP, MV, RSYNC
  - 1.8.3. Automating Backup Copies Systems
  - 1.8.4. Data Redundancy and Security/Replication
  - 1.8.5. Optimizing Secure Environments



- 1.9. Security/Safety
  - 1.9.1. Dedicated/Virtual Server Security
  - 1.9.2. Installing Monitoring Tools
    - 1.9.2.1. Brute force and scanning prevention
  - 1.9.3. Installing Firewalls
  - 1.9.4. Anti-Malware / Anti-Virus Systems
    - 1.9.4.1. Scanning and Quarantine Automation
  - 1.9.5. Anti-Spam Mail
- 1.10. Problem Solving and Eventualities
  - 1.10.1. Service Stop
  - 1.10.2. Disk Errors in Production Environments
  - 1.10.3. Monitoring and Delegating Services
  - 1.10.4. Web Migration/Databases/E-mail/Files
  - 1.10.5. Hacked Web Resolution
  - 1.10.6. E-mail Problems
    - 1.10.6.1. Blacklist IP Difficulties
    - 1.10.6.2. IP Assignment to a Particular Domain
    - 1.10.6.3. Mail Arriving in Spam Folder
  - 1.10.7. Server Not Responding (Rescue Mode)
    - 1.10.7.1. RAM Memory Test
    - 1.10.7.2. Hard Drive Test
    - 1.10.7.3. RAID Test/File System Degradation
  - 1.10.8. Administrating and Monitoring Disc Space
    - 1.10.8.1. Problems with INODOS
  - 1.10.9. Nmap and Tracert for Network Problem Detection

# 05 Methodology

This academic program offers students 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"*

## Case Study to contextualize all content

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

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



*You will have access to a learning system based on repetition, with natural and progressive teaching throughout the entire syllabus.*



### A learning method that is different and innovative

This TECH program is an intensive educational program, created from scratch, which presents the most demanding challenges and decisions in this field, both nationally and internationally. This methodology promotes personal and professional growth, representing a significant step towards success. The case method, a technique that lays the foundation for this content, ensures that the most current economic, social and professional reality is taken into account.



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

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

The case method has been the most widely used learning system among the world's leading Information Technology schools for as long as they have existed. 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 course, students 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 effectively combines the Case Study methodology with a 100% online learning system based on repetition, which combines different teaching elements in each lesson.

We enhance the Case Study 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 one 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.

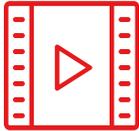
*Relearning will allow you to learn with less effort and better performance, involving you more in your training, developing a critical mindset, defending arguments, and contrasting opinions: a direct equation for success.*

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.



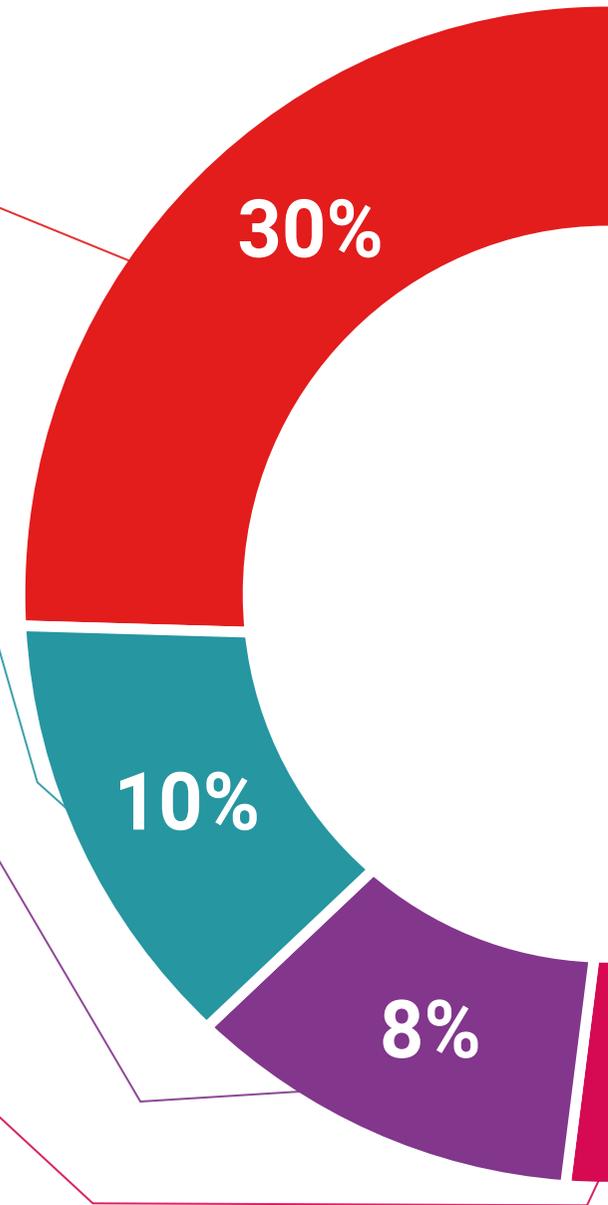
### Practising Skills and Abilities

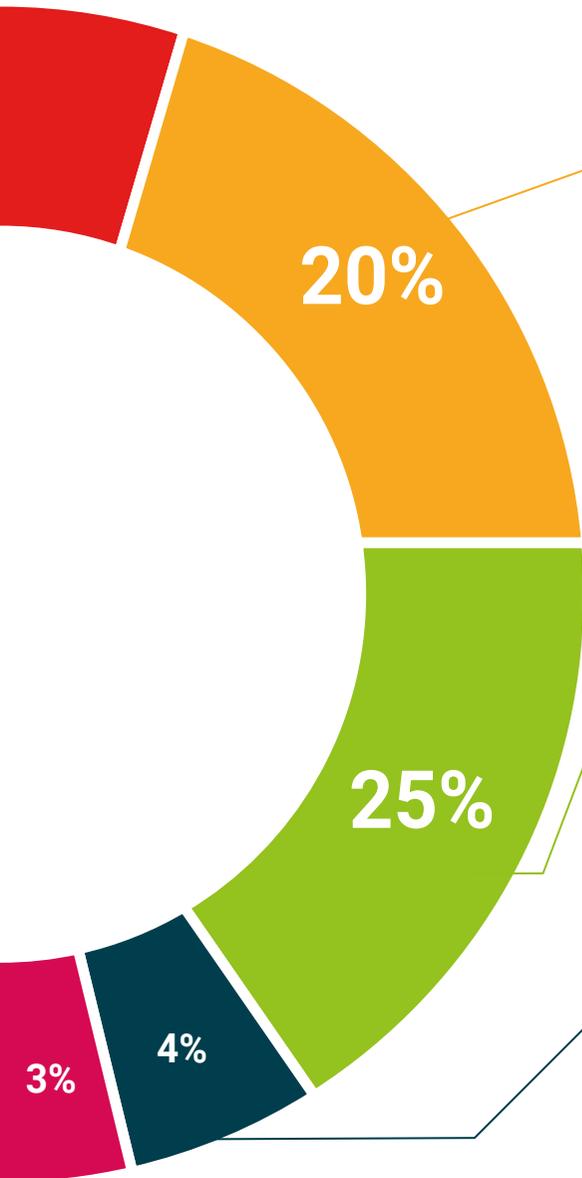
They will carry out activities to develop specific skills and abilities in each subject area. Exercises and activities to acquire and develop the skills and abilities that a specialist needs to develop in the context of the globalization that we are experiencing.



### 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

Students will complete a selection of the best case studies chosen specifically for this program. Cases that are presented, analyzed, and supervised by the best 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 educational system for presenting multimedia content 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 their goals.



06

# Certificate

The Postgraduate Certificate in Web Servers guarantees students, in addition to the most rigorous and up-to-date education, access to a qualification issued by TECH Global University.



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*Successfully complete this program and receive your university qualification without having to travel or fill out laborious paperwork”*

This private qualification will allow you to obtain an **Postgraduate Certificate in Web Servers** 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** private qualification, 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 Web Servers**

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  
classroom



## Postgraduate Certificate Web Servers

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

# Postgraduate Certificate Web Servers