

Postgraduate Certificate

Taxation of Algorithmic Trading





Postgraduate Certificate Taxation of Algorithmic Trading

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

Website: www.techtitude.com/us/school-of-business/postgraduate-certificate/taxation-algorithmic-trading

Index

01

Introduction to the Program

p. 4

02

Why Study at TECH?

p. 8

03

Syllabus

p. 12

04

Teaching Objectives

p. 16

05

Study Methodology

p. 20

06

Teaching Staff

p. 30

07

Certificate

p. 34

01

Introduction to the Program

Finance experts increasingly recognize the need to thoroughly understand the tax implications arising from the use of algorithms in trading operations. In this regard, the Organization for Economic Cooperation and Development (OECD) estimates that nearly 70% of the trading volume in global financial markets comes from automated strategies, which presents new tax challenges. In light of this, the accurate declaration of profits and losses derived from algorithmic systems becomes a key requirement to ensure the legality of operations. In response to this reality, TECH has designed this comprehensive program. Through a dynamic 100% online format, professionals will acquire the necessary tools to perform efficiently in this field.



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Through this 100% Online Postgraduate Certificate, you will gain an in-depth understanding of the tax obligations that an Algorithmic Trader must assume, identifying the applicable legal frameworks”

The Taxation of Algorithmic Trading requires mastery of specific concepts that allow compliance with tax regulations and optimization of the trader's tax management. For example, understanding in detail the tax obligations of a trader is key to avoiding penalties and ensuring financial transparency. In this regard, financial professionals must have up-to-date knowledge of the applicable legal frameworks and the types of income generated from automated trading operations. Additionally, considering the differences between individuals and legal entities provides a strategic perspective that enhances tax planning.

In this context, TECH presents an innovative Postgraduate Certificate in the Taxation of Algorithmic Trading, designed to address the legal specifics surrounding the taxation of automated operations. Developed by industry experts, the program will examine the tax differences between algorithmic and discretionary trading based on their operational nature. Aligned with this, the curriculum will explore the regulatory variations that exist depending on the investor's country of residence. Moreover, the educational materials will provide professionals with tools to correctly interpret tax obligations in multi-jurisdictional contexts. As a result, they will develop key competencies to align their tax strategy with specific regulatory environments.

Furthermore, the academic pathway will be offered in a 100% online format, allowing specialists to tailor their training to their own work dynamics. All that is required is a device with internet access to access the virtual campus. Additionally, the academic proposal incorporates TECH's exclusive Relearning system, ensuring a progressive and contextualized assimilation of the content. This avoids reliance on traditional memorization models. Moreover, students will have access to numerous digital resources such as video lectures, infographics, and specialized readings.

This **Postgraduate Certificate in Taxation of Algorithmic Trading** contains the most complete and up-to-date program on the market. Its most notable features are:

- ♦ The development of practical cases presented by experts in the Taxation of Algorithmic Trading
- ♦ 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
- ♦ Content that is accessible from any fixed or portable device with an internet connection



You will develop the ability to analyze the energy impact resulting from High-Frequency Trading, identifying its environmental footprint and proposing sustainable strategies"

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Through the practical resources provided by this program, you will gain the ability to assess the use of Offshore companies within the context of Algorithmic Trading”

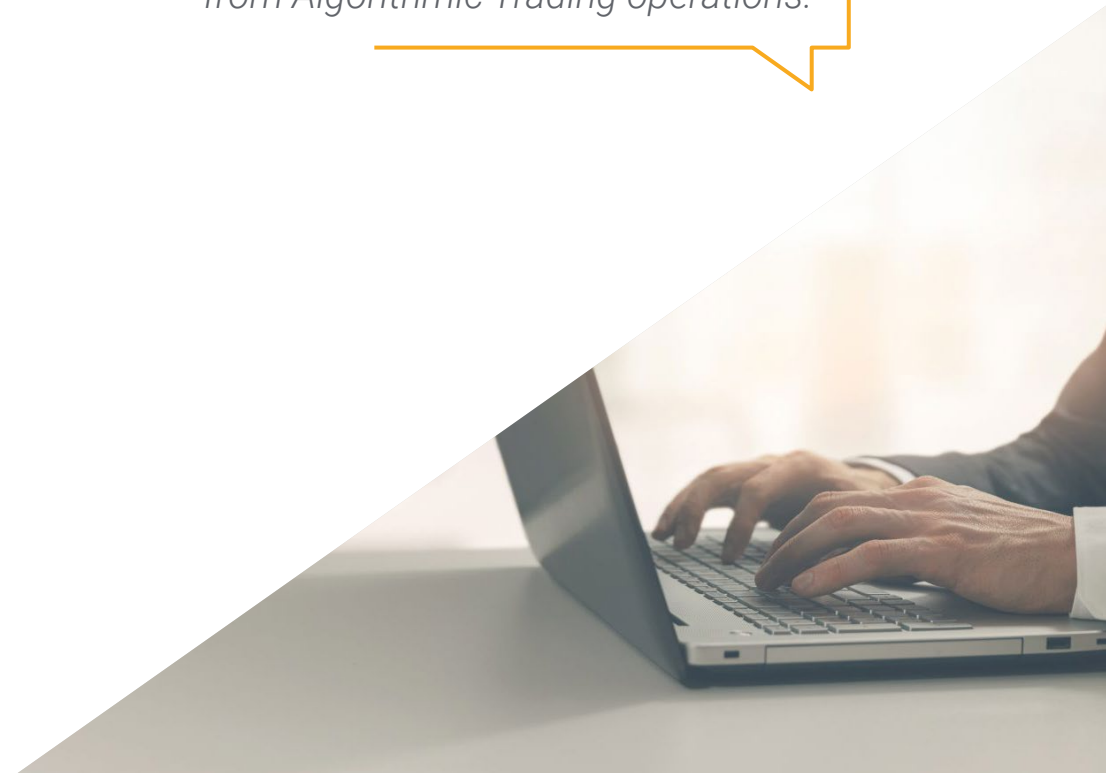
The faculty includes professionals from the field of Taxation of Algorithmic Trading, who contribute their work experience to this program, as well as recognized specialists from leading firms and prestigious universities.

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 an immersive learning experience designed to prepare for real-life situations.

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

With TECH, you will develop the ability to integrate ESG criteria into Algorithmic Trading strategies, evaluating their tax impact.

A 100% online postgraduate certificate that allows you to study from anywhere, while developing the skills to manage and optimize the tax obligations derived from Algorithmic Trading operations.



02

Why Study at TECH?

TECH is the world's largest online university. With an impressive catalog of more than 14,000 university programs, available in 11 languages, it is positioned as a leader in employability, with a 99% job placement rate. In addition, it has a huge faculty of more than 6,000 professors of the highest international prestige.



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Study at the largest online university in the world and ensure your professional success. The future begins at TECH”

The world's best online university, according to FORBES

The prestigious Forbes magazine, specialized in business and finance, has highlighted TECH as "the best online university in the world" This is what they have recently stated in an article in their digital edition in which they echo the success story of this institution, "thanks to the academic offer it provides, the selection of its teaching staff, and an innovative learning method oriented to form the professionals of the future"

The best top international faculty

TECH's faculty is made up of more than 6,000 professors of the highest international prestige. Professors, researchers and top executives of multinational companies, including Isaiah Covington, performance coach of the Boston Celtics; Magda Romanska, principal investigator at Harvard MetaLAB; Ignacio Wistuba, chairman of the department of translational molecular pathology at MD Anderson Cancer Center; and D.W. Pine, creative director of TIME magazine, among others.

The world's largest online university

TECH is the world's largest online university. We are the largest educational institution, with the best and widest digital educational catalog, one hundred percent online and covering most areas of knowledge. We offer the largest selection of our own degrees and accredited online undergraduate and postgraduate degrees. In total, more than 14,000 university programs in eleven different languages position us as the largest educational institution in the world.



The most complete syllabuses on the university scene

TECH offers the most complete syllabuses on the university scene, with programs that cover fundamental concepts and, at the same time, the main scientific advances in their specific scientific areas. In addition, these programs are continuously updated to guarantee students the academic vanguard and the most demanded professional skills. and the most in-demand professional competencies. In this way, the university's qualifications provide its graduates with a significant advantage to propel their careers to success.

A unique learning method

TECH is the first university to use Relearning in all its programs. This is the best online learning methodology, accredited with international teaching quality certifications, provided by prestigious educational agencies. In addition, this innovative academic model is complemented by the "Case Method", thereby configuring a unique online teaching strategy. Innovative teaching resources are also implemented, including detailed videos, infographics and interactive summaries.

The official online university of the NBA

TECH is the official online university of the NBA. Thanks to our agreement with the biggest league in basketball, we offer our students exclusive university programs, as well as a wide variety of educational resources focused on the business of the league and other areas of the sports industry. Each program is made up of a uniquely designed syllabus and features exceptional guest hosts: professionals with a distinguished sports background who will offer their expertise on the most relevant topics.

Leaders in employability

TECH has become the leading university in employability. 99% percent of its students obtain jobs in the academic field they have studied within one year of completing any of the university's programs. A similar number achieve immediate career enhancement. All this thanks to a study methodology that bases its effectiveness on the acquisition of practical skills, which are absolutely necessary for professional development.



Google Premier Partner

The American technology giant has awarded TECH the Google Premier Partner badge. This award, which is only available to 3% of the world's companies, highlights the efficient, flexible and tailored experience that this university provides to students. The recognition not only accredits the maximum rigor, performance and investment in TECH's digital infrastructures, but also places this university as one of the world's leading technology companies.



The top-rated university by its students

Students have positioned TECH as the world's top-rated university on the main review websites, with a highest rating of 4.9 out of 5, obtained from more than 1,000 reviews. These results consolidate TECH as the benchmark university institution at an international level, reflecting the excellence and positive impact of its educational model.



03 Syllabus

This Postgraduate Certificate in the Taxation of Algorithmic Trading will provide financial professionals with a detailed understanding of the legal aspects that regulate automated operations in the markets. As such, the syllabus will cover the essential elements needed to interpret the applicable regulations for automated trading and their tax implications. Furthermore, the academic content will provide technical criteria to meet the financial reporting requirements set by regulatory bodies. The syllabus will also delve into the protocols that ensure transparency and proper control of transactions executed by algorithms.





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You will implement tax strategies tailored to the differences in the taxation of algorithmic trading, ensuring regulatory compliance and tax optimization”

Module 1. Taxation of Algorithmic Trading

- 1.1. The Importance of Taxation in Trading
 - 1.1.1. Tax Obligations of Traders
 - 1.1.2. Differences Between the Taxation of Individuals and Companies
 - 1.1.3. Tax Regime for Derivatives and Cryptocurrencies
- 1.2. Taxation of Gains and Losses in Trading
 - 1.2.1. Tax Calculation on Profits
 - 1.2.2. Loss Deductions
 - 1.2.3. Differences According to Country of Residence
- 1.3. Taxation of Algorithmic Trading vs. Discretionary Trading
 - 1.3.1. Differences in Taxation
 - 1.3.2. Legal Aspects of Automated Trading
 - 1.3.3. Tax Control Over Financial Algorithms
- 1.4. Tax Havens and International Regulation
 - 1.4.1. Use of Offshore Companies
 - 1.4.2. International Regulations Against Tax Evasion
 - 1.4.3. Legal Implications
- 1.5. Transparency and Auditing in Algorithmic Trading
 - 1.5.1. Financial Reporting Requirements
 - 1.5.2. Audits in Investment Funds
 - 1.5.3. Data Protection Regulation
- 1.6. Sustainability in Financial Markets
 - 1.6.1. ESG Investment and Sustainable Criteria
 - 1.6.2. Trading Algorithms with a Positive Impact
 - 1.6.3. Regulations on Sustainable Finance
- 1.7. Cryptocurrencies and Taxation
 - 1.7.1. Taxation of Digital Assets
 - 1.7.2. Emerging Regulations
 - 1.7.3. Security and Regulatory Compliance





- 1.8. Environmental Impact of Algorithmic Trading
 - 1.8.1. Energy Consumption in HFT (High-Frequency Trading)
 - 1.8.2. Sustainable Alternatives
 - 1.8.3. Environmental Regulations
- 1.9. Tax Strategies for Professional Traders
 - 1.9.1. Tax Optimization
 - 1.9.2. Tax Planning
 - 1.9.3. Use of Legal Structures
- 1.10. Ethics in Algorithmic Trading and Social Responsibility
 - 1.10.1. Social Impact of Financial Markets
 - 1.10.2. Transparency and Governance
 - 1.10.3. Ethical Standards in Algorithm Development

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You will apply data protection principles and regulations in the tax management of Algorithmic Trading, ensuring security and confidentiality”

04 Teaching Objectives

This Postgraduate Certificate is designed to equip financial professionals with the most effective tools to understand the tax regime applicable to derivatives and cryptocurrencies. In this way, graduates will develop advanced skills to correctly calculate the taxation of gains and losses resulting from automated trading operations. Additionally, they will be trained to identify the tax specifics of each type of digital and financial asset. Furthermore, they will integrate specialized knowledge that will allow them to optimize tax management and comply with current regulations.



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You will address challenges related to tax compliance in Algorithmic Trading, understanding its relevance for legality and financial optimization”



General Objectives

- Understand the tax framework applicable to operations conducted through algorithmic trading
- Identify the tax obligations arising from automated investment activities
- Analyze the tax treatment of different financial instruments used in trading
- Apply accounting and tax criteria in the declaration of capital gains and losses
- Interpret national and international regulations regarding the taxation of trading operations
- Evaluate the tax implications of trading with platforms and brokers in different jurisdictions
- Design tax planning strategies to optimize the profitability of investments
- Integrate tax compliance into the daily operations of algorithmic trading systems
- Advise on the tax regime applicable to individuals and entities using algorithmic trading
- Detect tax risks and propose corrective measures in automated environments.





Specific Objectives

- ♦ Examine the environmental impact of Algorithmic Trading, evaluating the energy consumption of techniques such as High-Frequency Trading (HFT)
- ♦ Assess emerging regulations regarding the taxation of cryptocurrencies, considering aspects of security and compliance for proper tax management
- ♦ Analyze international regulations against tax evasion and the use of offshore companies, identifying the legal implications for traders
- ♦ Investigate the procedures and auditing requirements for investment funds that use financial algorithms, ensuring transparency and compliance



Incorporate daily practices based on the criteria and regulations of sustainable finance, ensuring that Algorithmic Trading strategies comply with all standards”

05 Study Methodology

TECH is the world's first university to combine the **case study** methodology with **Relearning**, a 100% online learning system based on guided repetition.

This disruptive pedagogical strategy has been conceived to offer professionals the opportunity to update their knowledge and develop their skills in an intensive and rigorous way. A learning model that places students at the center of the educational process giving them the leading role, adapting to their needs and leaving aside more conventional methodologies.



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TECH will prepare you to face new challenges in uncertain environments and achieve success in your career”

The student: the priority of all TECH programs

In TECH's study methodology, the student is the main protagonist.

The teaching tools of each program have been selected taking into account the demands of time, availability and academic rigor that, today, not only students demand but also the most competitive positions in the market.

With TECH's asynchronous educational model, it is students who choose the time they dedicate to study, how they decide to establish their routines, and all this from the comfort of the electronic device of their choice. The student will not have to participate in live classes, which in many cases they will not be able to attend. The learning activities will be done when it is convenient for them. They can always decide when and from where they want to study.

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*At TECH you will NOT have live classes
(which you might not be able to attend)”*



The most comprehensive study plans at the international level

TECH is distinguished by offering the most complete academic itineraries on the university scene. This comprehensiveness is achieved through the creation of syllabi that not only cover the essential knowledge, but also the most recent innovations in each area.

By being constantly up to date, these programs allow students to keep up with market changes and acquire the skills most valued by employers. In this way, those who complete their studies at TECH receive a comprehensive education that provides them with a notable competitive advantage to further their careers.

And what's more, they will be able to do so from any device, pc, tablet or smartphone.

“*TECH's model is asynchronous, so it allows you to study with your pc, tablet or your smartphone wherever you want, whenever you want and for as long as you want*”

Case Studies and Case Method

The case method has been the learning system most used by the world's best business schools. Developed in 1912 so that law students would not only learn the law based on theoretical content, its function was also to present them with real complex situations. In this way, they could make informed decisions and value judgments about how to resolve them. In 1924, Harvard adopted it as a standard teaching method.

With this teaching model, it is students themselves who build their professional competence through strategies such as Learning by Doing or Design Thinking, used by other renowned institutions such as Yale or Stanford.

This action-oriented method will be applied throughout the entire academic itinerary that the student undertakes with TECH. Students will be confronted with multiple real-life situations and will have to integrate knowledge, research, discuss and defend their ideas and decisions. All this with the premise of answering the question of how they would act when facing specific events of complexity in their daily work.



Relearning Methodology

At TECH, case studies are enhanced with the best 100% online teaching method: Relearning.

This method breaks with traditional teaching techniques to put the student at the center of the equation, providing the best content in different formats. In this way, it manages to review and reiterate the key concepts of each subject and learn to apply them in a real context.

In the same line, and according to multiple scientific researches, reiteration is the best way to learn. For this reason, TECH offers between 8 and 16 repetitions of each key concept within the same lesson, presented in a different way, with the objective of ensuring that the knowledge is completely consolidated during the study process.

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



A 100% online Virtual Campus with the best teaching resources

In order to apply its methodology effectively, TECH focuses on providing graduates with teaching materials in different formats: texts, interactive videos, illustrations and knowledge maps, among others. All of them are designed by qualified teachers who focus their work on combining real cases with the resolution of complex situations through simulation, the study of contexts applied to each professional career and learning based on repetition, through audios, presentations, animations, images, etc.

The latest scientific evidence in the field of Neuroscience points to the importance of taking into account the place and context where the content is accessed before starting a new learning process. Being able to adjust these variables in a personalized way helps people to remember and store knowledge in the hippocampus to retain it in the long term. This is a model called Neurocognitive context-dependent e-learning that is consciously applied in this university qualification.

In order to facilitate tutor-student contact as much as possible, you will have a wide range of communication possibilities, both in real time and delayed (internal messaging, telephone answering service, email contact with the technical secretary, chat and videoconferences).

Likewise, this very complete Virtual Campus will allow TECH students to organize their study schedules according to their personal availability or work obligations. In this way, they will have global control of the academic content and teaching tools, based on their fast-paced professional update.



The online study mode of this program will allow you to organize your time and learning pace, adapting it to your schedule”

The effectiveness of the method is justified by four fundamental achievements:

1. Students who follow this method not only achieve the assimilation of concepts, but also a development of their mental capacity, through exercises that assess real situations and the application of knowledge.
2. Learning is solidly translated into practical skills that allow the student to better integrate into the real world.
3. Ideas and concepts are understood more efficiently, given that the example situations are based on real-life.
4. Students like to feel that the effort they put into their studies is worthwhile. This then translates into a greater interest in learning and more time dedicated to working on the course.

The university methodology top-rated by its students

The results of this innovative teaching model can be seen in the overall satisfaction levels of TECH graduates.

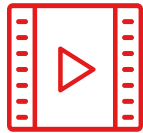
The students' assessment of the teaching quality, the quality of the materials, the structure of the program and its objectives is excellent. Not surprisingly, the institution became the top-rated university by its students according to the global score index, obtaining a 4.9 out of 5.

Access the study contents from any device with an Internet connection (computer, tablet, smartphone) thanks to the fact that TECH is at the forefront of technology and teaching.

You will be able to learn with the advantages that come with having access to simulated learning environments and the learning by observation approach, that is, Learning from an expert.



As such, the best educational materials, thoroughly prepared, will be available in this program:



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.

This content is then adapted in an audiovisual format that will create our way of working online, with the latest techniques that allow us to offer you high quality in all of the material that we provide you with.



Practicing Skills and Abilities

You will carry out activities to develop specific competencies and skills in each thematic field. Exercises and activities to acquire and develop the skills and abilities that a specialist needs to develop within the framework of the globalization we live in.



Interactive Summaries

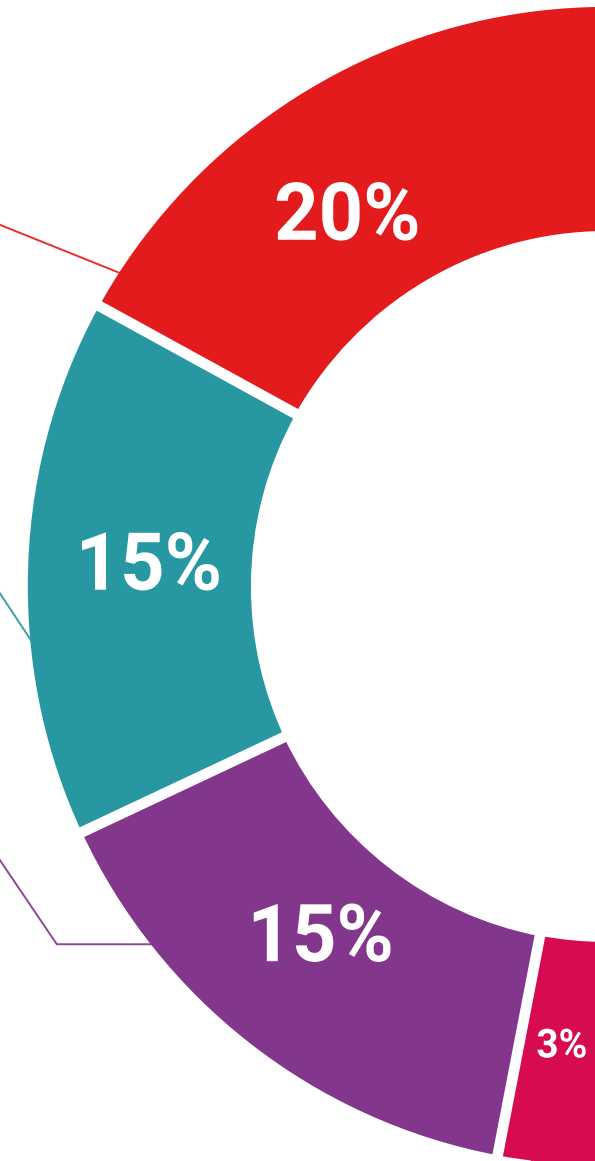
We present the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

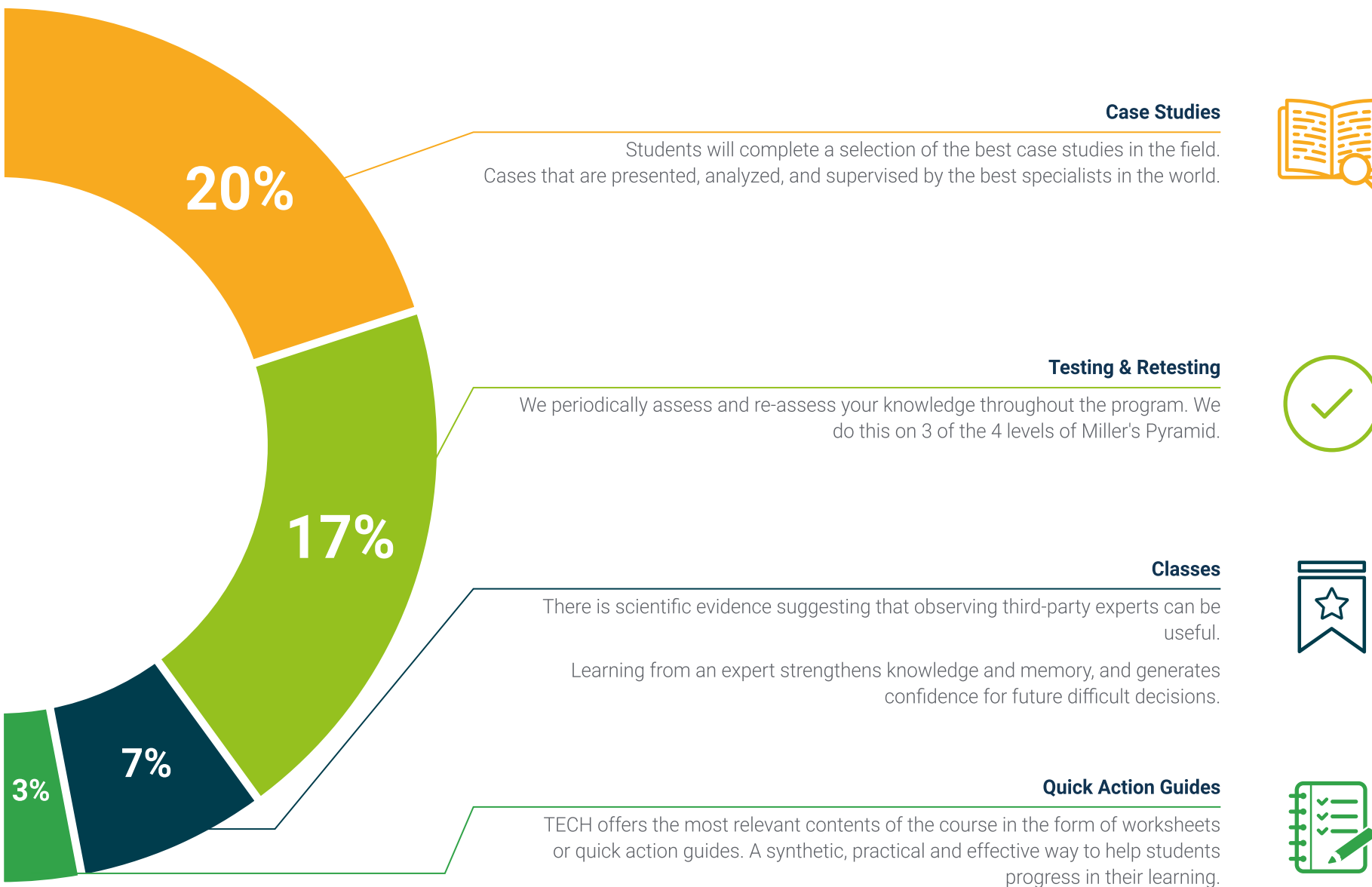
This exclusive educational system for presenting multimedia content was awarded by Microsoft as a "European Success Story".



Additional Reading

Recent articles, consensus documents, international guides... In our virtual library you will have access to everything you need to complete your education.





06 Teaching Staff

The instructors selected by TECH for this postgraduate program have extensive experience in financial taxation and a deep understanding of algorithmic trading. They have participated in research on the impact of tax regulation in automated markets and in the analysis of tax risks associated with derivatives and cryptocurrencies. As a result, they have designed content that addresses legal aspects, reporting requirements, and sustainable tax strategies in trading. Thanks to this, graduates will receive specialized training that will enable them to apply efficient tax practices, comply with international regulations, and promote financial responsibility.



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You will specialize with a faculty composed of experts in the taxation of algorithmic trading and financial regulation, developing advanced professional competencies”

Management



Dr. Gómez Martínez, Raúl

- ♦ Founding Partner and CEO of Open 4 Blockchain Fintech
- ♦ Founding Partner of *InvestMood Fintech*
- ♦ Apara's CEO
- ♦ PhD in Business Economics and Finance from the University Rey Juan Carlos de Madrid
- ♦ Bachelor's Degree in Economics and Business from Complutense University of Madrid
- ♦ Master's Degree in Economic Analysis and Financial Economics, Complutense University of Madrid



Dr. Lara Bocanegra, Ana María

- ♦ Company Owner (Financial)
- ♦ Ph.D. from the University of Seville
- ♦ Trader of NYSE Stocks at World Trade Securities
- ♦ Junior Trader at Swiftrad
- ♦ Mechanical Behaviour of Materials from University of Seville
- ♦ Experimental Techniques II from University of Seville
- ♦ Materials Science from University of Seville
- ♦ Advanced Trading Stocks Techniques from University of Seville

Faculty

Dr. Medrano García, María Luisa

- Director of university graduate programs
- Technical advisor for public institutions
- Professor in university degrees, courses and postgraduate programs.
- Ph.D. in Senior Management from the Rey Juan Carlos University
- Degree in Business Administration from the Complutense University of Madrid
- Economic and Social Council of the Community of Madrid Research Award

Dr. Guerra Moruno, Lucía

- Responsible for content planning and technical strategies at Scientia System S.L.U
- Ph.D. in Big Data and Quantitative Finance
- Head of Content Creation and Programming Strategies at Scientia System S.L
- Technical Consultant and Programmer at Incubadora de Traders S.L.U
- Master's Degree in Banking and Quantitative Finance
- Graduate in Physics

Mr. Martín Moreno, David

- Specialist in Financial Management by European University Miguel de Cervantes Business School
- Master's Degree in Financial Planning and Advice from the Rey Juan Carlos University
- Bachelor's Degree in Accounting and Finance from Rey Juan Carlos University

Mr. Segura Pacho, Felipe Marcelo

- Back Office at Indra BPO Services SLU
- Accountant at JC Segura Construcciones SA
- Specialist in Corporate Finance at the Catholic University of Salta
- Master's Degree in Financial Planning and Advice from the Rey Juan Carlos University
- Master's Degree in Business Management from the Public University of Navarra
- Collaborator of the project *"Trading in Stock Exchange and Financial Markets"*



A unique, essential and decisive learning experience to boost your professional development"

07 Certificate

The Postgraduate Certificate in Taxation of Algorithmic Trading guarantees students, in addition to the most rigorous and up-to-date education, access to a diploma for the Postgraduate Certificate 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 a **Postgraduate Certificate in Taxation of Algorithmic Trading** 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 Taxation of Algorithmic Trading**

Modality: **online**

Duration: **6 weeks**

Accreditation: **6 ECTS**





Postgraduate Certificate Taxation of Algorithmic Trading

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

Postgraduate Certificate

Taxation of Algorithmic Trading