

Postgraduate Certificate Reproductive Treatments

Endorsed by:





Postgraduate Certificate Reproductive Treatments

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

Website: www.techtute.com/us/medicine/postgraduate-certificate/reproductive-treatments

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01

Introduction

Medical and scientific research has provided reproductive medicine with new ways of working that considerably increase the success rate of this type of intervention. This program compiles the most interesting advances in Reproductive Treatments, in a learning oriented directly to practical intervention, which will allow to attain the necessary skills to be part of the medical forefront in this field.





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A highly educational Postgraduate Certificate created to update your skills and learn about the latest and most advanced Reproductive Treatments of today, with the highest quality and efficiency in the online teaching market"

Reproductive treatments can range from a single ovulation induction with indication of directed sexual intercourse in patients with good prognosis, to artificial inseminations or In Vitro Fertilization treatments with or without sperm microinjection. Knowing the indications and limitations of each of them is one of the purposes of this module. Current topics such as the donation of eggs and uterine surrogacy, as well as the current legislation on the use of donor gametes and gestational surrogacy are also developed.

We carry out a review of the possible complications that could derive from Reproductive Treatments, with emphasis on the feared ovarian hyperstimulation syndrome, which has passed into the background since the introduction of ovulation induction with GnRH analogues.

This section also reviews the current reproductive legislation and the most important variations that have occurred in recent years in Spain, as well as in other countries in our environment, with more restrictive laws that favor the so-called reproductive tourism across borders. BORRAR Special emphasis is placed on the legislation regarding Reproductive Treatments with donor gametes, in which progress has been made by making mandatory a national registry of all treatments performed, with their results.

This **Postgraduate Certificate in Reproductive Treatments** contains the most complete and up-to-date scientific program on the market. Its most outstanding features are:

- The latest technology in online teaching software
- A highly visual teaching system, supported by graphic and schematic contents that are easy to assimilate and understand
- Practical cases presented by practicing experts
- State-of-the-art interactive video systems.
- Teaching supported by telepractice
- Continuous updating and recycling systems
- Autonomous learning: full compatibility with other occupations
- Practical exercises for self-assessment and learning verification
- Support groups and educational synergies: questions to the expert, debate and knowledge forums.
- Communication with the teacher and individual reflection work
- Content that is accessible from any fixed or portable device with an Internet connection
- Supplementary documentation databases are permanently available, even after the program



Our innovative telepractice concept will give you the opportunity to learn through an immersive experience, which will provide you with a faster integration and a much more realistic view of the contents: learning from an expert"

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With a methodological design based on proven teaching techniques, this Postgraduate Certificate will take you through different teaching approaches to allow you to learn in a dynamic and effective way”

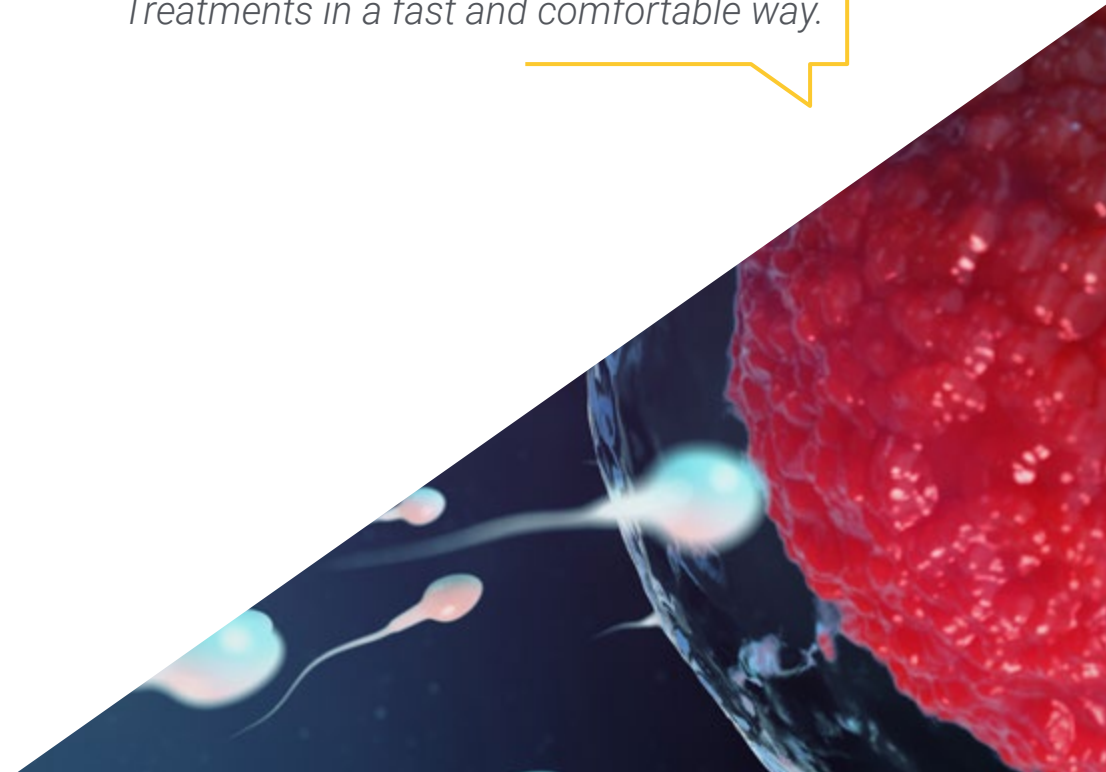
Our teaching staff is composed of medical professionals, practising specialists. In this way we ensure that we deliver the educational update we are aiming for. A multidisciplinary team of physicians specialized and experience in different environments, who will develop theoretical knowledge effectively, but, above all, will bring their practical knowledge derived from their own experience to the program: one of the differential qualities of this Postgraduate Certificate.

This mastery of the subject is complemented by the effectiveness of the methodological design of this Postgraduate Certificate. Developed by a multidisciplinary team of *e-Learning* experts, it integrates the latest advances in educational technology. In this way, you will be able to study with a range of comfortable and versatile multimedia tools that will give you the operability you need for your training.

The design of this program is based on Problem-Based Learning: an approach that conceives learning as a highly practical process. To achieve this remotely, we will use *telepractice* learning: with the help of an innovative interactive video system, and *learning from an expert*, you will be able to acquire the knowledge as if you were actually dealing with the scenario you are learning about. A concept that will allow you to integrate and fix learning in a more realistic and permanent way.

This 100% online Postgraduate Certificate will allow you to balance your studies with your professional work while increasing your knowledge in this field.

Acquire the most complete theoretical and practical knowledge in Reproductive Treatments in a fast and comfortable way.



02 Objectives

This main objective of this Postgraduate Certificate is to bring the students' knowledge up to date in all areas surrounding decision-making during the evaluation of the patient and their partner. This includes the diagnosis, prognosis and the subsequent treatments. A structured approach in all areas related to assisted reproduction that will allow you to increase quality.





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Our goal is to provide a highly qualified educational journey, from the best professionals in this speciality”



General Objectives

- ◆ Acquire up-to-date concepts in anatomy, physiology, embryology and genetics, which will help to understand reproductive diagnostics and treatments
- ◆ Understand in detail the aspects related to the initial assessment of a sterile couple. Study criteria and referral to Reproduction Units. Basic clinical examination, request and interpretation of the results of complementary tests
- ◆ Perform an appropriate assessment and clinical orientation of the couple. Indication of request for specific tests based on the above findings
- ◆ Have an exhaustive knowledge of the different types of medical treatment, indications and their choice according to the profile of the patient and their partner
- ◆ Know the indications and surgical techniques that could improve the reproductive results of our patients. Alterations in uterine morphology (congenital or acquired). Endometriosis. Tubal Surgery
- ◆ Know the techniques used in the Andrology, IVF and cryobiology laboratories. Diagnostic techniques and sperm selection techniques. Oocyte evaluation. Embryonic Development
- ◆ Describe the types of genetic embryonic studies that are available, know their possible indications and be able to interpret the results
- ◆ Know the current legal situation of the treatments for assisted reproduction in our country
- ◆ Know the main scientific and patient societies in the field of reproductive medicine





Specific Objectives

- ♦ Manage the different drugs used in ovulation stimulation
- ♦ Know the different stimulation protocols according to the patient's characteristics
- ♦ Develop IVF/ICSI techniques (micromanipulation) from the beginning: SUZI, PZD, ROSI, ELSI, IMSI, PICSI, assisted hatching
- ♦ Explore culture media composition and requirements as a function of embryonic developmental stage
- ♦ Study embryo development and specific classification of embryo quality according to stages
- ♦ Delve into time-lapse technology and the different kinetic events affecting embryo division
- ♦ Study the automatic algorithms presented by each time-lapse technology and relate them to the reproductive results
- ♦ Develop additional techniques in the laboratory that allow a possible improvement in embryo implantation (collapse, *hatching*)



A comprehensive program, developed in an eminently practical way, to quickly provide you with the necessary knowledge for its application

03

Course Management

Within the concept of total quality of the Postgraduate Certificate, TECH is proud to provide students with a teaching staff of the highest level, chosen for their proven experience in the educational field. Professionals from different areas and fields of expertise that make up a complete, multidisciplinary team. A unique opportunity to learn from the best.





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An impressive teaching staff, made up of professionals from different areas of expertise, will be your teachers during the program: a unique opportunity not to be missed”

International Guest Director

Dr. Michael Grynberg is a prominent Obstetrician-Gynecologist whose research in Reproductive Endocrinology, Infertility and Andrology has achieved international impact. Likewise, this specialist has been a pioneer in fertility preservation in oncology patients. His avant-garde studies in this field have allowed people facing aggressive medical treatments to maintain options to preserve their reproductive capacity.

Thanks to his extensive knowledge in this scientific area, Dr. Grynberg participated in the foundation of the French Oncofertility Society and later became its elected president. At the same time, he directs the Department of Reproductive Medicine and Fertility Preservation at the Antoine-Béclère University Hospital Center. At the same time, he is a member of the Reproductive Endocrinology Group of the European Society of Human Reproduction and Embryology (ESHRE). In addition, he runs the National College of Obstetricians-Gynecologists (CNGOF) in his country.

He has also published 3 books and accumulated more than 350 scientific publications in journals and conference presentations. In them he has addressed topics ranging from in vitro oocyte maturation in case of ovarian resistance, to investigating the role of ZO-1 in the differentiation of human placental trophoblast cells. Another of his contributions has been the description of the Follicular Outflow Rate (FORT) as a means to evaluate the sensitivity of follicles to FSH hormone. He is also the author of a disruptive proposal based on intraovarian administration of AMH to prevent follicular loss and fertility impairment after cyclophosphamide administration.

In terms of competency development, Dr. Grynberg has sustained intensive academic updating. He completed his specialization at the Lariboisière Faculty in Paris and, in turn, has a training stay at the Center for Reproductive Medicine of the New York Presbyterian Hospital.



Dr. Grynberg, Michael

- ♦ Director of Reproductive Medicine at the Antoine-Béclère Hospital Center, Paris, France
- ♦ Head of the Department of Reproductive Medicine-Fertility Preservation at the Jean-Verdier de Bondy Hospital
- ♦ Director of the French National College of Obstetricians and Gynecologists
- ♦ President of the French Society of Oncofertility
- ♦ Doctor of Medicine at the Lariboisière Faculty in Paris
- ♦ Fellowship at the Center for Reproductive Medicine, New York Presbyterian Hospital
- ♦ Member of: European Society of Human Reproduction and Embryology (ESHRE)

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

Management



Dr. Iniesta Pérez, Silvia

- ♦ Coordinator of the Reproduction Unit at La Paz University Hospital.
- ♦ Degree in Medicine and Surgery from the University of Alcalá, Madrid
- ♦ Specialist in Obstetrics and Gynecology, via MIR. Santa Cristina University Hospital, Madrid
- ♦ Doctorate Courses at the Autonomous University of Madrid
- ♦ Research Sufficiency in the Department of Obstetrics and Gynecology, Universidad Autónoma de Madrid, Qualification: Outstanding.
- ♦ Doctoral Thesis, Obstetrics and Gynecology Department, Autonomous University of Madrid Outstanding- Cum Laude
- ♦ Levels I, II, III and IV obstetric-gynecological ultrasound (SESEGO accreditation)
- ♦ Professional Master's Degree in Human Reproduction IVI
- ♦ Professional Master's Degree in Genomics and Medical Genetics 2nd edition, Granada University
- ♦ Online Professional Master's Degree in Minimally Invasive Surgery in Gynecology. CEU Cardenal Herrera University
- ♦ Masterclass Patient-Centered Clinical Management. Deusto Business School, Madrid
- ♦ Area Specialist Doctor at the Santa Cristina University Hospital, Madrid
- ♦ Interim Labor Doctor, Hospital Infanta Sofía, Madrid
- ♦ Physician on Secondment at the Hospital Universitario La Paz



Dr. Franco Iriarte, Yosu

- Laboratory and scientific director, International Ruber Hospital
- Head of the Assisted Reproduction Laboratory of the Virgen del Pilar Health Centre in San Sebastián
- Head of the Assisted Reproduction Laboratory of Policlínica Guipúzcoa, including the laboratory of Clínica del Pilar
- Collaboration with the Assisted Reproduction Center, Navarro Medical Center
- Senior Embryologist at Cornell University Hospitals of New York and RMA of New Jersey
- Creation of the company Donostia Basque Institute of Fertility located in Onkologikoa. Managing Director.
- Managing Director of the Donostia Basque Institute of Fertility.
- Graduate in Biology, University of Navarra (Fundamental and Health Specialty)
- CAP Qualification (Certificate of Pedagogical Competency)
- PhD in Science from the University of Navarra. Thesis Title: "Genetic risk factors for venous thrombosis"
- University Specialist in Assisted Reproduction: Psychological and Legal Aspects from the Complutense University of Madrid.
- Discussion Table Moderator of the North Forum Reproduction Units on embryonic and oocyte morphological criteria and embryo freezing.
- Postgraduate Certificate in Nursing. UPV-EHU "Donostia School of Nursing" Donostia- San Sebastián
- Professional Master's Degree in "Genetic Counseling". San Pablo University CEU in Madrid

Professors

Dr. Sánchez Hernández, María José

- ◆ Specialist in Obstetrics and Gynecology at the Reproduction Unit of Hospital Universitario La Paz, Madrid.

Dr. Silva Zaragüeta, Patricia

- ◆ Specialist in Obstetrics and Gynecology at La Paz University Hospital
- ◆ PhD in Medicine and Surgery from the Autonomous University of Madrid.
- ◆ Dedicated to reproductive medicine since 2012 at Hospital Universitario.

Dr. Armijo Suarez, Onica

- ◆ Assistant Specialist in Gynecology and Obstetrics at La Paz Hospital Human Reproduction Unit
- ◆ Professor of the Faculty of Medicine of the UAM

Dr. Martín Camean, María

- ◆ Gynecologist at the Reproduction Unit of La Paz University Hospital
- ◆ Professional Master's Degree in Human Reproduction from Rey Juan Carlos University
- ◆ Professional Master's Degree in Gynecologic Oncology by CEU Cardenal Herrera University
- ◆ Postgraduate Diploma in Ovarian Cancer by CEU Cardenal Herrera University

Dr. Cabezuelo Sánchez, Vega María

- ◆ Gynecologist and Obstetrician Expert in Assisted Reproduction
- ◆ Gynecologist and Obstetrician at the Ruber International Hospital
- ◆ Researcher in Human Reproduction at the Ruber Internacional Hospital
- ◆ Collaborator in several publications and scientific communications
- ◆ Member: Spanish Fertility Society (SEF), Spanish Society of Gynecology and Obstetrics (SEGO)





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Make the most of this opportunity to learn about the latest advances in this field in order to apply it to your daily practice"

04

Structure and Content

The program contents have been developed by the different experts on the course, with a clear purpose: to ensure our students acquire each and every one of the necessary skills to become true experts in this field. Knowledge that will enable the student to respond in an efficient way to each and every one of the needs in this area of medicine.





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A comprehensive teaching program, structured in well-developed teaching units, oriented towards learning that is compatible with your personal and professional life"

Module 1. Reproductive Treatments Medication. Stimulation Protocols

- 1.1. Evolution of Reproductive Treatments Throughout History
- 1.2. Drugs Involved in Ovarian Stimulation Ovulation Induction
- 1.3. Artificial Insemination Techniques Results
- 1.4. In Vitro Fertilization Ovarian Stimulation Protocols in High, Normal and Low Responders Luteal Phase Stimulation
- 1.5. Adjuvant Treatments Used in Low Ovarian Reserve
- 1.6. In Vitro Fertilization Cycle Tracking Ovarian Puncture Embryo Transfer
- 1.7. Embryo Cryotransfer Endometrial Preparation in Substituted Cycles
- 1.8. Egg Donation Embryoreception Surrogacy
- 1.9. Complications in Assisted Reproduction Treatments
- 1.10. Multiple Pregnancy Reduction Policy





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A unique, key, and decisive educational experience to boost your professional development”

05

Methodology

This academic program offers students a different way of learning. Our methodology follows a cyclical learning process: **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

What should a professional do in a given situation? Throughout the program, students will face multiple simulated clinical cases, based on real patients, in which they will have to do research, establish hypotheses, and ultimately resolve the situation. There is an abundance of scientific evidence on the effectiveness of the method. Specialists learn better, faster, and more sustainable over time.

With TECH you will experience a way of learning that is shaking the foundations of traditional universities around the world.



According to Dr. Gérvas, the clinical case is the annotated presentation of a patient, or group of patients, which becomes a “case”, an example or model that illustrates some peculiar clinical component, either because of its teaching power or because of its uniqueness or rarity. It is essential that the case is based on current professional life, trying to recreate the real conditions in the physician’s professional practice.

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Did you know that this method was developed in 1912, at Harvard, for law students? The case method consisted of presenting students with real-life, complex situations for them to make decisions and justify their decisions on how to solve them. In 1924, Harvard adopted it as a standard teaching method.”

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.



Relearning Methodology

At TECH, we enhance the Harvard case method with the best 100% online teaching methodology available: Relearning.

This university is the first in the world to combine the study of clinical cases with a 100% online learning system based on repetition, combining a minimum of 8 different elements in each lesson, a real revolution with respect to the mere study and analysis of cases.

Professionals will learn through real cases and by resolving complex situations in simulated learning environments. These simulations are developed using state-of-the-art software to facilitate immersive learning.



At the forefront of world teaching, the Relearning method has managed to improve the overall satisfaction levels of professionals who complete their studies, with respect to the quality indicators of the best online university (Columbia University).

With this methodology, more than 250,000 physicians have been prepared with unprecedented success in all clinical specialties regardless of surgical load. Our educational methodology is developed in a highly competitive environment, with a university student body with a strong socioeconomic profile and an average age of 43.5 years old.

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.

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.

The overall score obtained by TECH's learning system is 8.01, according to the highest international standards.



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 adapted in 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.



Surgical Techniques and Procedures on Video

TECH introduces students to the latest techniques, the latest educational advances and to the forefront of current medical techniques. All of this in direct contact with students and explained in detail so as to aid their assimilation and understanding. And best of all, you can watch the videos as many times as you like.



Interactive Summaries

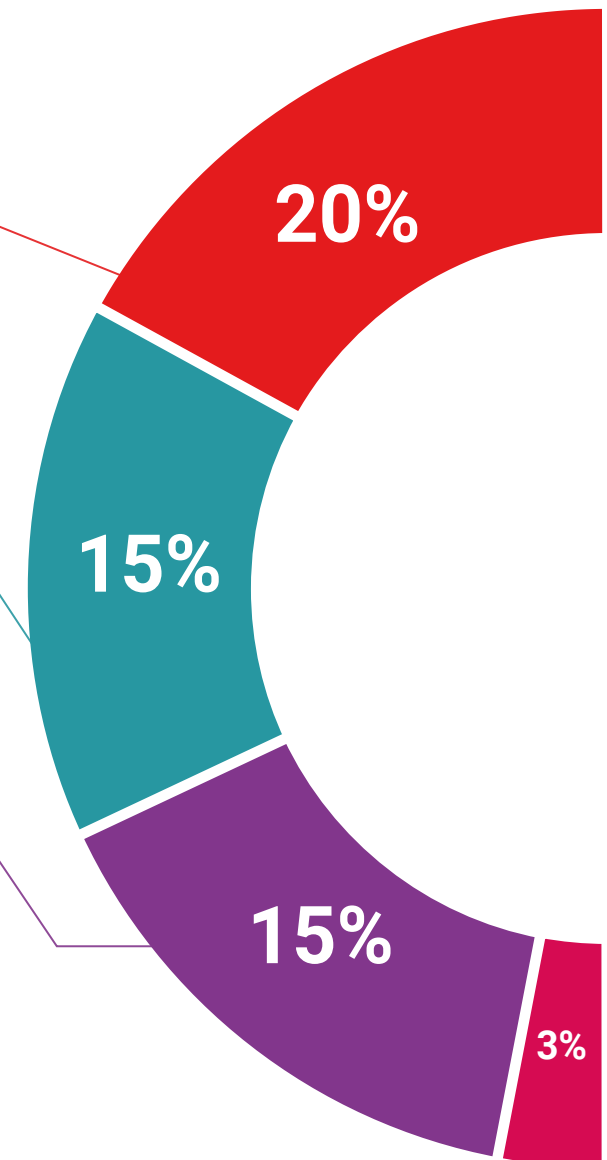
The TECH team presents the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

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



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.





Expert-Led Case Studies and Case Analysis

Effective learning ought to be contextual. Therefore, TECH presents real cases in which the expert will guide students, focusing on and solving the different situations: a clear and direct way to achieve the highest degree of understanding.



Testing & Retesting

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



Classes

There is scientific evidence on the usefulness of learning by observing experts. The system known as Learning from an Expert strengthens knowledge and memory, and generates confidence in future difficult decisions.



Quick Action Guides

TECH offers the most relevant contents of the course in the form of worksheets or quick action guides. A synthetic, practical and effective way to help students progress in their learning.



06 Certificate

This Postgraduate Certificate in Reproductive Treatments guarantees students, in addition to the most rigorous and up-to-date Postgraduate Certificate, 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 program will allow you to obtain your **Postgraduate Certificate in Reproductive Treatments** 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 Reproductive Treatments**

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.



Postgraduate Certificate Reproductive Treatments

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

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