

Postgraduate Certificate

Sports Nutrition in Adverse Conditions





Postgraduate Certificate Sports Nutrition in Adverse Conditions

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

Website: www.techtute.com/us/pharmacy/postgraduate-certificate/sports-nutrition-adverse-conditions

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01

Introduction

According to the World Health Organization, more than 37% of athletes participating in sports in extreme conditions experience nutritional problems that could be mitigated with proper nutritional counseling. However, there is a gap in the sports community as to how pharmacists can effectively contribute to this area. The truth is that these specialists are highly qualified to design and recommend dietary plans that include key Nutritional Supplements to improve athletes' performance while optimizing health status. Faced with this reality, TECH implements a cutting-edge university program focused on sports nutrition in highly complex scenarios. In addition, it is delivered under a convenient 100% online flexibility to fit the schedule of busy professionals.





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Through this 100% online program, you will provide excellent nutritional advice to athletes competing in challenging environments”

In the context of sports performed under extreme conditions, the collaboration between pharmacists and coaches becomes an essential pillar to ensure the success of athletes. These specialists have in-depth knowledge of biochemistry and metabolism, which enables them to create specific nutritional strategies to support athletes' performance. For example, supplements that include electrolytes (such as sodium, potassium or magnesium) help to maintain a correct water balance to prevent dehydration. In view of this, pharmacists need to keep abreast of the latest trends in Sports Supplementation in order to provide high quality advice.

Within this framework, TECH is developing an innovative program in Sports Nutrition in Adverse Conditions. The academic itinerary will briefly review the history of sports in extreme situations, with emphasis on competitions in very hot or cold climates. Likewise, the syllabus will delve into the nutritional needs of athletes (including electrolytes and carbohydrates) in order to have sufficient energy for sports practice. As a result, graduates will acquire advanced skills to identify nutritional problems and recommend the most appropriate supplementation to address them. It should be noted that the program will include the participation of a prestigious International Guest Director, who will give a master class aimed at optimizing the nutritional strategies of pharmacists.

On the other hand, the university program is based on the innovative Relearning method, of which TECH is a pioneer. This teaching system employs the reiteration of key content in a natural way, ensuring that it remains in the specialists' memory without the need to resort to costly traditional techniques such as memorization. In addition, the only thing pharmacists will require to access the Virtual Campus is an electronic device with Internet access (cell phones, tablets or computers).

This **Postgraduate Certificate in Sports Nutrition in Adverse Conditions** contains the most complete and up-to-date scientific program on the market. The most important features include:

- ♦ The development of practical cases presented by experts in Nutrition and Dietetics
- ♦ The graphic, schematic and eminently practical contents with which it is conceived gather scientific and practical information on those disciplines that are indispensable 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



A distinguished International Guest Director will offer a disruptive Masterclass dedicated to aspects such as the latest trends in Sports Nutrition in hostile scenarios"

“

The Relearning system applied by TECH in its programs will reduce the long hours of study so common in other teaching methods. You will enjoy totally progressive and natural learning!”

The program's teaching staff includes professionals from the sector who contribute their work experience to this specializing program, 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 education programmed to learn in real situations.

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

You will address Sports Performance Limitations in hot climates and develop strategies to prevent possible fatigue.

You will delve into the specifics of VO2 Max, being able to identify risk factors associated with inadequate exercise.



02 Objectives

Upon completion of this university program, pharmacists will have a solid foundation in Sports Nutrition in Adverse Conditions. In this sense, graduates will understand how different adverse environments (such as high temperatures, high altitude or hot weather) affect the dietary needs of athletes. Similarly, professionals will develop skills to identify specific nutritional problems that arise in these scenarios and provide highly personalized nutrient counseling. As a result, experts will help athletes optimize their athletic performance and overall well-being.



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You will design specific nutritional plans that respond to the particular needs of athletes in challenging contexts such as extremely cold climates”



General Objectives

- ♦ Manage advanced knowledge on nutritional planning in professional and non-professional athletes for the healthy performance of physical exercise
- ♦ Manage advanced knowledge on nutritional planning in professional athletes of various fields in order to achieve maximum sports performance
- ♦ Learn advanced knowledge about nutritional planning in professional athletes from team sports to achieve the highest sports performance
- ♦ Manage and consolidate the initiative, entrepreneurial spirit to implement projects related to nutrition in physical activity and sport
- ♦ Know how to incorporate the different scientific advances into one's own professional field
- ♦ Develop the ability to work in a multidisciplinary environment





Specific Objectives

- ◆ Differentiate between the main performance limiting factors caused by climate
- ◆ Develop an acclimatization plan appropriate to the situation given
- ◆ Delve into the physiological adaptations due to altitude
- ◆ Establish the correct individual hydration guidelines according to the climate

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You will have a wide range of educational resources at your disposal, accessible 24 hours a day, 7 days a week”

03

Course Management

For the development and delivery of this program, TECH has assembled an elite teaching team, composed of specialists in Nutrition and Dietetics. These experts, who have extensive professional experience, have contributed to meet the nutritional demands of athletes under extreme conditions. Thanks to this, these specialists have created academic content of high quality and direct relevance to the current needs of the labor market. In this way, pharmacists will have the possibility of entering into a high-voltage experience that will considerably expand their professional opportunities.





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A teaching team specialized in Sports Nutrition will pour their extensive knowledge in this emerging field into the didactic materials that make up this university program”

International Guest Director

Jamie Meeks has demonstrated throughout her career her dedication to Sports Nutrition. After graduating from Louisiana State University with a degree in Sports Nutrition, she quickly rose to prominence. Her talent and commitment were recognized when she received the prestigious Young Dietitian of the Year award from the Louisiana Dietetic Association, an achievement that marked the beginning of a successful career.

After completing her undergraduate degree, Jamie Meeks continued her education at the University of Arkansas, where she completed her internship in Dietetics. She then went on to earn a Master's Degree in Kinesiology with a specialization in Exercise Physiology from Louisiana State University. Her passion for helping athletes reach their full potential and her tireless commitment to excellence make her a leading figure in the sports and nutrition community.

Her deep knowledge in this area led her to become the first Director of Sports Nutrition in the history of Louisiana State University's athletic department. There, she developed innovative programs to meet the dietary needs of athletes and educate them on the importance of proper nutrition for optimal performance.

Subsequently, she has held the position of Director of Sports Nutrition for the NFL's New Orleans Saints. In this role, she is dedicated to ensuring that professional players receive the best nutritional care possible, working closely with coaches, trainers, physical trainers and medical staff to optimize individual performance and health.

As such, Jamie Meeks is considered a true leader in her field, being an active member of several professional associations and participating in the advancement of Sports Nutrition on a national level.

In this regard, she is also a member of the Academy of Nutrition and Dietetics and the Association of Chartered and Professional Sports Dietitians.



Ms. Meeks, Jamie

- Director of Sports Nutrition for the New Orleans Saints of the NFL, Louisiana, U.S.A.
- Sports Nutrition Coordinator at Louisiana State University, Louisiana
- Registered Dietitian by the Academy of Nutrition and Dietetics
- Certified Specialist in Sports Dietetics
- Master's Degree in Kinesiology with specialization in Exercise Physiology from the Louisiana State University
- Graduate in Dietetics from Louisiana State University
- Member of: Louisiana Dietetic Association, Association of Dietitians Collegiate and Professional, and Dietetic Practice Group of Cardiovascular Sports Nutrition and Wellness



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

Management



Dr. Marhuenda Hernández, Javier

- ♦ Professional soccer clubs Nutritionist
- ♦ Head of Sports Nutrition. Club Albacete Balompie SAD
- ♦ Head of Sports Nutrition. Catholic University of Murcia, UCAM Murcia Football Club
- ♦ Scientific Advisor. Nutrium
- ♦ Nutritional Advisor. Impulse Center
- ♦ Teacher and Coordinator of Postgraduate Studies
- ♦ PhD in Nutrition and Food Safety. San Antonio Murcia Catholic University
- ♦ Degree in Human Nutrition and Dietetics. San Antonio Murcia Catholic University
- ♦ Master's Degree in Clinical Nutrition. San Antonio Murcia Catholic University
- ♦ Academic Academia Española de Nutrición y Dietética (AEND)

Professors

Dr. Arcusa Saura, Raúl

- ♦ Nutritionist. Sport Club Castellón
- ♦ Nutritionist in several semi-professional clubs in Castellón
- ♦ Researcher. San Antonio Murcia Catholic University
- ♦ Undergraduate and Graduate Faculty
- ♦ Graduate in Human Nutrition and Dietetics
- ♦ Master's Degree in Nutrition in Physical Activity and Sport



04

Structure and Content

This program will equip pharmacists with a holistic understanding of Sports Nutrition in Adverse Conditions. The curriculum will take a brief look at the history of sport in unfavorable situations, such as excessively hot or cold climates. Likewise, the syllabus will delve into common conditions in these circumstances, among which dehydration stands out. The program will also analyze the importance of maintaining a balanced carbohydrate intake to ensure that athletes have energy. In this way, graduates will prevent possible nutritional deficiencies and recommend to individuals the most effective supplements to optimize their performance.





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You will be able to recommend personalized dietary plans to athletes facing unfavorable conditions, keeping in mind their specific energy and nutritional needs”

Module 1. Adverse Conditions

- 1.1. The History of Sport in Extreme Conditions
 - 1.1.1. Winter Competitions throughout History
 - 1.1.2. Competitions in Hot Environments Today
- 1.2. Performance Limitations in Hot Climates
 - 1.2.1. Dehydration
 - 1.2.2. Fatigue
- 1.3. Basic Characteristics in Hot Climates
 - 1.3.1. High Temperature and Humidity
 - 1.3.2. Acclimatization
- 1.4. Nutrition and Hydration in Hot Climates
 - 1.4.1. Hydration and Electrolytes
 - 1.4.2. Carbohydrates
- 1.5. Performance Limitations in Cold Climates
 - 1.5.1. Fatigue
 - 1.5.2. Bulky Clothing
- 1.6. Basic Characteristics in Cold Climates
 - 1.6.1. Extreme Cold
 - 1.6.2. Reduced VO2 Max
- 1.7. Nutrition and Hydration in Cold Climates
 - 1.7.1. Hydration
 - 1.7.2. Carbohydrates





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This university program will prepare you to overcome the challenges related to Sports Nutrition in Adverse Conditions. Enroll now!”

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"

At TECH we use the Case Method

What should a professional do in a given situation? Throughout the program, students will be confronted with multiple simulated clinical cases based on real patients, in which they will have to investigate, establish hypotheses and ultimately, resolve the situation. There is an abundance of scientific evidence on the effectiveness of the method. Pharmacists learn better, more quickly and more sustainably 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. Gervas, 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, attempting to recreate the actual conditions in a pharmacist'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. Pharmacists who follow this method not only grasp concepts, but also develop their mental capacity, by evaluating real situations and applying their 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 case method with the best 100% online teaching methodology available: Relearning.

Our 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, which represent a real revolution with respect to simply studying and analyzing cases.



Pharmacists will learn through real cases and by solving 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 115,000 pharmacists have been trained with unprecedented success in all clinical specialties, regardless of the surgical load. This pedagogical methodology is developed in a highly demanding environment, with a university student body with a high socioeconomic profile and an average age of 43.5 years.

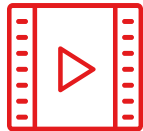
Relearning will allow you to learn with less effort and better performance, involving you more in your specialization, developing a critical mindset, defending arguments, and contrasting opinions: a direct equation to success.

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 created specifically for the course by specialist pharmacists who will be teaching the course, so that the didactic development is highly specific and accurate.

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.



Video Techniques and Procedures

TECH introduces students to the latest techniques, to the latest educational advances, to the forefront of current pharmaceutical care procedures. All of this, first hand, and explained and detailed with precision to contribute to assimilation and a better understanding. And best of all, you can watch them as many times as you want.



Interactive Summaries

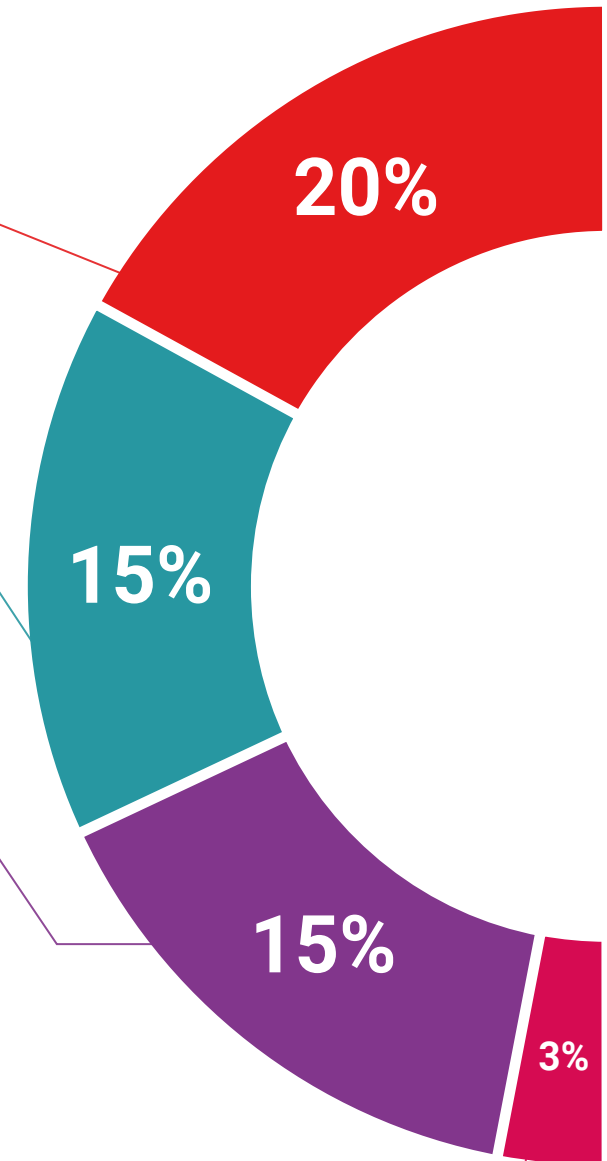
The TECH team presents the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

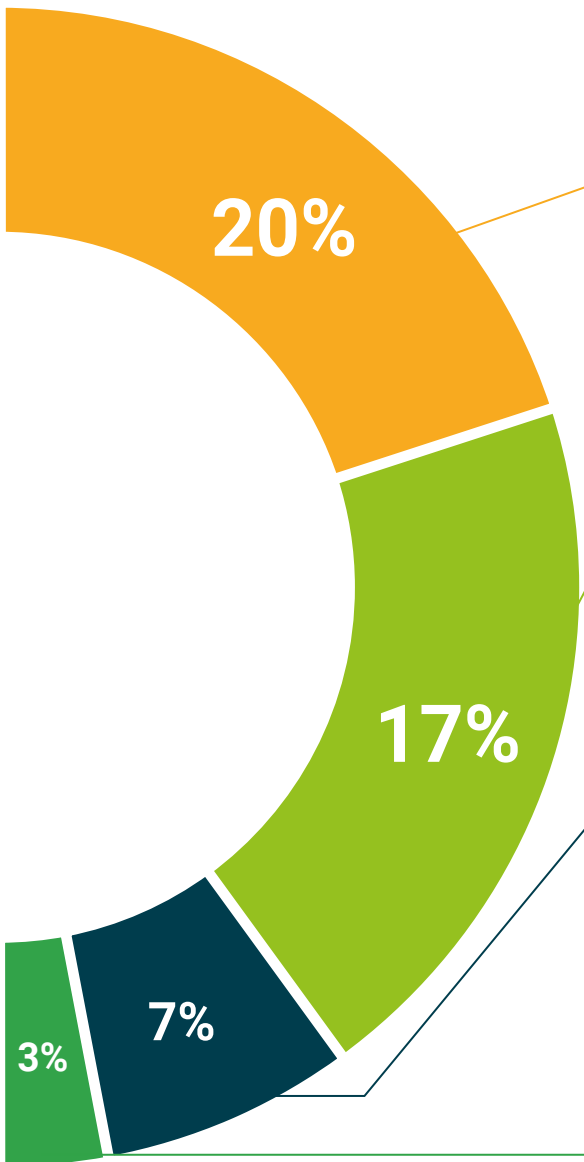
This unique multimedia content presentation training system was awarded by Microsoft as a "European Success Story".



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, we will present you with real case developments in which the expert will guide you through focusing on and solving the different situations: a clear and direct way to achieve the highest degree of understanding.



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.



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

The Postgraduate Certificate in Sports Nutrition in Adverse Conditions 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 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 Sports Nutrition in Adverse Conditions** 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 Sports Nutrition in Adverse Conditions**

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Accreditation: **6 ECTS**





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