Postgraduate Diploma

Update on Hospital Pediatrics

tech global university

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Postgraduate Diploma

Update on Hospital Pediatrics

- Modality: **online**
- Duration: **6 months**
- Certificate: **TECH Global University**
- Credits: **18 ECTS**
- Schedule: **at your own pace**
- Exams: **online**

Website: www.techtitute.com/us/medicine/postgraduate-diploma/postgraduate-diploma-update-hospital-pediatrics

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01

Introduction

Pediatric patient care requires professionals to constantly update their knowledge. Matters such as acute respiratory failure, advanced cardiopulmonary resuscitation and diabetic education undergo continuous advances that specialists must incorporate into their daily practice in order to guarantee that they provide the best professional care. For this reason, TECH has compiled the latest scientific evidence in hospital pediatrics for this program, supported by a great team of professionals with extensive experience in both the academic and healthcare field. This is a unique opportunity to delve into new pediatric processes and practices.

You will have access to the most rigorous scientific findings on cerebral crises, allergic reactions and complex pediatric patients"

Given the high level of scientific advances in the last decade, pediatric specialists have had to constantly update their knowledge. New developments in analgesia and sedation allow for better pain and anxiety management in pediatric patients, while, at the same time, advances in the detection of child abuse allow specialists to act more quickly and effectively.

For this reason, TECH has brought together an extensive team of professionals who have experience in various areas of pediatrics, including respiratory failure, pediatric palliative care, skin lesions and other areas of great interest to all specialists.

The educational material provided in this Postgraduate Diploma complements the most current theoretical framework with practical exercises and real clinical cases that contextualize all the contents.

As it is a 100% online course, specialists will be able to perfectly balance it with even the most demanding professional commitments or personal responsibilities. Without the need to attend classes or adhere to a fixed schedule, the material can be downloaded at any time from any device with an Internet connection. This allows specialists to decide where, when and how to take on the entire course load.

This **Postgraduate Diploma in Update on Hospital Pediatrics** is the most complete and up-to-date academic program on the market. Its most notable features are:

- Practical case studies presented by experts in hospital pediatrics
- The graphic, schematic, and eminently 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
- Special emphasis is placed on innovative methodologies in the approach to pneumological affections
- Theoretical lessons, questions to the expert, debate forums on controversial topics, and individual reflection assignments
- Content that is accesible from any fixed or portable device with an Internet connection

You will find scientific guidelines and innovative articles on the most urgent topics in the current field of pediatrics, including analgesia and sedation, electrocardiograms and pediatric palliative care"

You have the quality endorsement of a team of professionals with years of experience in pediatrics, who have even managed and directed pediatric units in leading hospitals"

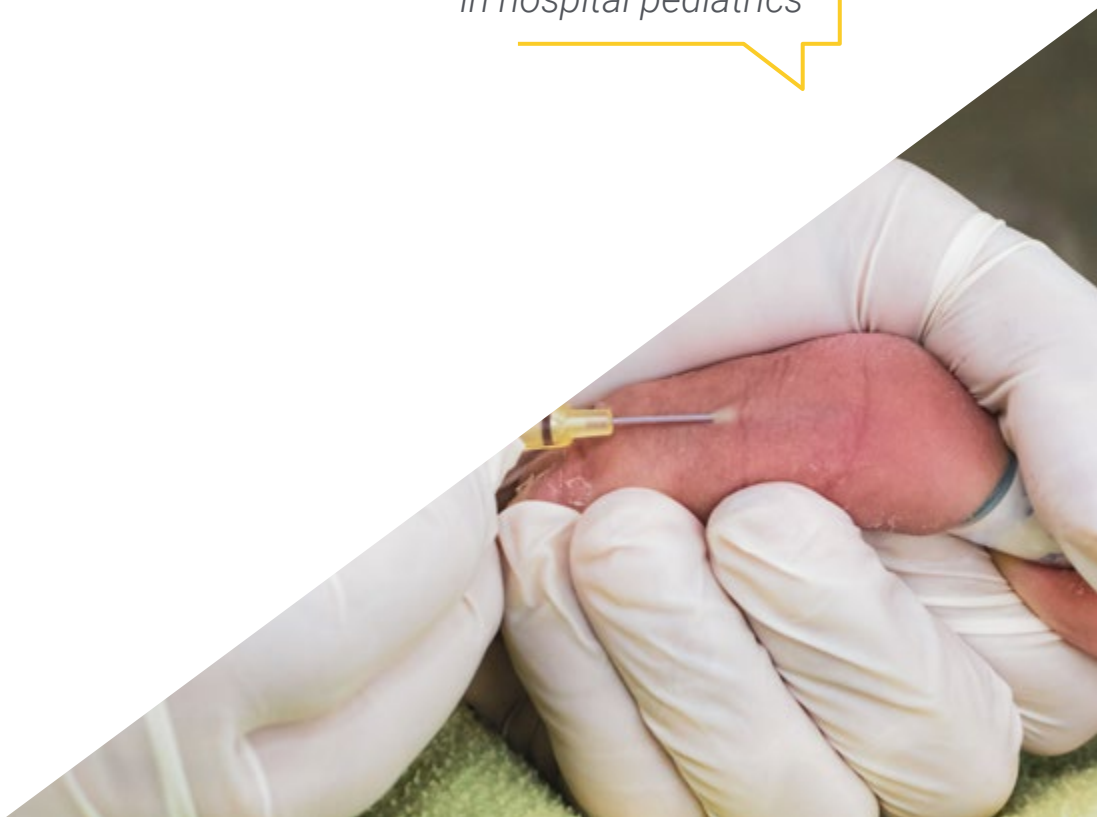
You won't have to sacrifice any aspect of your personal or professional life. Thanks to TECH's flexibility, you will study at your own pace, with no schedules to constrain you

Supported by the latest educational technology available, you will quickly and efficiently update all your skills in hospital pediatrics

The program's teaching staff includes professionals in the sector who contribute their work experience to this 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 an immersive program designed 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 academic year. For this purpose, the student will be assisted by an innovative interactive video system created by renowned and experienced experts.



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Objectives

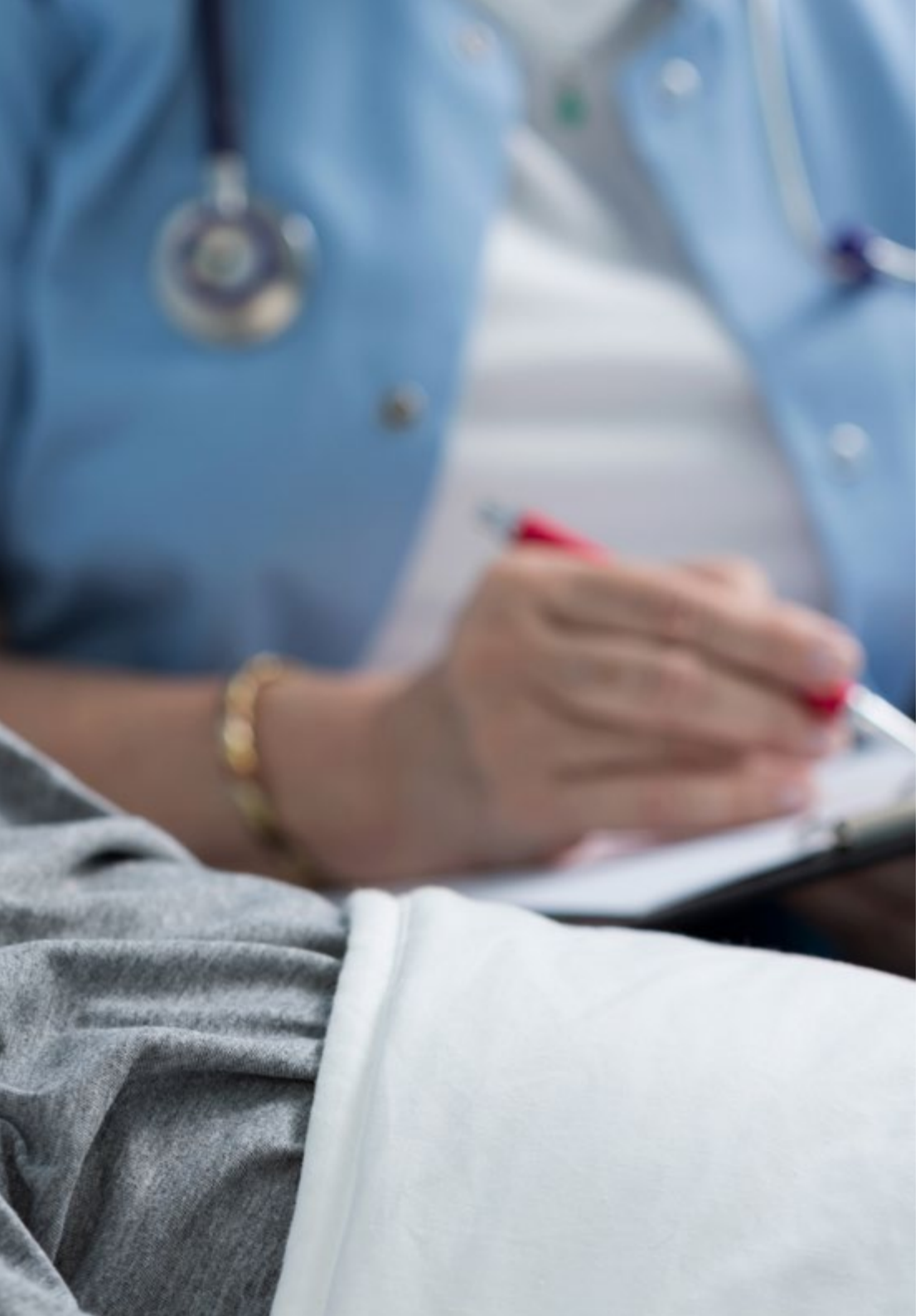
It will always be essential for professionlas to keep their medical knowledge up to date, but in the field of pediatrics it is even more urgent due to the complexity of this health service. The main objective of this program is to offer specialists the best knowledge and scientific findings in recent years to update and deepen their knowledge in the most common pediatric procedures. For this reason, it includes a multitude of topics ranging from the interpretation of blood gases to liaison psychiatry in chronic diseases.

Thanks to TECH's advanced teaching methodology, you will incorporate all the current knowledge from the program into your daily practice, even before you finish it"

General Objectives

- Master the latest techniques and knowledge in modern hospital pediatrics
- Become highly fluent in pediatric patient management, ensuring maximum quality and safety during the process
- Develop exemplary skills to provide high quality care, guaranteeing patient safety based on the latest scientific evidence
- Gain up-to-date knowledge on hospital pediatrics

Continue your lifelong education with the best professionals at TECH"



Specific Objectives

Module 1. Treating Critically Ill Children Not in the Pediatric Intensive Care Unit

- Delve deeper into the different hospital practices regarding initial child management in life-threatening situations due to acute hemodynamic, respiratory and/or neurological involvement
- Gain up-to-date knowledge of the rapid intubation sequence and advanced cardiopulmonary resuscitation in children according to the latest ILCOR 202 recommendations
- Master the practical diagnosis and therapy management for children disconnected from the environment
- Know the algorithm of action in cases of status convulsus
- Deal with allergic reactions and anaphylaxis, oxygen therapy, fluid therapy, ECG, analgesia and sedation, and be introduced to thoracic ultrasound

Module 2. Infectious Diseases in Pediatrics

- Focus on key issues such as antibiotic policy and isolation measures
- Analyze the most frequent infectious pathologies through new algorithms and protocols, as well as traveler and immigrant infections and new emerging viruses

Module 3. Other Pediatric Processes

- Interpret skin lesions and apparent lethal episodes
- Manage complex pediatric patients
- Address pediatric intensive care, palliative care, maltreatment and sexual abuse
- Master standard procedures and new technologies
- Delve into the mental health and safety of pediatric patients in a hospital setting

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Course Management

The professors on this Postgraduate Diploma have been carefully selected by TECH for their professional and academic merits. Consequently, all the new knowledge incorporated into the syllabus benefits from being contrasted and supported by specialists with extensive practical and theoretical knowledge in the area of pediatrics. Thanks to this, students will have access to the best educational material in the academic world.

You will have the confidence of updating your knowledge with the support and guidance of the best professionals in your area of expertise"

Management

Dr. García Cuartero, Beatriz

- Chief of the Pediatrics Service and coordinator of the Pediatric Endocrinology and Diabetes Unit Ramón y Cajal University Hospital, Madrid, Spain
- Specialist Physician in Pediatrics at Severo Ochoa, Leganés University Hospital, Madrid
- Primary Care Pediatrician, Area 4, Madrid
- Degree in Medicine and Surgery from the Complutense University of Madrid
- Specialist Degree in Pediatrics, MIR accreditation at the Infantil Niño Jesús University Hospital, Madrid Specific Training Area: Pediatric Endocrinology
- PhD from the Autonomous University of Madrid (UAM) Expression of manganese superoxide dismutase, heme oxygenase and nitric oxide synthase enzymes in cultured pancreatic islets with interleukin 1 by in situ hybridization Unanimous Cum Laude Award
- Associate Professor of Pediatrics, Faculty of Medicine Alcalá de Henares University
- Social Security Research Fund (FISS) Grant, Steno Diabetes Center, Copenhagen/Hagedorn Research Laboratory Project: Pancreatic beta cell destruction mechanism and free radicals in type 1 diabetes mellitus

Professors

Dr. Buenache Espartosa, Raquel

- Specialist Physician in Pediatrics and Specialized Areas with a focus on Neuropediatrics Ramón y Cajal University Hospital, Neuropediatrics Profile
- Specialist Physician in Pediatrics and Specialized Areas Alcorcón Foundation University Hospital
- Resident Doctor in Pediatrics and Specialized Areas Ramón y Cajal University Hospital
- Associate Specialist Physician in Pediatrics and Specialized Areas Henares University Hospital, Neuropediatrics Profile
- Specialist Physician in Neuropediatrics, La Zarzuela Hospital
- Degree in Medicine and Surgery Autonomous University of Madrid
- Specialist in Pediatrics and Specialized Areas MIR training at Ramón y Cajal University Hospital, Subspecialization in Neuropediatrics
- Doctorate Studies Diploma in Advanced Doctoral Studies, which accredits research proficiency, with a qualification of outstanding in the area of Pediatrics in the doctoral program Medical Specialties at the University of Alcalá

Dr. Morales Tirado, Ana

- Specialist in Pediatrics at Ramón y Cajal University Hospital
- Specialist in Pediatrics at 12 de Octubre University Hospital, Móstoles Hospital and San Rafael Hospital
- Degree in Medicine from the Complutense University of Madrid

Dr. Blitz Castro, Enrique

- Specialist Physician in Pediatrics and Specialized Areas in the Pediatrics Service and Cystic Fibrosis Unit, providing the main care as a Pediatric Pneumologist at the Ramón y Cajal University Hospital
- Supervisor in charge of the Cystic Fibrosis Neonatal Screening Program at Ramón y Cajal University Hospital
- Resident Intern in Pediatrics and Specialized Areas at Ramón y Cajal University Hospital (Madrid, Spain) and in the Neonatology Department at La Paz University Hospital (Madrid, Spain), devoting the last year of residency completely to the subspecialty of Pediatric Pneumology
- Degree in Medicine from the Complutense University of Madrid. Clinical training at Gregorio Marañón University Hospital in Madrid
- PhD student on the Doctoral Program in Health Sciences at the University of Alcalá de Henares and Doctoral Thesis Results on the Neonatal Screening Program for Cystic Fibrosis in the Community of Madrid since its implementation in 2009 to 2022
- Researcher at the Biomedical Research Foundation, Ramón y Cajal University Hospital, contributing to ongoing research projects in the Cystic Fibrosis Unit at Ramón y Cajal University Hospital

Dr. Vázquez Ordóñez, Carmen

- Faculty Specialist in Pediatric Nephrology and Pediatric Emergencies Ramón y Cajal University Hospital
- Rotation in the Pediatric Nephrology Service 12 de Octubre University Hospital
- Pediatric Resident Ramón y Cajal University Hospital
- Degree in Medicine and Surgery Navarra University
- Teaching Collaborator for 4th and 6th year in Medicine at the University of Alcalá de Henares
- Seminars in Medicine at the University of Alcalá de Henares

Dr. Stanescu, Sinziana

- Ramón y Cajal Hospital Area Specialist, Pediatrics Department, Metabolic Diseases Unit
- Ramón y Cajal Hospital Medical on-call duty in the Pediatric Intensive Care Unit
- Ramón y Cajal Hospital Area Specialist in Pediatrics
- Henares University Hospital Medical on-call duty
- Degree in Medicine, Carol Davila University of Medicine and Pharmacy, Bucharest Degree approved by the Ministry of Education and Science (Government of Spain)
- Specialized training in Pediatrics via MIR Specialist in Pediatrics and Specialized Areas at Ramón y Cajal University Hospital, Madrid Subspecialty: Pediatric Intensive Care, Metabolic Diseases

Dr. Toledano Navarro, María

- Assistant Specialist in Pediatric Cardiology in charge of the Family Cardiopathies consultation and Hemodynamics for diagnostic and interventional procedures for pediatric and adult congenital heart disease as first and second operator Ramón y Cajal University Hospital
- Degree in Medicine and Surgery from the Complutense University of Madrid
- EPALS accreditation at Great Ormond Street NHS Trust European Resuscitation Council
- ESC Certification in Congenital Heart Disease Echocardiography European Society of Cardiology
- Specialized training in Pediatrics at Ramón y Cajal Hospital (HRYC), Madrid Subspecialty in Pediatric Cardiology with training in Pediatric Cardiology and Adult Congenital Heart Disease

Dr. Vázquez Martínez, José Luís

- Head of the Pediatric ICU Ramón y Cajal Hospital
- Postgraduate Diploma in Pediatrics and Specialized Areas, La Paz Children's Hospital
- Degree in Medicine and Surgery from the University of Oviedo
- PhD in Medicine and Surgery from the Autonomous University of Madrid
- Associate Professor, University of Alcalá

Dr. De Tejada Barásoain, Enrique Otheo

- Area Specialist, Ramón y Cajal University Hospital, Pediatrics Service
- Internal Hospital Pediatrics and Pediatric Infectious Diseases General Pediatrics and Pediatric Infectious Diseases Consultation
- Member of the HURyC Antimicrobial Policy Committee
- Degree in Medicine and Surgery from the Autonomous University of Madrid
- PhD in Medicine, Doctoral Thesis: Etiology of Community Acquired Pneumonia in children, University of Alcalá, outstanding cum laude honors
- Associate Professor of Pediatrics at the University of Alcalá
- Member of the Spanish Society of Internal Hospital Pediatrics
- Member of the Spanish Society of Pediatric Infectology

Dr. Armero Pedreira, Paula

- Pediatrician at Puerta de Hierro Hospital in pediatric emergencies
- Pediatrician at Casa de los Niños Children's Residence, a center for the protection of minors belonging to the General Directorate of Childhood and Family in the Community of Madrid
- Pediatrician at San Rafael Hospital .Work experience in Social Pediatrics consultation
- Pediatrician in the Pediatric Palliative Care Unit, Vianorte-Laguna Foundation
- Resident Physician in Pediatrics, La Paz Children's Hospital. Sub-specialization in the Complex Pathology Unit at La Paz Children's Hospital and in the Palliative Care Unit in the Community of Madrid
- Master's Degree in Pediatric Palliative Care, La Rioja International University
- Postgraduate Studies in Social Pediatrics, University of Barcelona
- Professor for the Master's Degree in Pediatric Palliative Care at La Rioja International University

Ms. Clemente Linares, Raquel

- Nurse in Pediatric Hospitalization, Ramón y Cajal University Hospital
- Nurse in Adult Hospitalization in different services, Ramón y Cajal University Hospital
- University Diploma in Nursing, European University of Madrid
- Nurse in the Meliá Hotels International medical service
- Medical examinations: ECG, vision control, audiometry and other nursing tests, Quiron Prevention Superior Sports Council
- Nursing Consultation and Health Promotion, Quiron Prevention Superior Sports Council

Ms. Yelmo Valverde, Rosa

- Nurse Educator in Pediatric Diabetes at Ramón y Cajal University Hospital (Madrid)
- Diabetes Nurse Educator for the Diabetes and Telemedicine Unit at San Rafael Hospital
- Department of Extractions and Prevention and Occupational Risks Service at La Paz Hospital
- Internal Medicine Department and Palliative Care Unit at Hospital San Rafael (Madrid)
- Diploma in Nursing from Pontificia de Comillas University
- Diploma in Company Nurse, Carlos III Institute and Ciudad Real Nursing University
- Master's Degree in Obesity and Its Comorbidities: Prevention, Diagnosis, and Integral Treatment.,Alcalá de Henares University
- Master's Degree in Foundations for the Care and Education of People with Diabetes, University of Barcelona

04

Structure and Content

The structure and contents of this Postgraduate Diploma follow TECH's most innovative teaching methodology. Based on relearning, all the contents are arranged in such a way so that specialists can update their knowledge gradually and progressively, greatly reducing the course load. Furthermore, the professors have elaborated a large amount of audiovisual support with specific clinical videos from which specialists can better understand the information being presented.

You won't find an academic opportunity as complete as this one, with a multitude of activities, interactive guides, complementary readings and more educational support material"

Module 1. Treating Critically Ill Children Not in the Pediatric Intensive Care Unit

1.1. Warning Signs and Symptoms
- 1.1.1. Hemodynamic
- 1.1.2. Respiratory
- 1.1.3. Metabolic
- 1.1.4. Neurologic
- 1.1.5. Hematologic
- 1.1.6. Decompensation in Critically Ill Children
- 1.1.7. Monitoring: Instrumental Monitoring Clinic. Clinical Ultrasound
- 1.1.8. Cardiocirculatory Arrest
  - 1.1.8.1. Prevention
  - 1.1.8.2. Caring for Children in Arrest
  - 1.1.8.3. Stabilization
  - 1.1.8.4. Transport: Intrahospital and Interhospital
- 1.1.9. Humanized Care for Critically Ill Children
  - 1.1.9.1. The Family
  - 1.1.9.2. Music Therapy
  - 1.1.9.3. Others
- 1.1.10. Difficult Decisions
  - 1.1.10.1. Therapeutic Effort Limitation
  - 1.1.10.2. Critically Ill Children
  - 1.1.10.3. Asystole Donation

1.2. Cerebral Crisis
- 1.2.1. Initial Assessment
- 1.2.2. Differential Diagnosis
- 1.2.3. Acute Treatment

1.3. Acute Respiratory Failure: Oxygen Therapy
- 1.3.1. Acute Respiratory Failure
- 1.3.2. Pathophysiology
- 1.3.3. Classification
- 1.3.4. Diagnosis
- 1.3.5. Treatment

1.4. Allergic Reactions: Anaphylaxis
- 1.4.1. Allergic and Clinical Reaction
- 1.4.2. Etiology
- 1.4.3. Diagnosis
- 1.4.4. Treatment
- 1.4.5. Prevention

1.5. Blood Gas Interpretation
- 1.5.1. Blood Gas Interpretation
- 1.5.2. Pathophysiology
- 1.5.3. Basic Elements to Interpret Acid-Base Balance
- 1.5.4. General Diagnosis
- 1.5.5. Approach to Acid-Base Balance Disturbances

1.6. Analgesia and Sedation
- 1.6.1. Analgesia and Sedation
- 1.6.2. Pain Assessment and Management
- 1.6.3. Sedo Analgesia
  - 1.6.3.1. Adverse Effects
  - 1.6.3.2. Candidate Patients
  - 1.6.3.3. Necessary Personnel and Supplies
  - 1.6.3.4. Non-Pharmacological Measures in Pain Control and Anxiety
  - 1.6.3.5. Drugs and Antidotes
  - 1.6.3.6. Sedoanalgesia Procedures and Strategies
  - 1.6.3.7. Necessary Documentation
  - 1.6.3.8. Monitoring

1.7. Fluid Therapy
- 1.7.1. Body Fluid Composition
- 1.7.2. Main Mechanisms for Volume Regulation, Osmolarity and Acid-Base Balance
- 1.7.3. Calculating Basal Needs
- 1.7.4. Treating Dehydration: Rehydration Routes (Indications, Serums Used)
- 1.7.5. Treating the Main Hydroelectrolyte and Acid-Base Balance Disorders

1.8. Electrocardiogram
- 1.8.1. General Aspects
- 1.8.2. Electrical Changes during Childhood Development
- 1.8.3. Sequential ECG Analysis: P Wave, PR Interval, QRS Complex, Q Wave, ST Segment, T Wave
- 1.8.4. Characteristics of Atypical ECGs with No Pathological Findings

1.9. Thoracic Ultrasound Scan
- 1.9.1. Clinical Ultrasound (POCUS)
- 1.9.2. Artifacts and Botonology
- 1.9.3. Pulmonary Ultrasound Semiology
- 1.9.4. POCUS Diagnosis
  - 1.9.4.1. Consolidated Pneumonia
  - 1.9.4.2. Alveolo-Interstitial Pneumonia
  - 1.9.4.3. Entrapment
  - 1.9.4.4. Heart Failure
  - 1.9.4.5. Pleural Effusion
  - 1.9.4.6. Pneumothorax

Module 2. Infectious Diseases in Pediatrics

2.1. Healthcare-Associated Infections (HAIs) Measures to Prevent the Transmission of Infections
- 2.1.1. Repercussions in a Pediatric Inpatient Ward
- 2.1.2. Epidemiology and Incidence
- 2.1.3. Types of HAIs
- 2.1.4. Preventing the Transmission of Infections
  - 2.1.4.1. Types of Isolation and Indications for Specific Microorganisms
  - 2.1.4.2. Hand Hygiene
  - 2.1.4.3. Other Measures

2.2. The Laboratory in the Diagnosis of Infectious Diseases: Taking Microbiological Samples
- 2.2.1. Biochemical and Hematologic Findings in Infectious Diseases
- 2.2.2. Clinical Considerations Prior to Microbiological Sampling
- 2.2.3. Recommended Biological Samples for the Diagnosis of the Most Frequent Infections: Conventional Microbiology, Rapid and Molecular Techniques
- 2.2.4. Available Microbiological Techniques and their Indications
- 2.2.5. Sample Transport and Storage

2.3. Empirical Antibiotic Therapy: Appropriate Use of Antibiotics
- 2.3.1. General Principles in Antibiotic Treatment: Structured Clinical Rationale
- 2.3.2. How to Adequately Select Antibiotics
- 2.3.3. When Is an Antibiotic Changed? Targeted Antibiotic Therapy
- 2.3.4. What Is an Adequate Use of Antibiotics? Importance and Repercussions
- 2.3.5. The Role of New Antibiotics in Hospital Pediatrics

2.4. Special Fever Situations: Recurrent Fever, Prolonged Fever, Fever in Patients Returning from the Tropics
- 2.4.1. Recurrent and Periodic Fevers
  - 2.4.1.1. Causes
  - 2.4.1.2. Diagnostic Attitude
- 2.4.2. Prolonged Fever
  - 2.4.2.1. Causes
  - 2.4.2.2. Assessment
- 2.4.3. Fever in Patients Returning from the Tropics
  - 2.4.3.1. General Considerations (Traveler, Immigrant and Adopted Children)
  - 2.4.3.2. Most Common Causes
  - 2.4.3.3. Assessment

2.5. Community-Acquired Pneumonia (CAP): Etiological Diagnosis and Antibiotic Therapy Complicated Pneumonia Therapy
- 2.5.1. Etiology According to Age Group
- 2.5.2. Diagnostic Attitude
- 2.5.3. CAP Therapy in Home Patients
- 2.5.4. Diagnostic Attitude to "Pneumonia that Does Not Look Good"
- 2.5.5. Complicated Pneumonia
  - 2.5.5.1. Types: Parapneumonic Pleural Effusion, Necrotizing Pneumonia, Lung Abscess
  - 2.5.5.2. Diagnostic and Therapeutic Attitude

2.6. Skin and Soft Tissue Infections (SSTIs): Osteoarticular Infection (OAI)
- 2.6.1. SSTI: Diagnostic and Therapeutic Attitude
  - 2.6.1.1. Impetigo
  - 2.6.1.2. Cellulitis and Erysipelas
  - 2.6.1.3. Folliculitis and Boils
  - 2.6.1.4. Omphalitis
  - 2.6.1.5. Staphylococcal Scalded Skin Syndrome
  - 2.6.1.6. Ectima
  - 2.6.1.7. Necrotizing Fasciitis
  - 2.6.1.8. Bites
- 2.6.2. OAI: Diagnostic and Therapeutic Attitude
  - 2.6.2.1. Incidence, Pathophysiology in Different Locations and Etiology According to Age Group
  - 2.6.2.2. Septic Arthritis
  - 2.6.2.3. Osteomyelitis

2.7. Genital Infection in Children and Adolescents
- 2.7.1. Implications and Frequency of Sexually Transmitted Infections (STIs) in Adolescence
- 2.7.2. STI Syndromes
  - 2.7.2.1. Genital Ulcers
  - 2.7.2.2. Inguinal Lymphadenopathy
  - 2.7.2.3. Condylomas
  - 2.7.2.4. Urethritis
- 2.7.3. Microbiological Diagnosis and Treatment for STIs
- 2.7.4. Vulvovaginitis in Girls and Adolescents: Bacterial Vaginosis
- 2.7.5. Pelvic Inflammatory Disease
- 2.7.6. Orchitis and Epididymitis

2.8. Central Venous Catheter (CVC) Related Infections
- 2.8.1. Types of CVC
- 2.8.2. Common Etiological Agents
- 2.8.3. Clinical, Research and Diagnostic Criteria
- 2.8.4. Treating CVC Related Infections

2.9. Infections in Immunocompromised Patients
- 2.9.1. Most Frequent Etiologic Agents According to the Type of Immune System Involvement
- 2.9.2. General Diagnostic Approach to Suspected Infection in Immunocompromised Children
- 2.9.3. Antibiotic Prophylaxis in Children with Primary or Secondary Immunodeficiencies
- 2.9.4. Patients Presenting Febrile Neutropenia

2.10. Emerging Virus Infections: SARS-CoV-2
- 2.10.1. Changes to Hospital Pediatrics Organization in the Context of the COVID-19 Pandemic
- 2.10.2. Diagnosis and Treatment of Acute SARS-CoV-2 Infection
- 2.10.3. Multisystem Inflammatory Syndrome Temporally Related to COVID-19 (MIS-C or PMIS)
- 2.10.4. Considerations Regarding Future Epidemic Outbreaks

2.11. Systemic Inflammatory Response Syndrome (SIRS): Sepsis, Severe Sepsis and Septic Shock
- 2.11.1. Clinical Examination
- 2.11.2. Microorganisms Causing Sepsis: Diagnostic Attitude
- 2.11.3. Initial Therapy for SIRS, Sepsis, Severe Sepsis and Septic Shock
- 2.11.4. Toxic Shock Syndrome

Module 3. Other Pediatric Processes

3.1. Most Common Injuries
- 3.1.1. Etiology
- 3.1.2. Diagnostic Approach
- 3.1.3. Febrile and Afebrile Exanthema
- 3.1.4. Vesicular Exanthem
- 3.1.5. Purpuric Exanthem
- 3.1.6. Morbilliform Exanthem
- 3.1.7. Kawasaki Disease
- 3.1.8. Scarlet Fever
- 3.1.9. Steven Johnson Syndrome

3.2. Lactating Infant Presenting Apparent Life-Threatening Event (ALTE) or BRUE (*Brief Reported Unexplained Event*)
- 3.2.1. Lactating Infant Presenting ALTE
- 3.2.2. Epidemiology
- 3.2.3. Risk Factors
- 3.2.4. Hospital Diagnosis and Management
- 3.2.5. Hospital Discharge Criteria

3.3. The Role of Nursing during Pediatric Hospitalization
- 3.3.1. Illness in Childhood: Psychological Reactions and Attitude toward Hospital Admission
- 3.3.2. Nursing Care during Hospitalization
  - 3.3.2.1. Objectives According to Age
  - 3.3.2.2. Parental Care / Interventions
  - 3.3.2.3. Environment Care / Interventions
- 3.3.3. Hospitalization Procedures
  - 3.3.3.1. Measuring Vital Signs according to Age, Anthropometric Parameters and Capillary Measurements
  - 3.3.3.2. Secretion and Foreign Body Aspiration
  - 3.3.3.3. Clamping Techniques
  - 3.3.3.4. Probes
  - 3.3.3.5. Sample Collection
  - 3.3.3.6. Medication Administration, Reconstitution and Dosage Calculation
  - 3.3.3.7. Vesiculo-Vacuolar Organelle (VVO) Channeling
  - 3.3.3.8. Bandages
  - 3.3.3.9. Cardiopulmonary Resuscitation in Pediatrics

3.4. Nursing Care in Managing Children Recently Diagnosed with Diabetes: Diabetes Education
- 3.4.1. Patient and Family Needs upon Onset: Empowerment
- 3.4.2. Capillary Ganglion Cell Layer (GCL) and Continuous Glucose Monitoring (CGM)
- 3.4.3. Injection Technique, Rotational Zones
- 3.4.4. Insulin: Storage and Maintenance
- 3.4.5. Day-to-Day Diabetes Management
  - 3.4.5.1. Acute Complications, Hypoglycemia and Hyperglycemia Management (Symptoms, Prevention and Correction)
  - 3.4.5.2. Diabetes during Illness: Diabetic Ketoacidosis (DKA) Prevention. Prevention of CAD
  - 3.4.5.3. Blood Glucose and Diet: Carbohydrate (CH) Quantification Glycemic Index Label Reading
  - 3.4.5.4. Attitude toward Exercise
  - 3.4.5.5. Children at School: Necessary Supplies

3.5. General Postoperative Patient Care
- 3.5.1. Hospital Pediatrician Role in Cases of Children and Adolescents Undergoing Surgery
- 3.5.2. General Postoperative Care
  - 3.5.2.1. Controlling Temperature
  - 3.5.2.2. Liquids and Electrolytes
  - 3.5.2.3. Nausea and Vomiting
  - 3.5.2.4. Postoperative Nutrition
  - 3.5.2.5. Respiratory Function Recovery
  - 3.5.2.6. Early Rest and Mobilization
  - 3.5.2.7. Surgical Antibiotic Prophylaxis
  - 3.5.2.8. Controlling Postoperative Pain

3.6. Complex Pediatric Patients
- 3.6.1. Chronicity and Complexity: Defining Populations
- 3.6.2. Special Health Needs
- 3.6.3. Technology Dependency: Nutritional, Respiratory and Cardiac Support

3.7. Home Hospitalization
- 3.7.1. Home Hospitalization
- 3.7.2. Historical Journey
- 3.7.3. Subsidiary Patients and Families
  - 3.7.3.1. Benefits for Patients and Family
  - 3.7.3.2. Benefits for the National Health System
- 3.7.4. Organization: Resources and Coordination

3.8. Pediatric Palliative Care
- 3.8.1. Palliative Care and Patient Classification
- 3.8.2. End-of-Life Patient and Family Care
  - 3.8.2.1. Decision Making
  - 3.8.2.2. Communication with Patients and Families
- 3.8.3. Palliative Medicine: Treatment and Support
  - 3.8.3.1. Pain Treatment
  - 3.8.3.2. Palliative Sedation
  - 3.8.3.3. Care during and after Death

3.9. Child Abuse
- 3.9.1. Types of Child Maltreatment
- 3.9.2. Epidemiology
- 3.9.3. Clinical manifestations
- 3.9.4. Approach to Suspected Child Abuse in Pediatrics

3.10. Liaison and Interconsultation Psychiatry
- 3.10.1. The Child and the Family in the Face of Illness and Hospitalization
- 3.10.2. Chronic Diseases
- 3.10.3. Psychopathology associated with Physical Pathologies
- 3.10.4. Delirium
- 3.10.5. Pain
- 3.10.6. Psychosomatics
- 3.10.7. Suicidal Behavior
- 3.10.8. Psychopharmacology

3.11. Pediatric Patient Safety in a Hospital Setting
- 3.11.1. Safety as a Critical Objective in Quality Care
- 3.11.2. Adverse Events (AEs) in Pediatric Hospitalization
  - 3.11.2.1. Most Frequent Causes
  - 3.11.2.2. Most Frequent AEs in Pediatrics
  - 3.11.2.3. Prevention
- 3.11.3. Patient Safety Culture
- 3.11.4. Information Sources: Notification and Record Systems
- 3.11.5. Analysis Systems
- 3.11.6. Safety Strategies: Safe Practices

A program that will live up to your expectations: Everything you need to keep up to date with the latest scientific evidence"

05

Methodology

This program provides you with 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.

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 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. 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.

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:

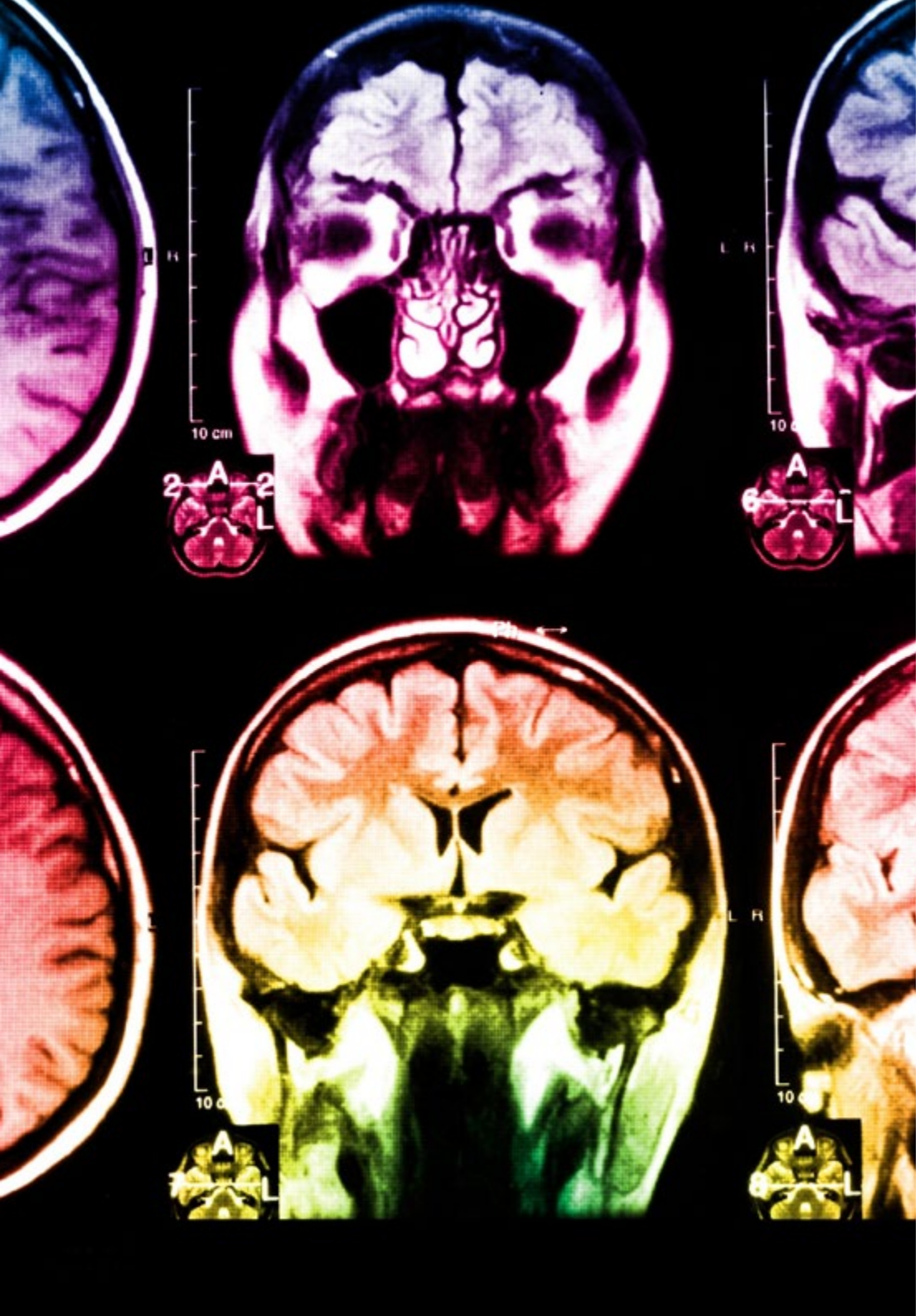
1. Students who follow this method not only achieve the assimilation of concepts, but also a development of their mental capacity, through exercises that evaluate real situations and the application of knowledge.
2. Learning is solidly translated into practical skills that allow the student to better 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 trained with unprecedented success in all clinical specialties regardless of surgical load. Our pedagogical 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 learning, 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 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.

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.

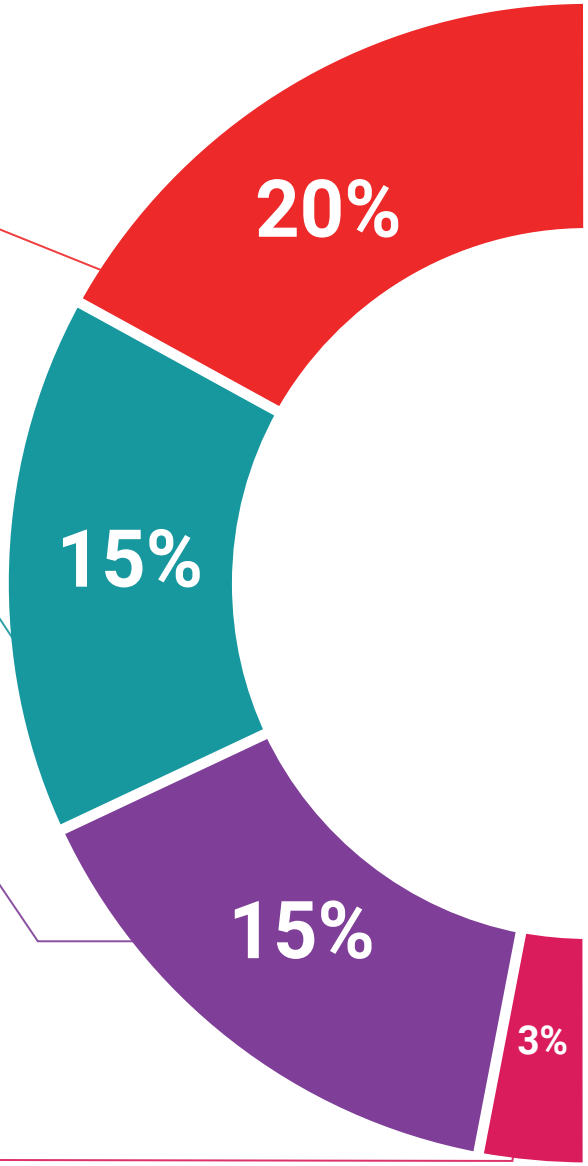
Interactive Summaries

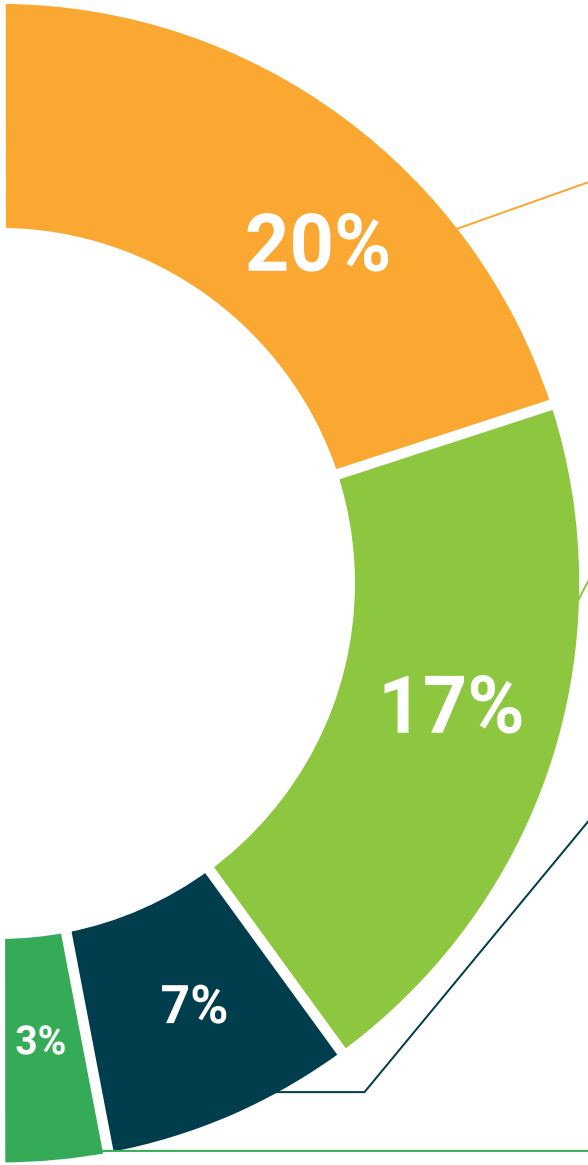
The TECH team presents the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

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 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 termed Learning from an Expert strengthens knowledge and recall capacity, and generates confidence in the face of difficult decisions in the future.

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 Diploma in Update on Hospital Pediatrics guarantees students, in addition to the most rigorous and up-to-date education, access to a Postgraduate Diploma issued by TECH Global University.

Successfully complete this program and receive your diploma without travel or laborious paperwork"

This program will allow you to obtain your **Postgraduate Diploma in Update on Hospital Pediatrics** 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.

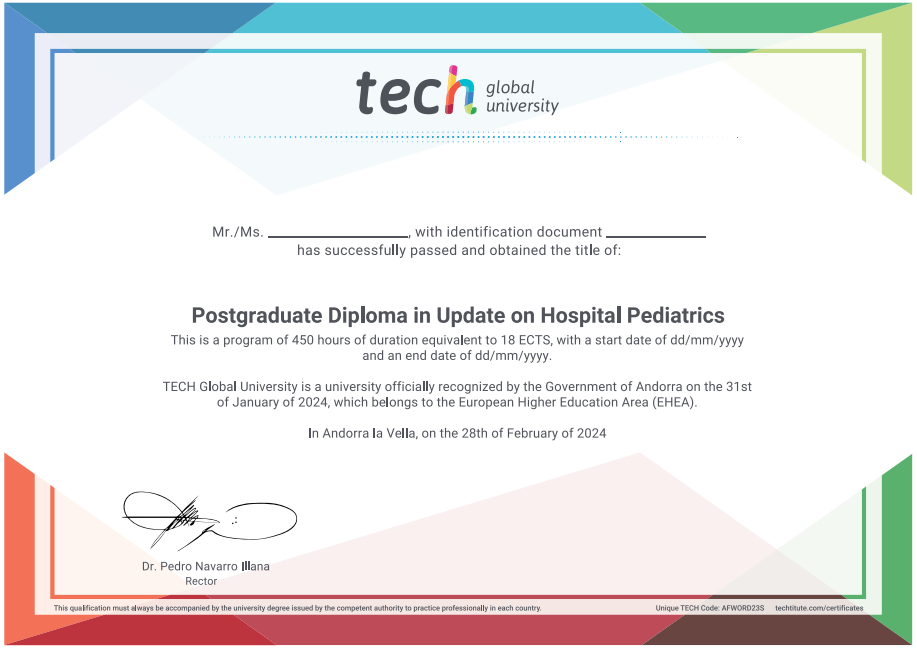
This **TECH Global University** title is a European program of continuing education and professional updating that guarantees the acquisition of competencies in its area of knowledge, providing a high curricular value to the student who completes the program.

Title: **Postgraduate Diploma in Update on Hospital Pediatrics**

Modality: **online**

Duration: **6 months**

Accreditation: **18 ECTS**


tech global university

Mr./Ms. _____, with identification document _____
has successfully passed and obtained the title of:

Postgraduate Diploma in Update on Hospital Pediatrics

This is a program of 450 hours of duration equivalent to 18 ECTS, with a start date of dd/mm/yyyy and an end date of dd/mm/yyyy.

TECH Global University is a university officially recognized by the Government of Andorra on the 31st of January of 2024, which belongs to the European Higher Education Area (EHEA).

In Andorra la Vella, on the 28th of February of 2024

Dr. Pedro Navarro Illana
Rector

This qualification must always be accompanied by the university degree issued by the competent authority to practice professionally in each country. Unique TECH Code: AFWORD23S techtitute.com/certificates

*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.

tech global university

Postgraduate Diploma

Update on Hospital Pediatrics

- Modality: **online**
- Duration: **6 months**
- Certificate: **TECH Global University**
- Credits: **18 ECTS**
- Schedule: **at your own pace**
- Exams: **online**

Postgraduate Diploma

Update on Hospital Pediatrics

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