Postgraduate Diploma
Diagnostic and Therapeutic Techniques in Oncology

tech technological university

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Postgraduate Diploma

Diagnostic and Therapeutic Techniques in Oncology

- Modality: **online**
- Duration: **6 months**
- Certificate: **TECH Technological University**
- Dedication: **16h/week**
- Schedule: **at your own pace**
- Exams: **online**

Website: www.techtitute.com/pk/medicine/postgraduate-diploma/postgraduate-diploma-diagnostic-therapeutic-techniques-oncology

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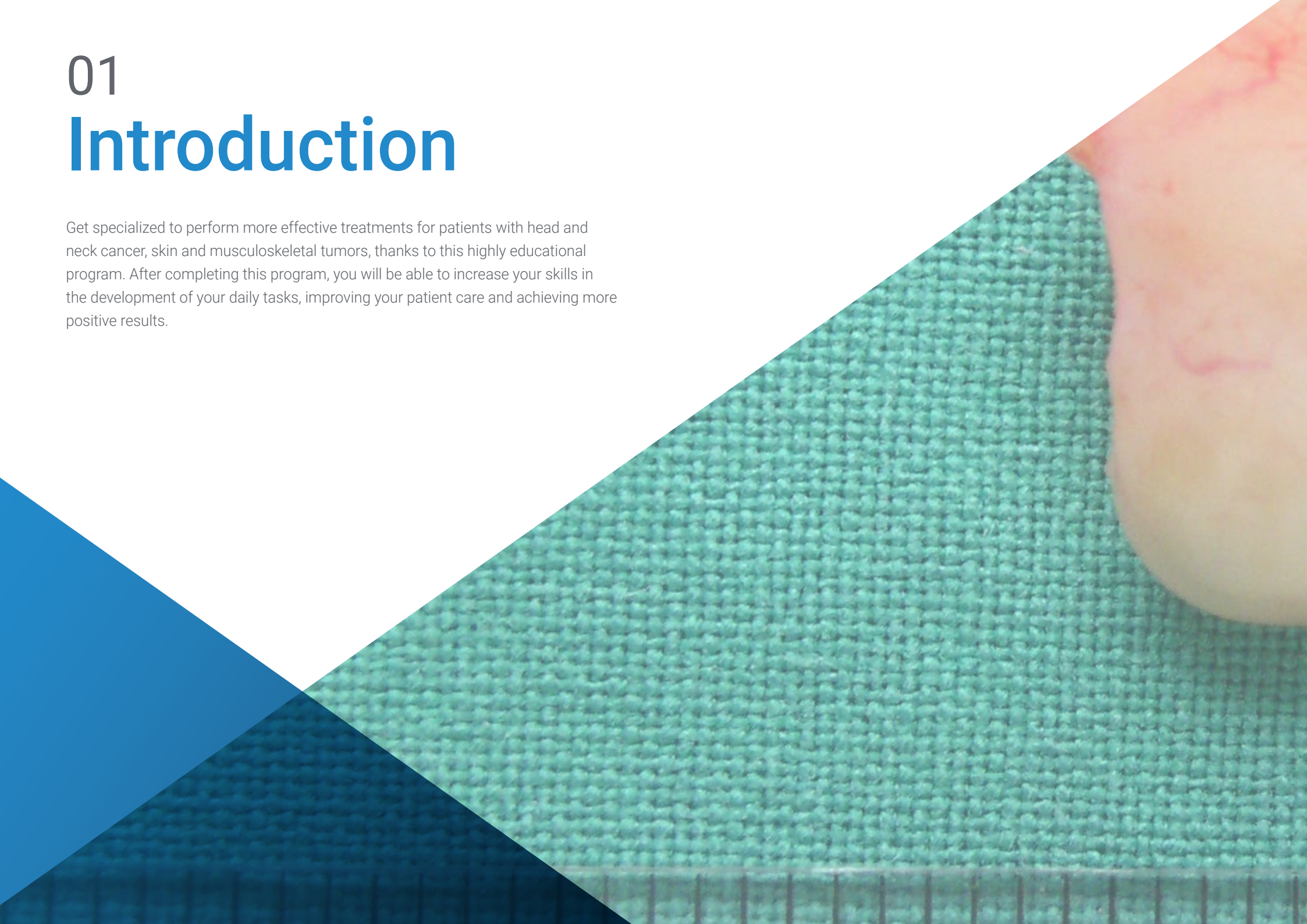
01

Introduction

Get specialized to perform more effective treatments for patients with head and neck cancer, skin and musculoskeletal tumors, thanks to this highly educational program. After completing this program, you will be able to increase your skills in the development of your daily tasks, improving your patient care and achieving more positive results.



Increasing the life expectancy of cancer patients is a fundamental goal of oncologists. Don't hesitate any longer and increase your knowledge in this field"

The Postgraduate Diploma in Diagnostic and Therapeutic Techniques in Oncology is the result of an extensive study of these types of tumors by leading specialists in the field, who have sought to combine in this program the main concepts and advances in this field, in order to have highly specialized professionals to improve the numbers of deaths from these causes, as well as to make earlier diagnoses and more effective treatments.

Therefore, the student will acquire skills to use molecular biology tools for an agnostic approach to rare cancers, having the opportunity to start from scratch, reviewing molecular oncology concepts in relation to genetics, epigenetics, ctDNA and RNA. Once these aspects are known, students will have in-depth knowledge of the study of tumor DNA, both in solid biopsy and liquid biopsy.

This program focuses on the study of different types of cancer, including head and neck, skin and musculoskeletal cancers, in such a way that a complete and quality program is offered to increase the capabilities of the oncology professional.

In this program, the experts, all of them referents in each field of knowledge, will develop aspects related to the context of this spectrum of pathologies, present the clinical and molecular vision, show their diagnostic and therapeutic approaches and explain complementary aspects such as their research and institutional environment or the global reality of the patients who suffer from them.

Students will be able to complete the program at their own pace, without being subject to fixed schedules or the travel involved in classes where physical attendance is required, so they can combine it with the rest of their daily obligations.

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

- Case studies presented by experts in oncology
- The graphic, schematic and eminently practical contents with which they are conceived gather scientific and practical information on those disciplines that are essential for professional practice
- News on tools for head and neck, skin, and musculoskeletal cancers
- Practical exercises where the self-assessment process can be carried out to improve learning
- Its special emphasis on innovative methodologies in the diagnosis and treatment of head and neck, skin and musculoskeletal cancers
- 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

Learn about the latest developments in these types of pathologies and you will notice how you advance in your daily work"

This Postgraduate Diploma is the best investment you can make when selecting an up-to-date program for two reasons: in addition to updating your knowledge in Diagnostic and Therapeutic Techniques in Oncology, you will obtain a qualification from TECH Technological University"

This program comes with the best educational material, providing you with a contextual approach that will facilitate your learning.

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

The teaching staff includes professionals from the Oncology field, who bring their experience to this educational program, as well as renowned specialists from leading societies and prestigious universities.

Its multimedia content, developed with the latest educational technology, will allow the professional a situated and contextual learning, that is, a simulated environment that will provide an immersive training programmed to train in real situations.

This program is designed around Problem-Based Learning, whereby the specialist 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 in Diagnostic and Therapeutic Techniques in Oncology with extensive experience.

02

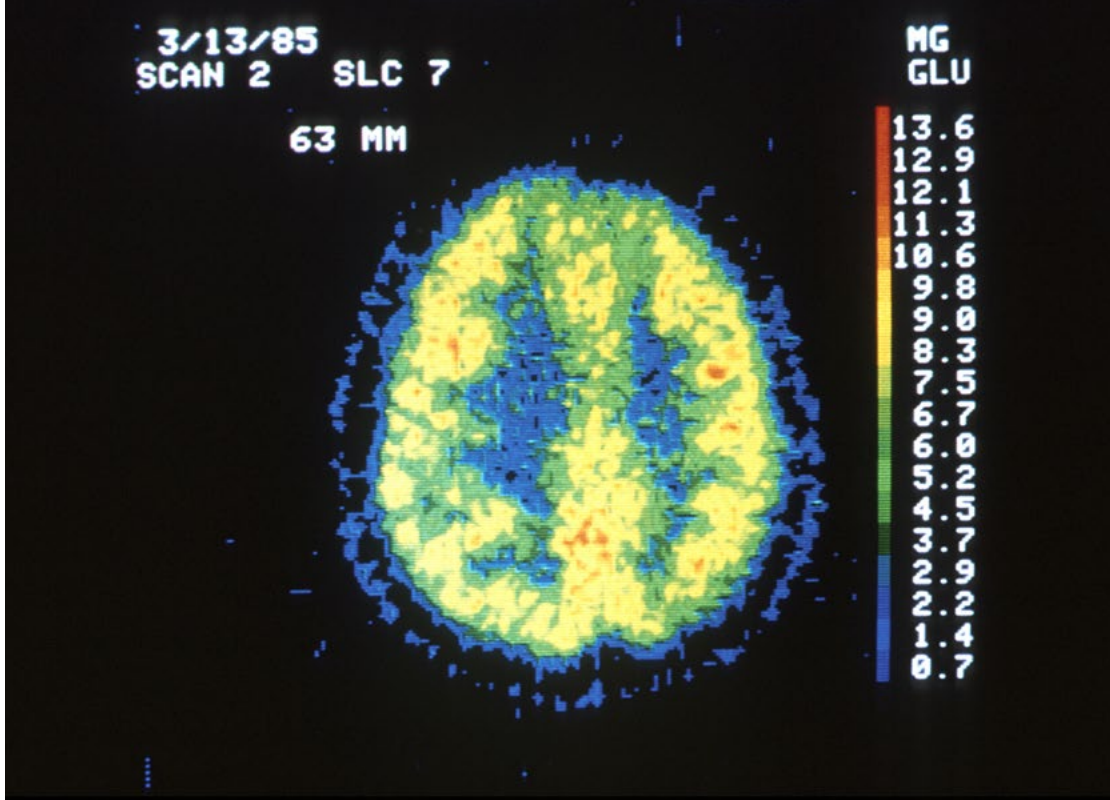
Objectives

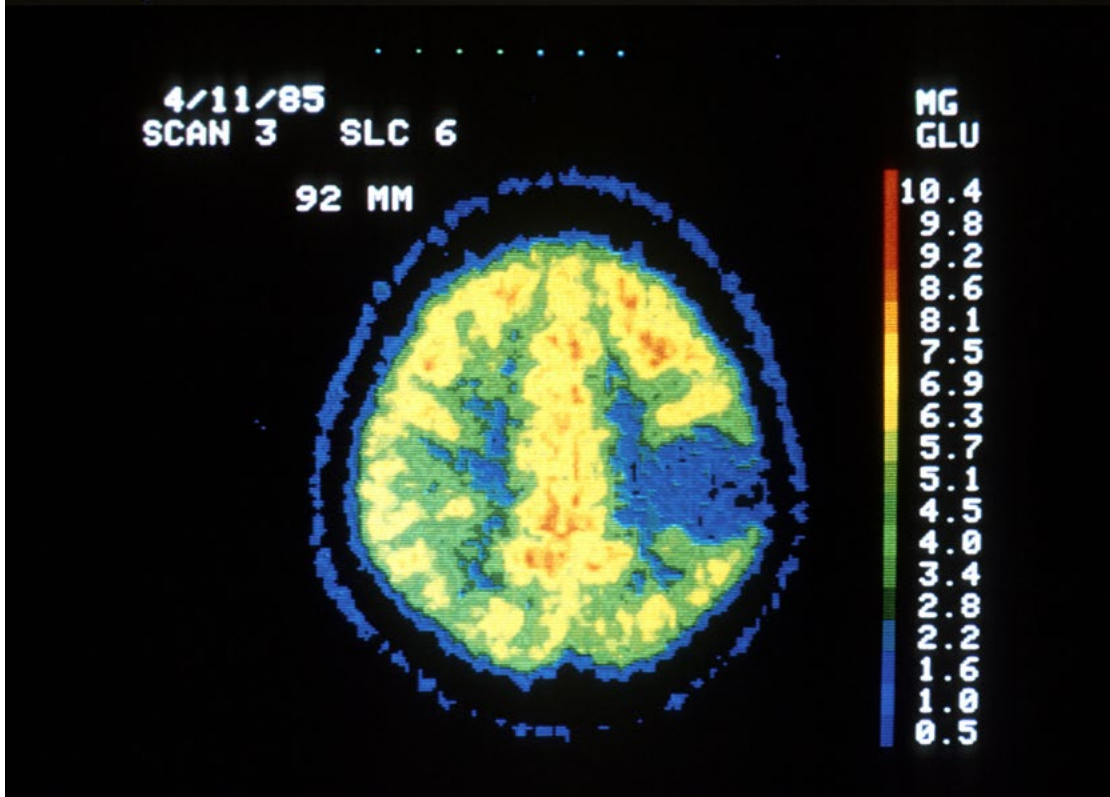
The program in Diagnostic and Therapeutic Techniques in Oncology is oriented to facilitate the performance of the professional dedicated to health with the latest advances and newest treatments in the sector.

Our goal is to achieve academic excellence and help you achieve professional success"

General Objectives

- Acquire concepts and knowledge regarding the epidemiology, clinical, diagnosis and treatment of infrequent tumors, agnostic diagnoses and cancers of unknown origin
- Know how to apply the diagnostic algorithms and evaluate the prognosis of this pathology
- Be able to integrate knowledge and face the complexity of formulating clinical and diagnostic judgments based on the available clinical information
- Apply acquired knowledge and problem-solving skills in new or unfamiliar environments within broader (or multidisciplinary) contexts related to the area of study
- Know how to establish complex therapeutic plans in the context of the pathology in question Have a deeper knowledge of specific treatment networks, reference centers, clinical trials
- Acquire knowledge about molecular biology tools for the study of these tumors
- Have thorough knowledge of and use Tumor Registries
- Know and use the face-to-face or virtual Molecular Committees
- Understand fundamental aspects of biobank operation
- Specialize in interprofessional relationship tools for the treatment of orphan, agnostic and cancer of unknown origin and to access expert networks in the different pathology groups
- Gain knowledge about how to communicate conclusions, and the ultimate knowledge and rationale behind them- to specialized and non-specialized audiences in a clear and unambiguous manner
- Understand the social responsibility due to rare diseases





Specific Objectives

Module 1. Molecular Biology Tools for the Agnostic Approach to Rare Cancer

- Acquire the ability to use molecular biology tools for an agnostic approach to rare cancers
- Deepen the knowledge of the study of tumor DNA, both in solid biopsy and liquid biopsy
- Study aspects of the genome, the exome and sequencing panels; and to learn about the available platforms and current applications
- Develop skills in germline DNA, becoming familiar with the concepts of variants and polymorphisms and being able to study germline alterations in depth
- Provide the necessary knowledge in the study of messenger RNA, developing content about the transcriptome, RNA sequencing panels (Nanostring) and Single Cell RNA
- Know in depth the development, present and future of drug sensing in primary cell culture and organoids
- Complete the training in immunotherapy with its aspects related to molecular biology, knowing concepts such as mutational load, neoantigens, microbiota or adoptive cell therapy

Module 2. Pleural, Mediastinal and Chest Wall Tumors: Lung Cancer As a Paradigm of New Rare Tumors. Head and Neck Cancer

- Teach students how to manage four groups of pathologies in this area: pleural tumors, mediastinal tumors (thymoma and thymic carcinoma), chest wall tumors and neuroendocrine lung tumors (typical carcinoid, atypical carcinoid and large cell carcinoma)
- Acquire skills in aspects of epidemiology, etiology and pathogenesis, clinical presentation, diagnosis and classification, prognostic factors, treatment and clinical guideline recommendations
- Explore the prospects for each of these areas of pathology
- Acquire competencies on the role of lung cancer as a paradigm of personalized medicine
- Be able to use diagnostic techniques and new treatment options The skills to be acquired in this block refer to the types of samples according to the diagnostic approach; optimization in sample management, response time and characteristics of the report; tumor heterogeneity; role of liquid biopsy; molecular diagnostic techniques: IHC, FISH, RT-PCR, NGS and guideline recommendations in this context
- Specialize in driver mutations in the lung cancer context: EGFR, BRAF, MET, KRAS, ALK, ROS-1
- Know in depth the role of translocations and rearrangements/amplifications: NTRK, RET, MET, HER-2
- Recognize the most uncommon tumors of the otorhinolaryngological and head and neck area, acquiring skills for their diagnosis and treatment

Module 3. Musculoskeletal Tumors: Epithelial Cancer. Central Nervous System Tumors: Ocular Tumors

- Specialize in sarcomas as a paradigm of rare cancers: their diversity, classification, characteristics and therapeutic diagnostic approach
- Prepare students for the initial approach and management of skeletal and soft tissue tumors and visceral sarcomas
- Gain in-depth knowledge of rare and ultra-rare tumors of the central nervous system
- Expand knowledge of next generation sequencing (NGS) as an emerging technology that can detect a wide variety of molecular disorders in brain tumors
- Learn about the development of technology in new equipment for neuro-oncological care, allowing stereotactic surgery, the evolution of neuroimaging techniques, neuronavigation, neuroendoscopy, as well as the emergence of specialized surgery instruments
- Acquire knowledge about rare epithelial neoplasms, Merckel cell carcinoma and ocular melanoma

Module 4. Uncommon Digestive Tumors Digestive Neuroendocrine Tumors. Thyroid Cancer

- Have an in-depth knowledge of a heterogeneous group of pathologies with very different diagnostic, therapeutic and prognostic approaches, including: small bowel tumors, appendicular tumors, anal canal carcinoma, liver and intrahepatic bile duct tumors, gallbladder and extrahepatic bile duct neoplasms, and gastrointestinal stromal tumors
- Acquire skills in the molecular approach to enable effective treatment with targeted therapies, as in the case of GIST (gastrointestinal stromal tumors) or more recently carcinomas of the biliary tract
- Study thyroid cancer and neuroendocrine tumors Acquire the ability to diagnose and treat this group of neoplasms
- Specialize in neuroendocrine tumors and to acquire the competence to approach them in the context of the multidisciplinary team

Enter one of the most creative and exciting fields in the world of oncology with the background of a complete professional, qualified to successfully lead any project"

03

Course Management

In its academic commitment, TECH has selected the most qualified faculty in the industry. They are practicing specialists with many years of experience in the field of head and neck, skin and musculoskeletal cancers. The program is made up of leading experts in oncology, who bring the experience of their work to this program. Additionally, other recognized experts participate in its design and preparation, completing the program in an interdisciplinary manner.

Get specialized with the best professionals in the sector. It is the best way to achieve excellence"

Management

Dr. Beato, Carmen

- Medical Oncologist University Hospital Virgen Macarena, Unit of Urological Tumors, Infrequent and of Unknown Primary
- Expert in Immuno-Oncology
- Master's Degree in Palliative Care
- Expert in Clinical Trials
- Member of the Spanish Group on Orphan and Infrequent Tumors (GETHI)
- Secretary Spanish Group for Cancer of Unknown Origin (GECOD)

Professors

Dr. García-Donas Jiménez, Jesús

- Medical Oncologist, Urologic, Gynecologic and Dermatologic Tumor Unit
- Director of the Translational Oncology Laboratory
- Expert in Immuno-Oncology
- Clara Campal Comprehensive Oncology Center
- Treasurer of the Spanish Group of Orphan and Infrequent Tumors (GETHI)

Dr. Fernández Pérez, Isaura

- Medical Oncologist, Breast, Gynecological, Unknown Primary and Central Nervous System Cancer Unit, Vigo University Hospital Complex-Hospital Álvaro Cunqueiro
- Member of the Spanish Group for Cancer of Unknown Origin (GECOD)

Dr. Barquín, Aránzazu
- Medical Oncologist, Urological, Gynecological and Dermatological Tumors Unit, Clara Campal Comprehensive Oncology Center
- Treasurer of the Spanish Group of Orphan and Infrequent Tumors (GETHI)

Dr. Corral Jaime, Jesús
- Medical Oncologist, University Clinic of Navarra, Madrid, Thoracic Tumors Unit

Dr. Martín Ramos, Francisco Javier
- Specialist in Orthopedic Surgery and Traumatology, Spine Surgery Unit
- Postgraduate Diploma in Pathologies for Disorders of the Locomotor System
- Master's Degree in Clinical Trials, Virgen Macarena University Hospital, Madrid

Dr. Morillo Rojas, María Dolores
- Specialist Doctor in Ophthalmology, Virgen del Rocio University Hospital

Dr. Navarro Alcaraz, Paloma
- Doctor of Pharmacy
- Translational Oncology Laboratory and Innovation in Oncology Laboratory
- HM Hospitals-CIOCC Research Foundation

Dr. Pérez Altozano, Javier
- Hospital Virgen de los Lirios, Alcoy, Thoracic, Head and Neck, Unknown Primary, CNS and Dermatological Tumors Unit

Dr. Reina Zoilo, Juan José
- Medical Oncologist, Digestive and Neuroendocrine Tumors Unit, Virgen Macarena University Hospital, Madrid, Spain

Dr. Ruiz Llorente, Sergio
- PhD in Biology
- Translational Oncology Laboratory and Innovation in Oncology Laboratory
- HM Hospitals-CIOCC Research Foundation

The best teachers are at the best university. Think no more and Specialize with us"

04

Structure and Content

The structure of the content has been designed by the best professionals in the sector, with extensive experience and recognized prestige in the profession, backed by the volume of cases reviewed, studied, and diagnosed, and with extensive knowledge of new technologies applied to teaching.

This Postgraduate Diploma contains the most complete and up-to-date scientific program on the market. We have selected the best information to put it at your fingertips"

Module 1. Molecular Biology Tools for an Agnostic Approach to Rare Cancers

1.1. Concepts of Molecular Oncology
- 1.1.1. Genetic Concepts
- 1.1.2. Epigenetic Concepts
- 1.1.3. crDNA Concepts
- 1.1.4. RNA Concepts

1.2. Tumor DNA Study I. Solid Biopsy
- 1.2.1. Genome
- 1.2.2. Exome
- 1.2.3. Sequencing Panels

1.3. Study of Tumor DNA II Fluid Biopsy
- 1.3.1. Available Platforms
- 1.3.2. Current Applications

1.4. Study of Germline DNA
- 1.4.1. Variants and Polymorphisms
- 1.4.2. Germline Alterations

1.5. Study of Messenger RNA
- 1.5.1. Transcriptome
- 1.5.2. Sequencing Panels (Nanostring)
- 1.5.3. Single Cell RNA

1.6. Epigenetics I. Methylome and Methylation Panels
- 1.6.1. Methyloma
- 1.6.2. Methylation Panels

1.7. Epigenetics II Non-Coding RNA, Chromatin Modifications
- 1.7.1. Long Non-Coding RNA
- 1.7.2. MicroRNA
- 1.7.3. Chromatin Remodeling

1.8. Functional Models I. Drug Sensing in Primary Cell Culture and Organoids

1.9. Molecular Biology in Immuno-Oncology I
- 1.9.1. Tumor Mutation Burden
- 1.9.2. Neoantigens
- 1.9.3. Microbiota
- 1.9.4. Adoptive Cell Therapy

1.10. Molecular Biology in Immuno-Oncology II. Functional Models
- 1.10.1. Coculture of Lymphocytes
- 1.10.2. Humanized Murine Methods

Module 2. Pleural, Mediastinal and Chest Wall Tumors: Lung Cancer As a Paradigm of New Rare Tumors. Head and Neck Cancer

2.1. Pleural Tumors: Mesothelioma
- 2.1.1. Introduction and Epidemiology
- 2.1.2. Etiology and Pathogenesis
- 2.1.3. Clinical Presentation
- 2.1.4. Diagnosis and Staging
- 2.1.5. Prognostic Factors
- 2.1.6. Treatment and Recommendations (Guidelines/Consensus)
- 2.1.7. Future Perspectives

2.2. Mediastinal Tumors: Thymoma and Thymic Carcinoma
- 2.2.1. Introduction and Epidemiology
- 2.2.2. Etiology and Pathogenesis
- 2.2.3. Clinical Presentation
- 2.2.4. Diagnosis and Staging
- 2.2.5. Prognostic Factors
- 2.2.6. Treatment and Recommendations (Guidelines/Consensus)
- 2.2.7. Future

2.3. Chest Wall Tumors
- 2.3.1. Introduction and Epidemiology
- 2.3.2. Etiology and Pathogenesis
- 2.3.3. Clinical Presentation
- 2.3.4. Diagnosis and Classification
- 2.3.5. Prognostic Factors
- 2.3.6. Treatment and Recommendations
- 2.3.7. Future

2.4. Pulmonary Neuroendocrine Tumor: Typical Carcinoid, Atypical Carcinoid, and Large Cell Carcinoma
- 2.4.1. Introduction and Epidemiology
- 2.4.2. Etiology and Pathogenesis
- 2.4.3. Clinical Presentation
- 2.4.4. Diagnosis and Classification
- 2.4.5. Prognostic Factors
- 2.4.6. Treatment and Recommendations
- 2.4.7. Future

2.5. Lung Cancer as a Paradigm for Personalized Medicine: Diagnostic Techniques and the Role of Liquid Biopsy
- 2.5.1. Introduction
- 2.5.2. Sample Types According to Diagnostic Approach
- 2.5.3. Sample Handling Optimization
- 2.5.4. Response Time and Report Characteristics
- 2.5.5. Tumor Heterogeneity: Role of Liquid Biopsy
- 2.5.6. Molecular Diagnostic Techniques: IHQ, FISH, RT-PCR, NGS
- 2.5.7. Guide Recommendations

2.6. Mutations: EGFR, BRAF, MET, KRAS
- 2.6.1. Introduction: Epidemiology, Patient Profile, Diagnostic Techniques and Brain Disease
- 2.6.2. Prognostic Factors
- 2.6.3. First-Line Targeted Therapy
- 2.6.4. Resistance Mechanisms
- 2.6.5. Second-Line Therapy and Successive Lines
- 2.6.6. Role of Chemotherapy +/- Immunotherapy
- 2.6.7. Future

2.7. Translocations: ALK, ROS-1
- 2.7.1. Introduction: Epidemiology, Patient Profile, Diagnostic Techniques and Brain Disease
- 2.7.2. Prognostic Factors
- 2.7.3. First-Line Targeted Therapy
- 2.7.4. Resistance Mechanisms
- 2.7.5. Second-Line Therapy and Successive Lines
- 2.7.6. Role of Chemotherapy +/- Immunotherapy
- 2.7.7. Future

2.8. Rearrangements/Amplifications: NTRK, RET, MET, HER-2
- 2.8.1. Introduction: Epidemiology, Patient Profile, Diagnostic Techniques and Brain Disease
- 2.8.2. Prognostic Factors
- 2.8.3. First-Line Targeted Therapy
- 2.8.4. Resistance Mechanisms
- 2.8.5. Second-Line Therapy and Successive Lines
- 2.8.6. Role of Chemotherapy +/- Immunotherapy
- 2.8.7. Future

2.9. Nasopharyngeal Carcinoma and Salivary Gland Tumors: Nasal and Paranasal Sinus Tumors
- 2.9.1. Nasopharyngeal Carcinoma
  - 2.9.1.1. Introduction
  - 2.9.1.2. Epidemiological Data
  - 2.9.1.3. Etiology and Etiopathogenesis
  - 2.9.1.4. Clinical Manifestations
  - 2.9.1.5. Diagnostic Methods and Extension Diagnosis
  - 2.9.1.6. Multidisciplinary Treatment
- 2.9.2. Salivary Gland Tumors
  - 2.9.2.1. Major Salivary Gland Tumors
  - 2.9.2.2. Minor Salivary Gland Tumors
- 2.9.3. Nasal and Paranasal Sinus Tumors
  - 2.9.3.1. Epidemiology
  - 2.9.3.2. Etiopathogeny, Histology and Natural History
  - 2.9.3.3. Clinical, Diagnostic and Staging
  - 2.9.3.4. Treatment

2.10. Melanomas, Sarcomas and Lymphoproliferative Syndromes of the Head and Neck: Rare Tumors. Ameloblastoma. Neuroendocrine Head and Neck Tumors
- 2.10.1. Head and Neck Melanoma
  - 2.10.1.1. Etiologic, Epidemiologic and Clinical Factors
  - 2.10.1.2. Diagnostic and Therapeutic Aspects
  - 2.10.1.3. Special Presentations of Head and Neck Melanoma

2.10.2. Head and Neck Sarcomas
- 2.10.2.1. Etiopathogenesis and Epidemiology
- 2.10.2.2. Clinical Aspects
- 2.10.2.3. Diagnosis
- 2.10.2.4. Therapeutic Aspects

2.10.3. Lymphoproliferative Head and Neck Syndromes
- 2.10.3.1. Etiological Factors
- 2.10.3.2. Staging Procedures
- 2.10.3.3. Clinical Scheme of Lymphoid System Neoplasms

2.10.4. Dental Tumors
- 2.10.4.1. Odontogenic Tumor Classification

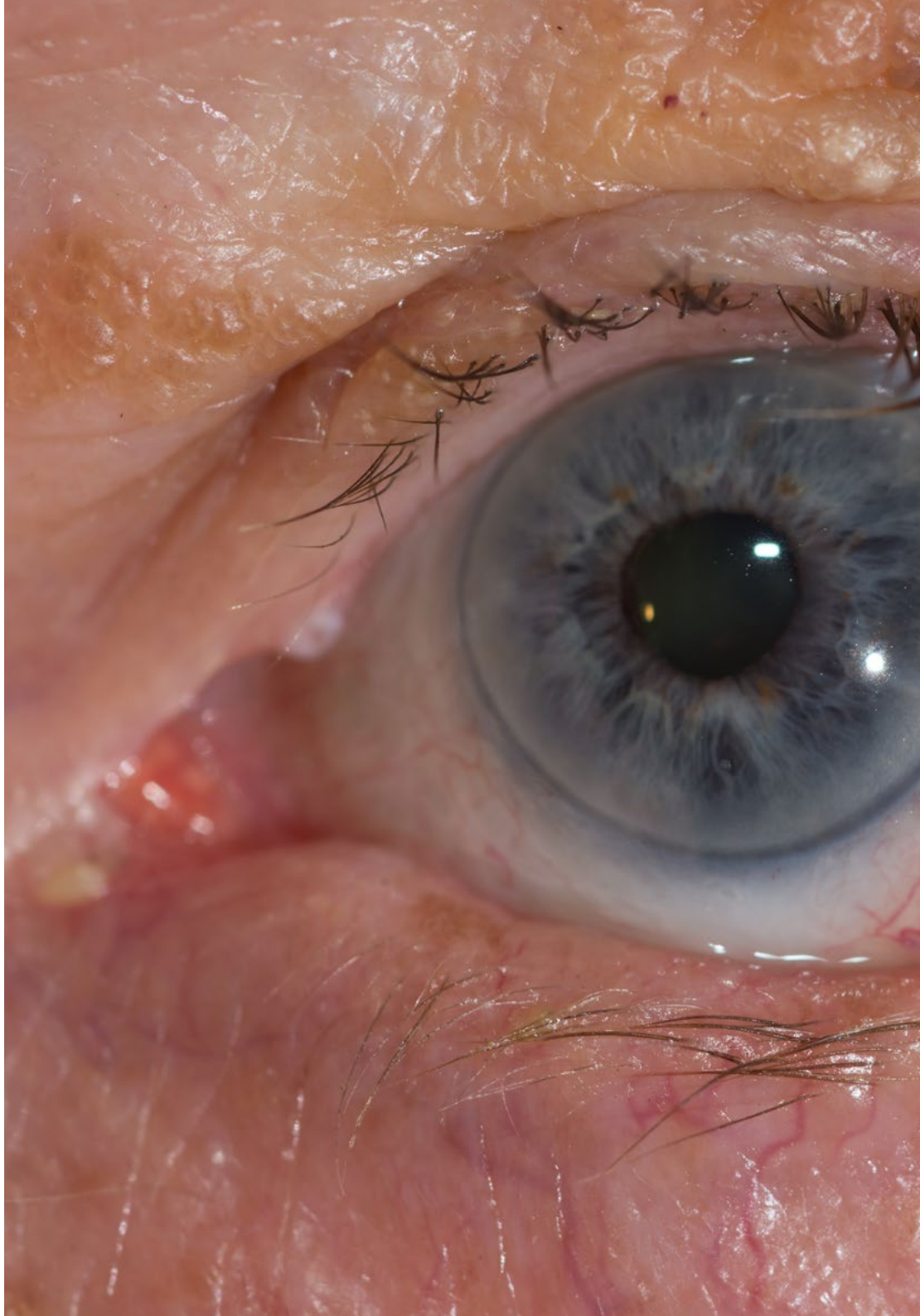
2.10.5. Ameloblastoma

2.10.6. Neuroendocrine Head and Neck Tumors
- 2.10.6.1. Neuroendocrine Carcinomas of Epithelial Origin
- 2.10.6.2. Atypical Carcinoid
- 2.10.6.3. Small Cell Neuroendocrine Carcinoma
- 2.10.6.4. Large Cell Neuroendocrine Carcinoma
- 2.10.6.5. Neuroendocrine Carcinoma of Neural Origin

Module 3. Musculoskeletal Tumors: Epithelial Cancer. Central Nervous System Tumors: Ocular Tumors

3.1. Bone and Soft Tissue Sarcomas: Classification, Characteristics, and Diagnostic Therapeutic Approach
- 3.1.1. General Information, Epidemiology
- 3.1.2. Etiopathogenesis and Classification
- 3.1.3. Clinical Aspects
- 3.1.4. Diagnostic and Therapeutic Aspects

3.2. Soft Tissue Sarcomas
- 3.2.1. Liposarcomas
- 3.2.2. Rhabdomyosarcoma
- 3.2.3. Leiomyosarcoma
- 3.2.4. Synovial Sarcoma
- 3.2.5. Angiosarcoma



3.2.6. Lymphangiosarcoma
3.2.7. Malignant Peripheral Nerve Sheath Tumor
3.2.8. Specific Soft Tissue Sarcomas
3.2.8.1. Complex Karyotype Sarcomas
3.2.8.2. Translocation-Specific Subtypes
3.2.8.3. Developmental Sarcomas
3.2.8.4. Alveolar Soft Tissue Sarcoma
3.2.8.5. Clear Cell Sarcoma
3.2.8.6. PEComa
3.2.8.7. Solitary Fibrous Tumor
3.2.8.8. Inflammatory Myofibroblastic Tumor
3.2.8.9. Desmoplastic Round Cell Tumor
3.2.8.10. Mesenchymal Tumors with Locally Aggressive Behavior

3.3. Skeletal Sarcomas
3.3.1. Chondrosarcoma
3.3.2. Fibrosarcoma
3.3.3. Clear Cell Sarcoma
3.3.4. Chordoma

3.4. Visceral Sarcomas
3.4.1. General Aspects of Low-Incidence Visceral Sarcomas
3.4.2. Visceral Sarcoma Classification
3.4.3. Diagnostic and Therapeutic Aspects
3.4.4. Molecular Aspects

3.5. Central Nervous System Tumors: Classification, Characteristics and Therapeutic Diagnostic Approach
3.5.1. Classification
3.5.2. Epidemiology and Etiopathogenesis
3.5.3. General Clinical Features
3.5.4. Diagnostic Algorithm
3.5.5. Therapeutic Approach

3.6. Central Nervous System Tumors: Oligodendrogliomas and Diffuse Astrocytic Tumors: Ependymal Tumors. Choroid Plexus Tumors. Neuronal and Mixed Glial-Neuronal Tumors
- 3.6.1. Oligodendrogliomas and Diffuse Astrocytic Tumors
- 3.6.2. Ependymal Tumors
- 3.6.3. Choroid Plexus Tumors
- 3.6.4. Neuronal and Mixed Glial-Neuronal Tumors

3.7. Pineal Region Tumors: Embryonal Tumors. Central Nervous System Lymphomas. Germinal Cell Tumors. Selar Region Tumors. Miscellaneous
- 3.7.1. Pineal Region Tumors
- 3.7.2. Embryonal Tumors
- 3.7.3. Central Nervous System Lymphomas
- 3.7.4. Germ Cell Tumors
- 3.7.5. Selar Region Tumors
- 3.7.6. Miscellaneous

3.8. Malignant Skull Base Tumors: Craniopharyngioma and Solitary Fibrous Tumor/ Hemangiopericytoma
- 3.8.1. Chordomas
- 3.8.2. Chondrosarcomas
- 3.8.3. Craneofaringioma
- 3.8.4. Solitary Fibrous Tumor: Hemangiopericytoma

3.9. Skin and Appendage Tumours
- 3.9.1. Classification, Characteristics and Therapeutic Diagnostic Approach
- 3.9.2. Tumors Originating in Benign Structures
  - 3.9.2.1. Porocarcinoma
  - 3.9.2.2. Hydradenocarcinoma
  - 3.9.2.3. Spiradenocarcinoma
  - 3.9.2.4. Cylindrocarcinoma
- 3.9.3. Analogous Glandular Tumors
  - 3.9.3.1. Adenoid Cystic Carcinoma
  - 3.9.3.2. Secretor Carcinoma
  - 3.9.3.3. Apocrine Carcinoma
  - 3.9.3.4. Cribriform Carcinoma
  - 3.9.3.5. Malignant Mixed Tumor
  - 3.9.3.6. Malignant Myoepithelioma
- 3.9.4. Hair Follicular Differentiation Tumors
  - 3.9.4.1. Trichilemmal Carcinoma
  - 3.9.4.2. Pilomatrical Carcinoma
- 3.9.5. Tumors Originating in the Facial Area
  - 3.9.5.1. Mucinous Carcinoma
  - 3.9.5.2. Histiocytoid Carcinoma
  - 3.9.5.3. Endocrine Mucin-Producing Sweat Gland Carcinoma
- 3.9.6. Cutaneous Sarcoma
  - 3.9.6.1. Atypical Fibroxanthoma
  - 3.9.6.2. Angiosarcoma
  - 3.9.6.3. Dermatofibrosarcoma Protuberans
  - 3.9.6.4. Non-HIV Kaposi's Sarcoma, Other Sarcomas
- 3.9.7. Miscellaneous
  - 3.9.7.1. Microcystic Adrenal Carcinoma
  - 3.9.7.2. Adenosquamous Carcinoma
  - 3.9.7.3. Adenocarcinoma

3.10. Eye Tumors in Adults
- 3.10.1. Eyelid Tumors.
- 3.10.2. Basal Cell Carcinoma
- 3.10.3. Epidermoid Carcinoma
- 3.10.4. Keratoacanthoma
- 3.10.5. Lentigo Maligna Melanoma
- 3.10.6. Conjunctival Tumors
- 3.10.7. Conjunctival Squamous Neoplasia
- 3.10.8. Conjunctival Melanoma
- 3.10.9. Anterior Uveal Melanoma: Iris Melanoma
- 3.10.10. Posterior Uveal Melanoma: Choroidal Melanoma
- 3.10.11. Choroidal Metastases
- 3.10.12. Orbital Metastases

Module 4. Uncommon Digestive Tumors Digestive Neuroendocrine Tumors. Thyroid Cancer

4.1. Tumors of the Small Intestine Appendicular Tumors
- 4.1.1. Tumors of the Small Intestine
  - 4.1.1.1. Epidemiology. Risk Factors
  - 4.1.1.2. Pathogenesis, Molecular Profile and Hereditary Syndromes
  - 4.1.1.3. Clinical Characteristics. Histological Subtypes
  - 4.1.1.4. Diagnosis and Staging Prognosis
  - 4.1.1.5. Localized Disease Treatment Monitoring
  - 4.1.1.6. Treatment of Metastatic Disease
- 4.1.2. Appendicular Tumors
  - 4.1.2.1. Epidemiology
  - 4.1.2.2. Histology Staging
  - 4.1.2.3. Clinical Presentation. Diagnosis
  - 4.1.2.4. Localized Disease Treatment
  - 4.1.2.5. Treatment of Metastatic Disease
  - 4.1.2.6. Pseudomyxoma Peritoneum

4.2. Cancer of the Anal Canal
- 4.2.1. Epidemiology. Risk Factors
- 4.2.2. HPV, Genotypes Molecular Pathogenesis
- 4.2.3. Pathological Anatomy. Staging
- 4.2.4. Clinical Presentation. Diagnosis
- 4.2.5. Treatment of Localized Disease Monitoring
- 4.2.6. Treatment of Metastatic Disease Immunotherapy

4.3. Tumors of the Liver and Intrahepatic Bile Ducts Neoplasms of the Gallbladder and Extrahepatic Bile Ducts
- 4.3.1. Hepatocellular Carcinoma
  - 4.3.1.1. Epidemiological Aspects
  - 4.3.1.2. Diagnostic Process
  - 4.3.1.3. Staging
  - 4.3.1.4. Management of Local Disease: Transplantation vs. Resection
  - 4.3.1.5. Local Disease Management: Ablative Techniques
  - 4.3.1.6. Management of Locally Advanced Disease
    - 4.3.1.6.1. Radioembolization
    - 4.3.1.6.2. Transarterial Chemoembolization
    - 4.3.1.6.3. Radiotherapy
  - 4.3.1.7. Treatment of Metastatic Disease
- 4.3.2. Biliary Tract Tumours
  - 4.3.2.1. Characterization of the Three Entities that Make Up the Group
  - 4.3.2.2. Epidemiological Aspects
  - 4.3.2.3. Risk Factors
  - 4.3.2.4. Clinical Expressivity
  - 4.3.2.5. Diagnostic Aspects
  - 4.3.2.6. Unresectability Criteria
  - 4.3.2.7. Histological Aspects
  - 4.3.2.8. Molecular Aspects. Molecular Classification
  - 4.3.2.9. Described Genomic Alterations
  - 4.3.2.10. Treatment of Localized Disease
    - 4.3.2.10.1. Surgery
    - 4.3.2.10.2. Adjuvant Criteria
    - 4.3.2.10.3. Monitoring
  - 4.3.2.11. Treating Advanced Stages of the Disease
    - 4.3.2.11.1. Treatment of Locally Advanced Disease
    - 4.3.2.11.2. Treatment of Metastatic Disease
  - 4.3.2.12. Monitoring

4.4. Gastrointestinal Stromal Tumors
- 4.4.1. Clinical and Epidemiological Aspects
- 4.4.2. Diagnostic Process of GIST
  - 4.4.2.1. Radiology
  - 4.4.2.2. Histology
  - 4.4.2.3. Molecular Biology
- 4.4.3. Treatment of Localized Disease
  - 4.4.3.1. Surgical Aspects
  - 4.4.3.2. Prognostic Factors after Resection
  - 4.4.3.3. Adjuvant Treatment
  - 4.4.3.4. Neoadjuvant Treatment

4.4.4. Treating Advanced Stages of the Disease
4.4.4.1. Surgery in the Context of Advanced Disease
4.4.4.2. Systemic Treatment
4.4.4.3. Monitoring

4.5. Neuroendocrine Tumors: Tumors of the Small Intestine
4.5.1. Epidemiology
4.5.2. Pathological Anatomy. Histological Degree Ki67 and Mitotic Index
4.5.3. Molecular Factors Biomarkers
4.5.4. Clinical Presentation. Carcinoid syndrome
4.5.5. Diagnosis and Staging Prognosis
4.5.6. Localized Disease Treatment Monitoring
4.5.7. Treatment of Metastatic Disease Treatment of Hormonal Hypersecretion

4.6. Neuroendocrine Tumors: Pancreatic Tumors
4.6.1. Epidemiology
4.6.2. Pathologic Anatomy. Histological Degree
4.6.3. Molecular Factors Biomarkers
4.6.4. Clinical Presentation. Carcinoid syndrome
4.6.5. Diagnosis and Staging Prognosis
4.6.6. Localized Disease Treatment Monitoring
4.6.7. Treatment of Metastatic Disease Treatment of Hormonal Hypersecretion Syndromes
4.6.8. Advanced Line Treatment

4.7. Thyroid Cancer
4.7.1. Introduction
4.7.2. Incidence and Epidemiology
4.7.3. Clinical and Diagnostic Aspects
4.7.4. General Aspects of Treatment
4.7.5. Guidelines Recommendations and Level of Evidence

4.8. Differentiated Thyroid Cancer
- 4.8.1. Diagnosis, Pathological Anatomy and Molecular Biology
- 4.8.2. Staging and Risk Assessment
- 4.8.3. Management of Primary Tumor
- 4.8.4. Management of Advanced Disease
- 4.8.5. Follow-Up and Long Survivors

4.9. Anaplastic Thyroid Cancer
- 4.9.1. Diagnosis, Pathological Anatomy and Molecular Biology
- 4.9.2. Staging and Risk Assessment
- 4.9.3. Management of Primary Tumor
- 4.9.4. Management of Advanced Disease
- 4.9.5. Follow-Up and Long Survivors

4.10. Medullary Thyroid Cancer
- 4.10.1. Diagnosis, Pathological Anatomy and Molecular Biology
- 4.10.2. Staging and Risk Assessment
- 4.10.3. Management of Primary Tumor
- 4.10.4. Management of Advanced Disease
- 4.10.5. Follow-Up and Long Survivors

This program will allow you to advance in your career comfortably"

05

Methodology

This academic program offers students a different way of learning. Our methodology uses a cyclical learning approach: **Relearning.**

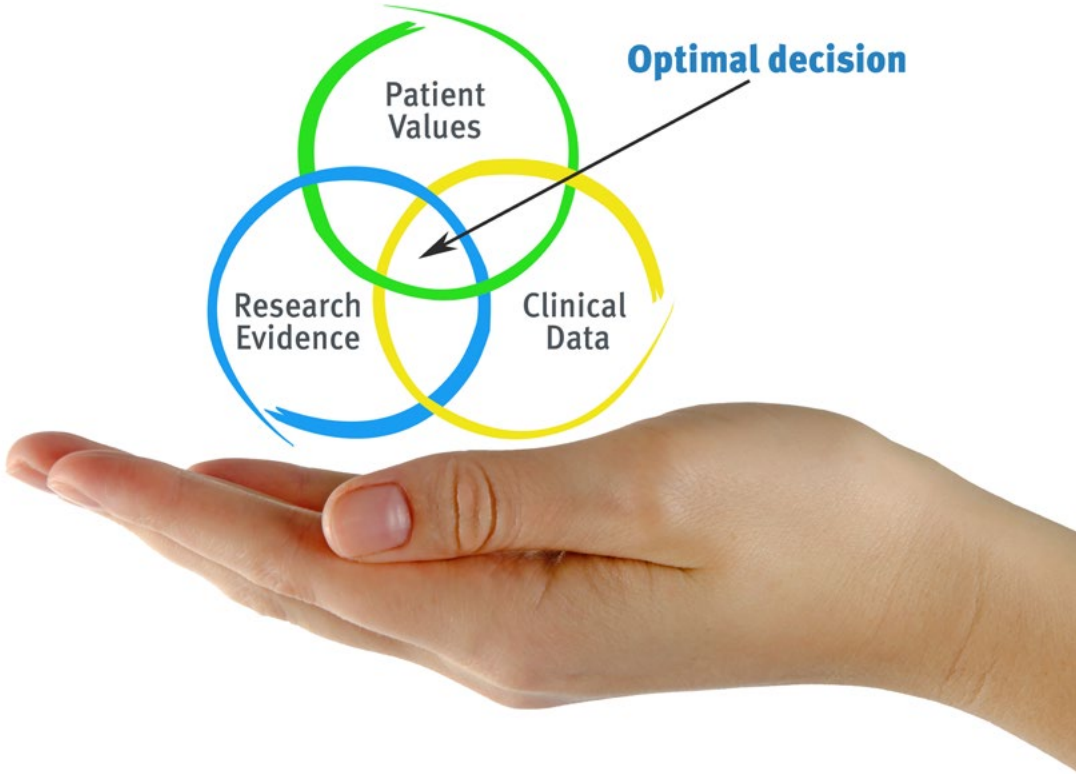
This teaching system is used, for example, in the most prestigious medical schools in the world, and major publications such as the **New England Journal of Medicine** have considered it to be one of the most effective.

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:

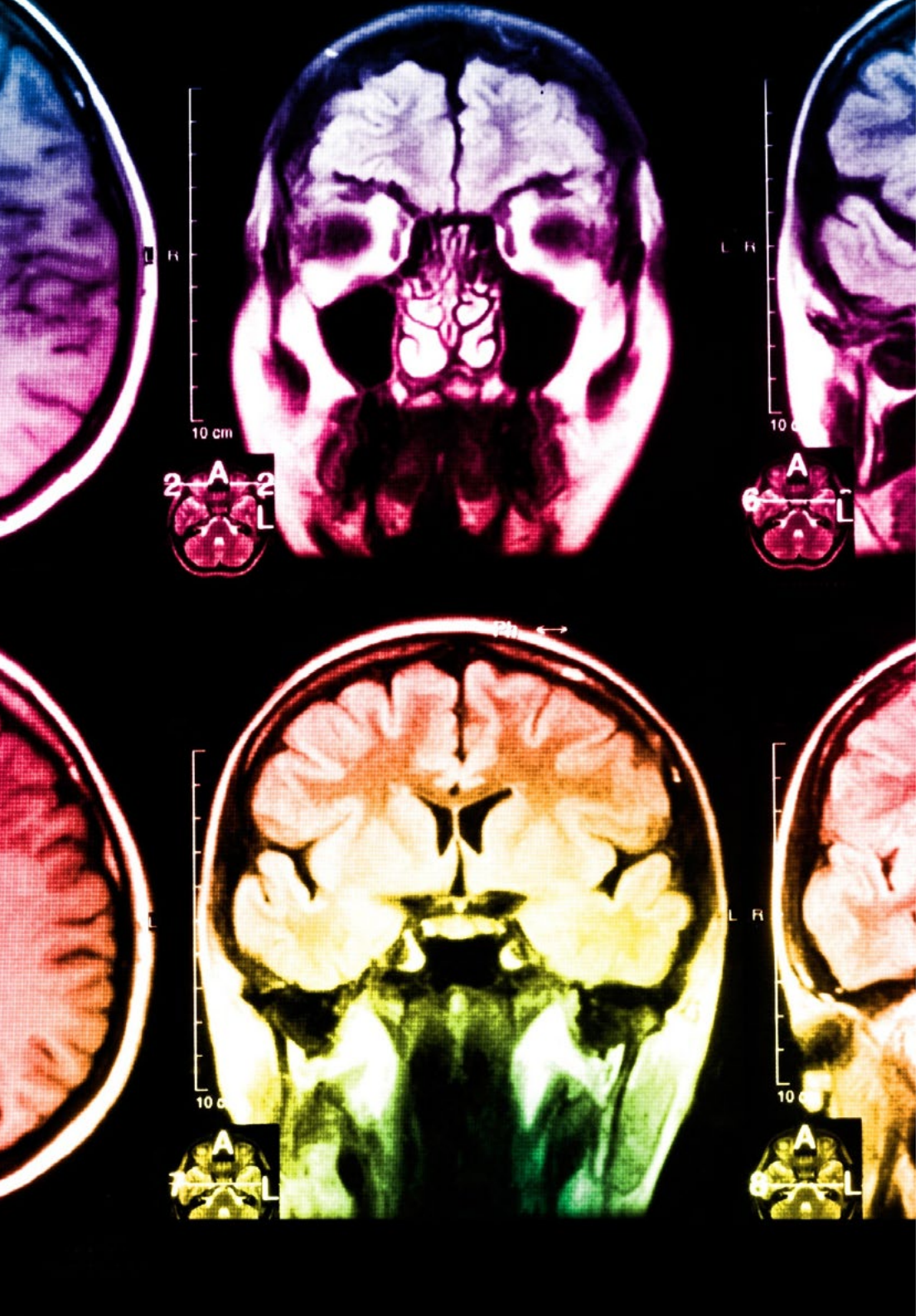
1. Students who follow this method not only achieve the assimilation of concepts, but also a development of their mental capacity, through exercises that evaluate real situations and the application of knowledge.
2. Learning is solidly translated into practical skills that allow the student to better 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 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 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 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.

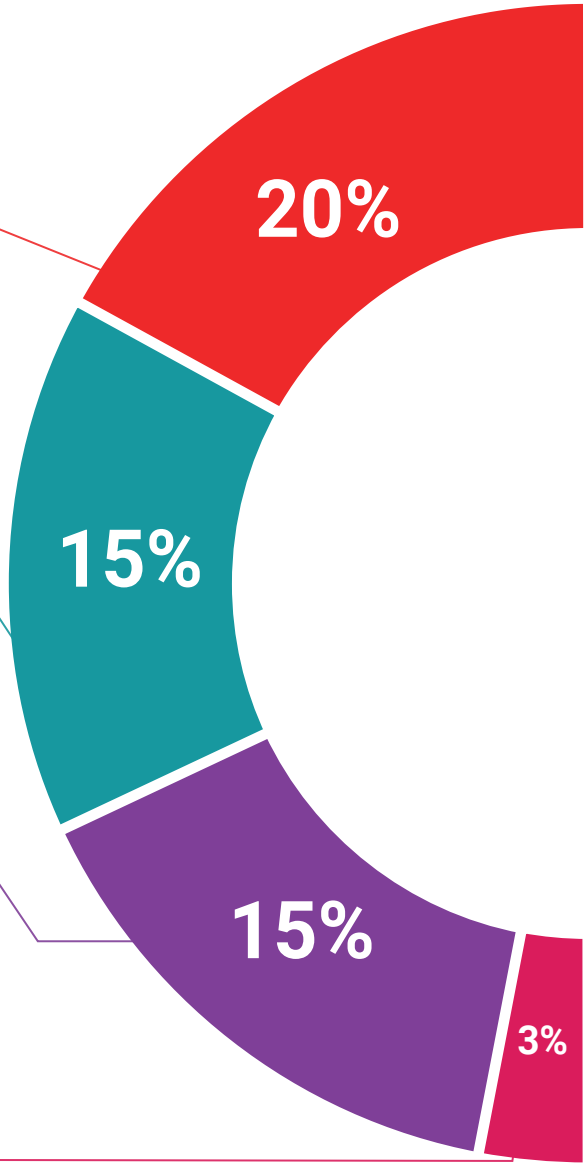
Interactive Summaries

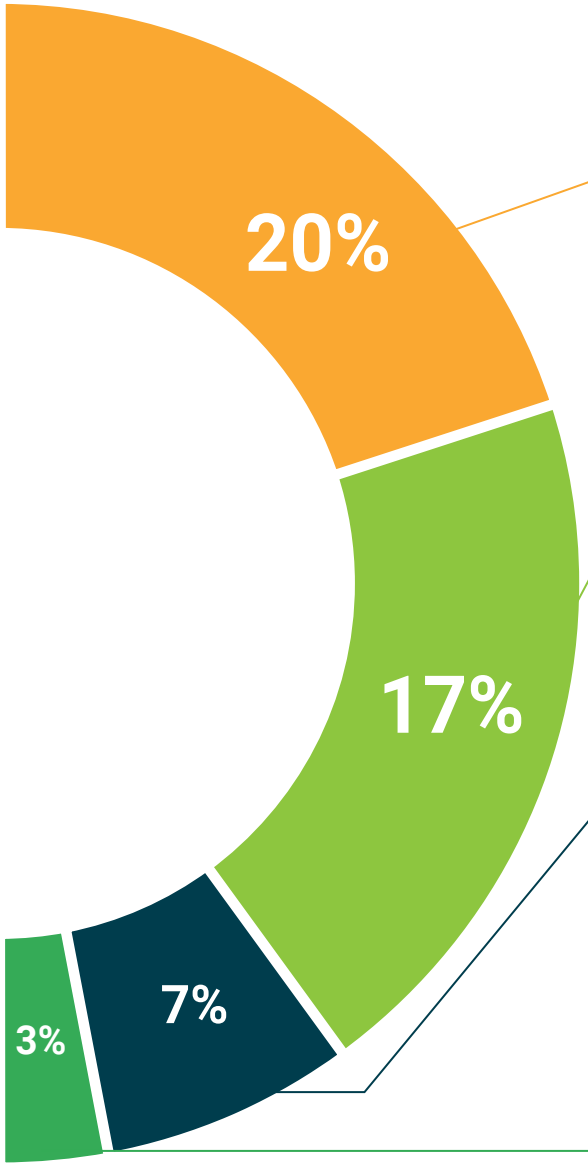
The TECH team presents the contents attractively and dynamically in multimedia lessons that include audio, videos, images, diagrams, and concept maps in order to reinforce knowledge.

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 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 Diploma in Diagnostic and Therapeutic Techniques in Oncology guarantees students, in addition to the most rigorous and up-to-date education, access to a Postgraduate Diploma issued by TECH Technological University.

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

This **Postgraduate Diploma in Diagnostic and Therapeutic Techniques in Oncology** contains the most complete and up-to-date scientific on the market.

After the student has passed the assessments, they will receive their corresponding **Postgraduate Diploma** issued by **TECH Technological University** via tracked delivery*.

The certificate issued by **TECH Technological University** will reflect the qualification obtained in the Postgraduate Diploma,and meets the requirements commonly demanded by labor exchanges, competitive examinations, and professional career evaluation committees.

Title: **Postgraduate Diploma in Diagnostic and Therapeutic Techniques in Oncology**

Official Nº of Hours: **500 h.**

tech technological university

Awards the following

CERTIFICATE

to

Mr./Ms. _____, with identification number _____.

For having passed and accredited the following program

POSTGRADUATE DIPLOMA

in

Diagnostic and Therapeutic Techniques in Oncology

This is a qualification awarded by this University, equivalent to 500 hours, with a start date of dd/mm/yyyy and an end date of dd/mm/yyyy.

TECH is a Private Institution of Higher Education recognized by the Ministry of Public Education as of June 28, 2018.

June 17, 2020

Tere Guevara Navarro

Dean

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 certificate issued with an apostille, TECH EDUCATION will make the necessary arrangements to obtain it, at an additional cost.

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Postgraduate Diploma

Diagnostic and Therapeutic Techniques in Oncology

- Modality: **online**
- Duration: **6 months**
- Certificate: **TECH Technological University**
- Dedication: **16h/week**
- Schedule: **at your own pace**
- Exams: **online**

Postgraduate Diploma
Diagnostic and Therapeutic Techniques in Oncology

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