GAUN DEPARTMENT OF PHYSİOTHERAPY AND REHABİLİTATİON
COURSE CATALOGUE

TR133 Anatomy I (4-4-6-6):
The aim of this course is to provide students with a clinical and functional understanding of general human anatomy, with a focus on the musculoskeletal and nervous systems. The course covers an introduction to human anatomy, fundamental anatomical concepts, as well as the structure and function of bones, joints, muscles, nerves, joint movements, supportive structures, organs, and tissues.

FTR135 Physiology I (4-0-4-4):
This course aims to provide students with foundational knowledge in all major topics of medical physiology. It includes cell physiology, muscle physiology, peripheral and central nervous systems, and the circulatory system.

FTR137 Biophysics (2-0-2-3):
The objective of this course is to help students understand the physical basis of biological functions and their interactions with the environment. Topics include action potentials, ion channels, muscle contraction, motion and its equations, force and movement, laws of motion, work and energy, momentum, and mechanical properties of matter.

FTR139 Basic Information Technologies (2-0-2-3):
This course aims to introduce students to information technologies and their fundamental principles. It includes training in presentation tools, data processing, calculations, operating systems, and essential office applications, emphasizing their relevance in professional activities.

FTR141 Biochemistry (1-0-1-2):
The purpose of this course is to provide students with basic knowledge of biochemistry. Topics include chemical bonds, water and biological buffers, amino acids and proteins, carbohydrates, enzymes and coenzymes, lipids and biological membranes, signal transduction, hormones, bioenergetics, and metabolism.

FTR143 Medical Terminology (2-0-2-2):
This course introduces students to medical terminology and the roots of medical terms. It covers anatomical terminology, terminology related to movement, terms specific to physiotherapy and rehabilitation practices, and terminology used in research and planning.

FTR145 Physical Activity and Healthy Living (2-0-2-2):
The aim of this course is to raise awareness among students about the impact of physical activity on healthy living. It covers the definitions and health effects of physical activity, exercise, and sports, as well as topics such as physical inactivity, sedentary lifestyle, and physical activity across different populations.

FTR147 Reading Comprehension and Critical Thinking Skills (2-0-2-2):
This course aims to equip students with reading comprehension, interpretation, and critical thinking skills. Topics include reading for understanding, exercises on basic comprehension skills, identifying the main idea and author’s purpose, reading between the lines, meaning construction, and elements involved in deriving meaning.

FTR149 Fundamentals of Physiotherapy (1-0-1-2):
The objective of this course is to introduce students to the core concepts of physiotherapy and rehabilitation, including its definition, scope, ethics, and subfields. Topics include teamwork, multidisciplinary and interdisciplinary approaches, communication between physiotherapist and patient, professional responsibilities, field applications, and legal regulations related to physiotherapy.

FTR134 Anatomy II (4-4-6-6):
This course aims to teach the morphology and functions of body systems with a clinical and functional emphasis on the musculoskeletal and nervous systems. The course covers the anatomy of the respiratory, circulatory, digestive, urinary, genital, and nervous systems.

FTR136 Physiology II (4-0-4-4):
The objective of this course is to provide knowledge about the physiology of the cardiovascular and respiratory systems, digestive system, regulation of metabolism, and the functions of hormones and blood cells. Topics include the physiology of the digestive, urinary, cardiovascular, endocrine, reproductive, and respiratory systems.

FTR138 Functional Anatomy (2-0-2-3):
The aim of this course is to teach the functional anatomy of human body structures. It includes an introduction to surface anatomy and palpation techniques, palpation of upper extremity structures, head and neck, trunk, pelvis, and lower extremity structures.

FTR140 Clinical Biomechanics (2-0-2-3):
This course aims to provide knowledge on the anatomy, mechanics, and pathologies of the vertebral column, upper extremity, trunk, pelvis, and lower extremity. It also explores the integration of science and technology in biomechanics, and teaches dynamic evaluation of movement from kinetic and kinematic perspectives. Topics include anthropometry, kinetics, bone and joint mechanics, movement, and kinematic assessment methods.

FTR142 Basic Histology (2-0-2-3):
The course aims to help students understand the essential functions and mechanisms required for the survival of body tissues and to provide fundamental knowledge about them. Topics include the cell and its components, cell division, bone tissue, muscle tissue, nervous tissue, blood tissue, connective tissue, and epithelial tissue.

KRY100 Career Planning (0-2-1-1):
The aim of this course is to introduce students to realistic and modern career planning methods aligned with real-life challenges within social, cultural, economic, and legal frameworks. Topics include career definition, planning and management, career development and models, global career trends and theories, and practical skills such as writing CVs, cover letters, and thank-you letters, along with understanding employer expectations for new graduates.

FTR144 Psychosocial Rehabilitation (2-0-2-2):
This course aims to develop an understanding of the psychosocial conditions of individuals with impairments or disabilities and to teach how to incorporate psychosocial factors into rehabilitation planning from a physiotherapy perspective. Topics include an introduction to psychosocial rehabilitation, post-traumatic adaptation, and psychosocial rehabilitation for

individuals with physical disabilities (neurological, orthopedic, visual, auditory, etc.) and mental disorders (e.g., schizophrenia).

FTR146 Philosophy (2-0-2-2):
The aim of this course is to introduce philosophical concepts related to health and promote critical thinking. Topics include philosophical approaches to health, political perspectives in health philosophy, fundamental philosophical issues such as metaphysics, epistemology, ethics/values, education, and major philosophical movements (idealism, realism, naturalism, empiricism, rationalism, pragmatism, existentialism, analytic philosophy) in relation to health.

FTR148 Sign Language (2-0-2-2):
This course aims to teach sign language—a special language used by hearing-impaired individuals through gestures and facial expressions—to individuals without hearing impairments. The course covers an introduction to sign language, manual alphabet, basic sentence structures, components of sentences, greetings, self-introduction, colors, numbers, affirmative/negative sentence constructions, and question forms.

GME100 General and Professional Ethics (2-0-2-2):
The purpose of this course is to provide students with knowledge of societal ethical norms and professional ethics. Topics include basic concepts of medical and research ethics, professional ethical principles, ethical responsibilities in physiotherapy practice, ethical considerations in the patient-physiotherapist relationship, the functioning of ethics committees, professional morality, and solutions to ethical dilemmas.

FTR150 Technology Literacy (2-0-2-2):
This course aims to develop students' understanding of smart devices, social media interaction, accessing and analyzing information, and critical thinking. Topics include technology production, consumption, societal sharing, reading and analyzing informatics data, and ethical issues arising with technological advancements.

FTR152 Health Promotion (2-0-2-2):
The course provides fundamental knowledge and skills related to health and health promotion. Topics include concepts of health and wellness, promotion of healthy behaviors, preventive healthcare practices, exercise, stress management, and policies in health promotion.

FTR231 Pathology (1-0-1-1):
The course aims to teach the biological basis of diseases, mechanisms of development, their effects on the human body, and pathology assessment processes. Topics include an introduction to pathology, cellular injury and adaptation, necrosis and apoptosis, and immunological disorders.

FTR233 Surface Anatomy and Palpation (1-1-2-3):
This course aims to teach palpation of anatomical structures in the human body. It includes palpation techniques and the palpation of upper extremity, head and neck, trunk, pelvis, and lower extremity structures.

FTR235 Thermo-Photo-Hydrotherapy (2-0-2-3):
The course aims to teach the physical properties, physiological effects, possible hazards, and application methods of heat, light, and water agents. Topics include inflammation, pain,

physical properties and application techniques of thermal, light, and hydrotherapy agents, and patient safety.

FTR237 Basic Assessment and Evaluation in Physiotherapy (2-2-3-4):
The course aims to provide theoretical and practical training on patient history taking, general physiotherapy evaluations, postural analysis, basic principles of movement, and region-specific assessments (e.g., muscle strength, flexibility, joint range of motion). Topics include postural analysis, range of motion, flexibility, muscle strength assessments, anthropometric measurements, and joint mobility evaluation.

FTR239 Electrophysical Agents I (2-2-3-4):
This course provides knowledge of electrophysical principles and the effects of commonly used electrophysical agents in physiotherapy and rehabilitation. It includes the physiological responses of muscles and nerves, characteristics of denervated and innervated muscles, and mechanisms and application methods of low and medium frequency currents.

FTR241 Clinical Orthopedics (1-0-1-2):
The aim is to provide foundational theoretical knowledge of common orthopedic conditions, along with disease-specific evaluation and treatment approaches. Topics include orthopedic problems of the lower extremity, hip, trunk, spine, and upper extremity.

FTR243 Kinesiology I (3-0-3-3):
The course aims to explain the mechanics of movement and relevant structures, responses of tissues to stress, pathological changes, and the application of mechanical principles to movement. It also covers gait features, gait analysis, and deviations in pathological gait. Topics include movement mechanics, mechanical properties of bones, muscles, and cartilage, joint structures, planes and axes of orientation, and normal/pathological gait.

FTR245 Clinical Neurosurgery (1-0-1-1):
The aim is to provide basic knowledge about neurosurgical conditions, emergency neurosurgery cases, and related surgical approaches. Topics include head trauma, cerebrovascular diseases, spinal cord compression, disc herniations, intracranial tumors, increased intracranial pressure syndromes, treatment principles, and pediatric neurosurgery.

FTR247 Internal Medicine (1-0-1-2):
This course provides basic theoretical knowledge on internal diseases frequently encountered by physiotherapists and related diagnostic and treatment methods. Topics include metabolic, cardiovascular, infectious, endocrine, hematological, gastrointestinal, and renal diseases. It also covers common conditions in gynecology, obstetrics, neurosurgery, and orthopedics, and their evaluation and treatment methods.

FTR249 Manual Therapy Approaches I (2-2-3-3):
This course aims to provide theoretical and practical knowledge of specific massage techniques, patient assessment and treatment concepts, and to develop application skills. Topics include the mechanical, physiological, psychological, and reflex effects of massage techniques, evaluation methods used after massage, and indications of massage in physiotherapy and rehabilitation.

FTR251 Sports for Individuals with Disabilities (2-0-2-2)
The course aims to provide knowledge about sports for individuals with disabilities and emphasize the role of physiotherapy in this field. Topics include the history and development

of disability sports, types of sports for people with physical and mental disabilities, physiotherapy and rehabilitation in disability sports, orthotic and prosthetic approaches, and classification of disabled athletes for competition.

FTR255 Effective Presentation Techniques (2-0-2-2)
The course aims to teach students how to deliver effective presentations through practical applications. It includes presentation techniques, planning and preparation, verbal expression skills, appropriate presentation methods based on setting, and common mistakes.

SBF201 Multidisciplinary Approach to Pressure Ulcers (2-0-2-2)
The course aims to develop knowledge and skills in pressure ulcer management based on current evidence, to understand the roles and responsibilities of the multidisciplinary team, and to reinforce learning through the use of VR applications. Topics include the etiopathogenesis and assessment of pressure ulcers, multidisciplinary strategies for prevention, relevant techniques, and clinical scenarios.

FTR238 Basic Exercise Approaches (2-2-3-4)
The course focuses on physiotherapy-specific assessment methods and the development of exercise therapy programs. It includes classification, objectives, and planning of exercises, basic evaluation techniques used in physiotherapy, exercise programs for postural problems, normal joint movement and stretching exercises, postural dysfunction examples, spinal stabilization, and relaxation exercises.

FTR242 Clinical Pediatrics (1-0-1-1)
This course provides foundational knowledge on normal motor development, common pediatric issues, and neurological examination of children with developmental problems. Topics include growth and development in children, stages of motor development, neonatal conditions, and diseases such as cerebral palsy, cystic fibrosis, and heart failure, along with related treatment approaches.

FTR246 Clinical Rheumatology (1-0-1-1)
The course introduces common rheumatologic conditions and their theoretical foundations. It covers the pathology, clinical progression, and treatment methods of conditions such as soft tissue rheumatism, rheumatoid arthritis, connective tissue diseases, and acute rheumatic fever.

FTR244 Kinesiology II (3-0-3-3)
The aim of this course is to analyze spinal pathologies based on anatomical and mechanical principles, and to describe anatomical and biomechanical properties of the pelvis, hip, upper and lower extremities. It helps students relate theoretical knowledge to pathological conditions of the musculoskeletal system. Topics include the mechanics and pathomechanics of the vertebral column, pelvis, hip, and limbs.

FTR248 Exercise Physiology (2-0-2-3):
The course aims to understand the effects of exercise on body systems under different environmental conditions, evaluate potential problems during exercise, comprehend exercise recommendations, and integrate this knowledge into basic applications. Topics include muscle physiology, the musculoskeletal system and exercise, cardiovascular system and exercise, evaluation of cardiovascular functional capacity, individual differences and energy capacity, exercise testing, respiratory physiology and exercise, aerobic and anaerobic exercise training, and practical application of heart rate and blood pressure monitoring.

FTR252 Manipulative Therapy Approaches II (2-2-3-3):
The course aims to introduce conditions that cause pain, inflammation, and movement limitations in soft tissue and joints, ensure understanding of basic assessment methods, and develop practical skills in mobilization and manipulation techniques required for treatment. It includes the anatomy and biomechanics of joints and soft tissues, basic characteristics of manipulation, mobilization, and transverse friction techniques, fundamental measurement, assessment, and manual therapy practices in joint and soft tissue pathologies, along with case applications.

FTR240 Electro Physical Agents II (2-2-3-4):
The course aims to teach the basic principles of electrophysical agents, mechanisms of action of high-frequency currents, and application methods, as well as investigate tissue responses to these agents. Topics include the basic mechanisms, physiological responses of tissues to electrophysical agents, and characteristics and applications of high-frequency currents.

FTR250 Professional Practice I (0-0-0-4):
The course aims to provide students with the opportunity to apply theoretical knowledge and practical skills in a clinical setting. For 4 weeks, under the supervision of a physiotherapist, students are expected to assess cases, practice basic skills related to diseases, perform analyses, and participate in discussions. It includes planning physiotherapy and rehabilitation programs, observation, and application of practical skills.

FTR254 Functional Neuroanatomy (2-0-2-2):
The course aims to provide students with knowledge about the normal functioning and disorders of the central, peripheral, and autonomic nervous systems. It covers the basic features, anatomy, functions, pathologies, and clinical features of the systems, along with case examples.

FTR256 First Aid (2-0-2-2):
The course aims to enable students to perform first aid interventions in emergencies, apply basic life support, and understand patient transportation techniques. Topics include first aid principles, basic life support, airway obstructions, bleeding, fractures and dislocations, drowning, burns, poisoning, and patient transportation techniques.

FTR258 Health Law (2-0-2-2):
The course aims to provide knowledge on health law and related concepts, patient rights within the scope of national and international regulations, informed consent in medical interventions, medical malpractice, and criminal liabilities relevant to health professionals. Topics include the concept and development of informed consent, its legal foundations, conditions and exceptions, general responsibilities, and the distinctive aspects of legal liability in health services.

FTR260 Aquatic Rehabilitation (2-0-2-2):
The course aims to provide information and teach applications related to physiological responses to immersion and aquatic exercises, physical principles, types of aquatic exercise, supportive equipment, program development, indications, contraindications, and potential risks.

FTR262 Occupational Health and Safety (2-0-2-2):
The course aims to provide basic knowledge on occupational safety and health programs. Topics include workplace accidents and risks, behavior-based risks, occupational diseases and

their causes, preventive strategies, national authorities responsible for occupational safety, practical challenges in occupational safety legislation, employer obligations, health monitoring, and legal responsibilities of employers.

FTR331 Occupational Therapy (2-0-2-3):
The course aims to explain the role of occupational therapy in rehabilitation, introduce basic assessment methods specific to occupational therapy, and enable students to design and apply interventions to enhance participation in daily living activities. Topics include defining the role of occupational therapists within a multidisciplinary team, assessing daily activities, applying biomechanical principles, teaching transfer techniques, hand rehabilitation, sensory evaluation, and approaches for different disabilities.

FTR333 Orthotics and Rehabilitation (2-0-2-3):
This course aims to provide students with knowledge about orthoses, their indications, complications, applications, and suitable therapeutic programs. It covers concepts related to orthoses, foot deformities and pathomechanics, foot orthoses, orthoses for knee mechanics and pathologies, congenital hip dislocation and its orthotic management, long leg orthoses, spinal pathologies and spinal orthoses, hand splinting, hand pathologies and orthotic applications, and orthoses for elbow and shoulder pathologies.

FTR335 Neurological Rehabilitation (2-2-3-4):
The aim of this course is to provide knowledge about the pathophysiology, clinical features, assessment, and treatment of neurological diseases, and to enhance students' clinical decision-making skills. Topics include spinal cord injuries, spasticity, demyelinating diseases, movement disorders, upper and lower motor neuron lesions, head injuries, disease-specific assessment and treatment applications, and case studies.

FTR337 Pulmonary Rehabilitation (2-2-3-4):
This course aims to enable the identification of respiratory problems, perform assessments, and select appropriate treatment interventions. It includes the pathophysiology of respiratory diseases, assessment and treatment methods in pulmonary rehabilitation, physiotherapy after surgery, assistive respiratory devices, physiotherapy and rehabilitation in intensive care, aspiration management, neonatal physiotherapy applications, daily energy expenditure, and physical activity.

FTR339 Rheumatologic Rehabilitation (2-0-2-3):
The course aims to provide knowledge about the mechanisms of rheumatic diseases and the physiotherapy evaluation and treatment approaches required. Topics include rheumatoid arthritis, juvenile rheumatoid arthritis, osteoarthritis, seronegative arthritis, ankylosing spondylitis, osteoporosis, fibromyalgia, myofascial pain syndrome, connective tissue diseases, gout, and septic arthritis.

FTR341 Neurophysiological Approaches I (2-2-3-4):
This course aims to provide knowledge about the mechanisms and application of Proprioceptive Neuromuscular Facilitation (PNF) techniques and to develop practical skills. Topics include the theoretical foundations of PNF, application methods, patterns, facilitation and inhibition techniques, mat activities, and case examples.

FTR343 Pediatric Rehabilitation (2-1-3-4):

The aim of this course is to introduce pediatric diseases and to teach theoretical knowledge and practical skills related to assessment and treatment. Topics include cerebral palsy, spina bifida, neuromuscular diseases, torticollis, brachial plexus injury, hereditary motor sensory neuropathies, high-risk infants, genetic syndromes, spinal muscular atrophies, autism, and orthopedic problems in pediatrics.

FTR345 Pharmacology (2-0-2-3):
The course aims to teach the basic mechanisms of pharmacological agents, their properties and side effects in organ systems. Topics include pharmacokinetics, pharmacodynamics, pharmacology of body systems (autonomic and central nervous system, cardiovascular, respiratory, endocrine systems), and drug addiction.

FTR347 Physiotherapy in Women's Health (2-0-2-2):
This course aims to provide knowledge about women's health and preventive approaches for conditions affecting women’s lives. Topics include menstruation, musculoskeletal problems, urogynecology, quality of life, women-stress-relaxation, cancer, and exercise for women.

FTR348 Technology-Based Physiotherapy Assessments (2-0-2-2):
The course aims to teach and investigate technology-based assessment methods and follow innovations in the field. Topics include obtaining objective data from technology-based assessments, assessments using smartphones or computer-based systems, and the validity and reliability of technology-based data.

FTR349 Rehabilitation in Swallowing Disorders (2-0-2-2):
This course aims to define oral-motor dysfunctions, raise awareness about swallowing problems, and provide knowledge about assessment and treatment approaches in both adults and children. It includes the anatomy and physiology of the orofacial region, swallowing dysfunction, assessment and physiotherapy in swallowing disorders, and case examples.

FTR351 Vestibular Rehabilitation (2-0-2-2):
This course aims to provide knowledge about the physiology and pathophysiology of the vestibular system and balance, along with assessment and treatment approaches. It covers vestibular system anatomy, vestibular adaptation and compensation, BPPV, vestibular dysfunction in different populations, postural anomalies, central vestibular disorders, vestibular migraine, and anxiety-panic disorders.

FTR354 Orthopedic Rehabilitation (2-1-3-3):
The aim of this course is to teach the pathophysiology of musculoskeletal disorders and appropriate assessment and treatment methods. It includes fractures of the upper and lower extremities, arthroplasties, and regional orthopedic rehabilitation assessment and approaches.

FTR332 Geriatric Rehabilitation (2-0-2-3):
This course aims to provide information on normal physiological aging, geriatric syndromes, and common chronic diseases in older adults. It includes evaluation and exercise approaches for healthy and disabled older adults, improving quality of life, and promoting physical activity in the elderly.

FTR334 Prosthetics and Rehabilitation (2-1-3-4):
The aim of this course is to provide knowledge on indications, applications, and possible complications of prosthetics. It includes amputations and their causes, congenital limb

deficiencies, partial hand and foot prostheses, prosthetic applications and component selection, early and temporary prosthesis applications, myoelectric prostheses, and amputee rehabilitation.

FTR338 Cardiac Rehabilitation (2-0-3-4):
This course aims to provide information about cardiovascular diseases, assessment, and rehabilitation. Topics include pathophysiology of cardiovascular diseases, risk factors and rehabilitation, assessment methods, pre/post-surgical applications, and case studies.

FTR336 Preventive Rehabilitation (2-0-2-3):
This course aims to define health-related concepts and influencing factors, and to teach the role of health professionals in planning and guiding health promotion and protection practices, with an emphasis on physiotherapy in preventive rehabilitation. It includes the concept of health, health protection, and the role of physiotherapy in preventive health services.

FTR340 Athlete Health (2-0-2-3):
The course aims to provide information on sports physiotherapy, physical fitness batteries in different groups, sports injuries and healing processes, and athlete-specific assessment and treatment applications. It covers topics such as sports in different populations, physical fitness, and return to sports.

FTR342 Neurophysiological Approaches II (3-2-4-4):
The aim of this course is to provide knowledge on the clinical characteristics of stroke, movement and functional disorders, assessment principles, and treatment approaches. It includes normal movement, postural control, neurodevelopmental therapy (Bobath), Margaret Johnstone and Brunnstrom principles, and related evaluations and applications.

FTR344 Professional Practice II (0-0-0-4):
This course provides students with the opportunity to apply their theoretical knowledge and practical skills in a clinical setting. It includes case evaluation, skill application, analysis, and discussion under supervision. It focuses on planning, observing, and practicing physiotherapy and rehabilitation programs.

FTR350 Vocational Rehabilitation (2-0-2-2):
This course aims to explain assessment methods such as job analysis, work capacity, and ergonomic analysis, as well as evaluation and training methods used in vocational rehabilitation, job training, workplace modifications, and the roles of the rehabilitation team and physiotherapists.

FTR352 Hand and Upper Extremity Rehabilitation (2-0-2-2):
The aim is to provide knowledge and skills in identifying common problems of the hand and upper extremities, conducting physiotherapy-specific evaluations, and implementing rehabilitation. It includes evaluation methods, treatment approaches for fractures, tendon and nerve injuries, burn rehabilitation, and common shoulder disorders.

FTR346 Special Topics in Physiotherapy (2-0-2-3):
This course aims to provide knowledge in specialized fields of physiotherapy such as burns, facial paralysis, cancer, hemophilia, and hippotherapy. It includes special assessment and treatment approaches in these areas.

FTR431 Clinical Practice I (0-24-12-20):
The aim of this course is to develop students' practical skills in assessment, treatment, and analysis of patients, communication with other health professionals, and multidisciplinary teamwork. Training is conducted in relevant departments such as neurological, orthopedic, cardiac, surgical, and pediatric rehabilitation, each for four weeks under supervision.

FTR433 Clinical Problem Solving I (2-0-2-2):
The aim of the course is for students to holistically evaluate theoretical knowledge, identify patients' primary problems, define them according to ICF, and select evidence-based treatment approaches through reasoning. It focuses on developing patient-centered clinical problem-solving skills through case discussions.

FTR435 Research Methods in Physiotherapy I (2-0-2-2):
This course aims to equip students with research planning and literature review skills. Topics include identifying keywords, selecting high-quality publications, reading systematic reviews, researching in databases such as PEDro and PubMed, and understanding the evidence pyramid.

FTR437 Biostatistics (1-1-2-2):
This course aims to provide students with fundamental knowledge of statistical concepts, descriptive statistics, table and graph creation and interpretation, and basic statistical analysis skills. Topics include sampling methods, hypothesis testing, and correlation.

FTR439 Professional English I (2-0-2-2):
This course aims to develop English communication skills for the professional environment. It includes domain-specific vocabulary, patient dialogues, and the ability to read, comprehend, and speak on physiotherapy-related texts in both written and audio formats.

FTR443 Entrepreneurship in Health Sector (2-0-2-2):
The main objective of this course is to provide students with fundamental knowledge of entrepreneurship, teach how creative and innovative ideas can be transformed into businesses, and explore the conditions and opportunities for entrepreneurship in the health sector. It also focuses on developing students' critical thinking, inquiry, and productivity skills for real-life entrepreneurial activities.

FTR445 Artificial Intelligence in Healthcare (2-0-2-2):
This course introduces physiotherapy students to basic concepts and applications of artificial intelligence (AI) in the healthcare sector, with a focus on enhancing physiotherapy practices. Students will learn about various AI tools and technologies that revolutionize patient care, diagnosis, treatment planning, and personalized medicine. Ethical considerations, data management, and future implications of AI in physiotherapy are also discussed.

FTR432 Clinical Practice II (0-24-12-20):
The objective of this course is to enable students to perform patient assessment, treatment, and analysis, enhance their practical skills, and develop communication and multidisciplinary collaboration competencies. The course involves four-week clinical rotations in departments such as neurological rehabilitation, orthopedic rehabilitation, cardiac and surgical rehabilitation, pediatric rehabilitation, and physical medicine under the supervision of physiotherapists.

FTR434 Clinical Problem Solving II (2-0-2-2):

The aim of this course is to help students integrate theoretical knowledge to identify the primary problem of the patient, define problems according to ICF, and reason evidence-based treatment approaches. In-class clinical case discussions focus on developing patient-centered clinical problem-solving skills.

FTR436 Research Methods in Physiotherapy II (2-0-2-2):
This course aims to enhance students' skills in conducting and planning research and performing literature reviews. Topics include identifying keywords, selecting qualified publications, reading systematic reviews, searching databases such as PEDro and PubMed, and understanding the evidence hierarchy.

FTR438 Radiology (2-0-2-2):
The course provides general knowledge of fundamental concepts in radiology, basic principles of radiography, CT, and MRI, and radiological anatomy and pathologies of extremities, spine, and thorax. It covers the physical principles of imaging, regional evaluations, and assessments of various tissue pathologies.

FTR440 Professional English II (2-0-2-2):
The aim of this course is to further develop students' English communication skills in a clinical setting. It includes domain-specific vocabulary, patient dialogues, and skills in reading, understanding, and speaking about written and audio physiotherapy content.

FTR442 Innovation and Entrepreneurship in Physiotherapy (2-0-2-2):
The course aims to raise awareness about innovation and entrepreneurship and introduce practical applications for students' career development. Topics include examination of innovations in different fields, adaptation to physiotherapy, entrepreneurship examples, project writing, and patent application processes.