

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Biomechanics / PTT101	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
Theoretical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
• Know the types and analysis of movement in the human body	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives 1. .Defining the natural laws affecting the movement of the human body 2. .Defining the factors that help analyze the movement of the human body 3. Iron deficiency or imbalance in body movement and how to return it to a .normal state	
.B . Course-specific skills objectives Conducting scientific research experiments represented in kinetic analysis . bilateral Three- dimensional and some physical and physical measurements	

Teaching students and developing their abilities and skills in conducting motion analysis experiments on cameras and advanced analysis programs and .conducting physical and physical measurements

Holding educational and training courses and seminars to qualify cadres on .3 .how to use the equipment inside the laboratory

Contributing with other parties concerned with preventing sedentary .4 .diseases through sports programs

Teaching and learning methods

In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

.C. Emotional and value goals

C1 . The ability to communicate effectively with those involved in the field of .specialization

.C2 . Recognizing the need and ability to engage in lifelong education

. C3 . Knowledge of contemporary issues in the field of specialization

C4 . The broad education necessary to understand solutions at the global level and to economic, environmental, and social problems to provide health institutions with the specializations they need in rehabilitation and treatment .of patients in specialized hospitals and consulting clinics

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation . projects. Field visits and practical training for clinical subjects

• Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson . in the hospital

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development

- .D1 . Cooperation skills and teamwork**
- .D2 . Computer typing skills**
- .D3 . Communication skills in English**
- .D4 . Ability to perform work and solve problems**
- . D5 . Internet conversation skills**

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Basic Concepts in Biomechanics: Kinematics and Kinetics (Types of Motion, Location of Motion, Direction of Motion, Magnitude of Motion, Definition of Forces, Force of Gravity)	Accompanied by arousal	2 Theoretical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Basic Concepts in Biomechanics: Kinematics and Kinetics (Reaction forces, Equilibrium, Objects in Motion, Force of friction, Concurrent force systems, Parallel force systems, Work)		2 Theoretical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Basic Concepts in Biomechanics: Kinematics and Kinetics (Moment arm of force, Force components, Equilibrium of levers , Supporting base, types, and equilibrium in static and dynamic state)		2 Theoretical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle structure and function: Mobility and stability functions of muscles, Elements of muscle structure, Muscle function, Effects of immobilization, and aging		2 Theoretical	the fourth
,Reports oral and written	,Blackboard power point ,slides	Levers - Definition, function, classification and		2 Theoretical	Fifth

theoretical examinations	practical experiments	application of levers in physiotherapy & order of levers with example of lever in human body			
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Elasticity - Definition, stress, strain, HOOKE'S Law		2 Theoretical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscular System : Definition, properties of muscle, muscular contraction, structural classification, action of muscle in moving bone, direction of pull, angle of pull, functional classification, coordination of muscular system.		2 Theoretical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscular System : Definition, properties of muscle, muscular contraction, structural classification, action of muscle in moving bone, direction of pull, angle of pull, functional classification, coordination of muscular system.		2 Theoretical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Joint Structure and Function: Describe the basic principles of joint design and a human joint, Describe the tissues present in human joints, including dense fibrous tissue, bone,		2 Theoretical	Ninth

		cartilage and connective tissues.			
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Joint Structure and Function: Describe the basic principles of joint design and a human joint, Describe the tissues present in human joints, including dense fibrous tissue, bone, cartilage and connective tissues.		2 Theoretical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Joint Structure and Function: Classify joints: Synarthrosis, amphiarthrosis, diarthrosis, subclassification of synovial joints.		2 Theoretical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Joint Structure and Function: Describe joint functions, kinematics, range of motion, Describe the general effects of injury and disease.		2 Theoretical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Posture – dynamic and static posture, kinetic and kinematics of posture, analysis of posture, effect of age, pregnancy, occupation on posture.		2 Theoretical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Gait – kinematics and kinetics of gait, gait in running and stair climbing.		2 Theoretical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Revision		2 Theoretical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

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Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Introduction to Physical Therapy / PTT104	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
theoretical + 4 practical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
• Introducing students to the profession of physical therapy and directing them to it	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives	
1. .The importance of applying physical therapy to improve human health	
2. Describe the basic elements of the physical therapy process and their application to pathological conditions	
3. .Define and use basic terminology in physical therapy	
4. .Knowledge of daily vital activities	
5. .Respect patients' privacy	

.B . Course-specific skills objectives

Understanding the concepts and principles of physical therapy and applying -1 them to patients.

- Gain effective communication skills with patients and colleagues in the medical field**
- Developing clinical assessment skills for patients, including medical history and physical examination.**
- Learn about training and exercise techniques appropriate for various health conditions.**
- Understanding the foundations and principles of designing effective physical therapy programs.**
- Develop the ability to provide guidance and advice to patients regarding correct posture and safe movement.**

Teaching and learning methods

In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

C. Emotional and value goals

C1 . Building internal and positive confidence towards the ability to provide care and treatment to patients, and achieving personal satisfaction by providing the assistance and care necessary to improve their health and well-being

C2 . Analyzing the problems facing its employees and how to develop the .necessary solutions

.C3 . Working in a team spirit among different cadres

. C4 . Accommodating the suffering of patients and alleviating their pain

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation projects

. Field visits and practical training for clinical subjects

- Evaluation methods**

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson . in the hospital

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

.D3 . Communication skills in English

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	History of physiotherapy.	Accompanied by arousal	2 theoretical 4 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Terminology in physiotherapy.		2 theoretical 4 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Definition and epidemiology of disability, impairment and handicap. Process of disability.		2 theoretical 4 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The concept of team approach		2 theoretical 4 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The role of the physiotherapist in the current changes in health care.		2 theoretical 4 + practical	Fifth

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Define levels of care within the delivery system		2 theoretical 4 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Disability prevention and principles of physiotherapy.		2 theoretical 4 + practical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Understanding of the organization of physical therapy services (prevention, treatment and restoration).		2 theoretical 4 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The role of both non-verbal and verbal communication in physiotherapy		2 theoretical 4 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The importance of patient and family education and the impact of patient and family education on physiotherapy outcomes.		2 theoretical 4 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Activities of daily living, functional assessment, training for functional independence.		2 theoretical 4 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction to occupational therapy.		2 theoretical 4 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The physiology and consequences of aging.		2 theoretical 4 + practical	Thirteenth
,Reports oral and written	,Blackboard power point ,slides	Patient privacy.		2 theoretical	fourteenth

theoretical examinations	practical experiments			4 + practical	
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Revision.		2 theoretical 4 + practical	Fifteenth

• Infrastructure	
	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan
Updating the course periodically in order to add materials that are in line . with modern scientific development

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Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Principles of Physiology / PTT105	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
theoretical + 4 practical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared

- **Course objectives**

1- .Acquiring the skill in addition to information related to the medical condition

- **Course outcomes and teaching, learning and evaluation methods**

a . Cognitive objectives

The cognitive objectives of studying Medical Physiology in the Department of Physiotherapy Techniques include providing students with in-depth and comprehensive knowledge about how biological systems in the human body function under normal conditions and how illness or injury affects these :functions. The following are basic cognitive objectives in this field

Understanding normal functions: Learn how various body systems function .1 .under normal conditions

**Physiological mechanisms: Understanding the mechanisms of physiological .2
.regulation and how to control the internal environment of the body**

**Stress response: Understanding how the body adapts to different stressors .3
.such as trauma, infection, and environmental changes**

**Impact of Diseases: Learn the physiological changes that occur during .4
.illness or injury and how they affect bodily systems**

**Integration between systems: Understanding how different physiological .5
.systems interact and function in an integrated manner**

**By achieving these cognitive goals, physical therapy techniques students gain
the cognitive foundation necessary to understand the physiological needs of
their patients and how to use this knowledge to improve physical therapy and
.rehabilitation outcomes**

.B . Course-specific skills objectives

**The skill objectives for studying medical physiology in the Department of
Physical Therapy Techniques revolve around developing practical skills that
can be used in evaluating and managing patients' conditions, and improving
:the physical therapy process. Here are some main goals**

**Assessment skills: Develop the ability to perform an accurate physiological .1
.assessment of patients, using various assessment tools and equipment**

**Application of measurements: the ability to interpret physiological data and .2
.use it in planning treatment**

**Intervention skills: The ability to design and implement physical therapy .3
.plans based on an understanding of the physiology of different conditions**

**Therapeutic Responses: Learn how to modify physical therapy interventions .4
.based on the patient's physiological responses**

**Manual skills: Acquiring specialized manual skills in dealing with .5
.therapeutic exercises and other techniques based on physiological principles**

**By achieving these skill objectives, physical therapy technology graduates
,become equipped with practical skills necessary to provide high-quality
.effective care based on a thorough understanding of medical physiology**

Teaching and learning methods

In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

C. Emotional and value goals

The affective and value-based objectives of studying medical physiology in the Department of Physiotherapy Techniques involve developing personal values and attitudes that promote the practice of the profession in a humane and :ethical manner. These goals include

Commitment to quality health care: enhancing the sense of responsibility .1 towards providing the best possible care while maintaining the physiological .safety of patients

Empathy and understanding: Develop empathy and the ability to .2 .understand human experiences and the personal challenges that patients face

Academic and professional integrity: Forming ethical habits in learning and .3 .practice that protect the credibility of the profession

Respect for self and others: Instill respect for self and humanity in all .4 .interactions with patients and colleagues

Accountability: Emphasizing the high value of personal accountability in .5 .making treatment decisions based on accurate physiological knowledge

By achieving these goals, students are able to apply knowledge of medical physiology in a way that is compassionate, compassionate, and responsible .toward their patients

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation projects . Field visits and practical training for clinical subjects

• Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical

**condition, with practical discussions followed by the practical lesson
in the hospital**

Dr . Transferable general and qualifying skills (other skills related to

.(employability and personal development

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

.D3 . Communication skills in English

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Reproductive System: 1. Sex determination and development, Puberty. 2. Male sex hormones and their functions, spermatogenesis.	Accompanied by arousal	2 theoretical 4 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Reproductive System: 3. Female sex hormones and functions, menstrual cycle, ovulation and contraceptives. 4. Pregnancy, functions of placenta and lactation		2 theoretical 4 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Excretory System: 1. Gross and minute structure of Kidney and features of Renal circulation. 2. Mechanism of formation of Urine, GFR and Tubular function.		2 theoretical 4 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Excretory System: 3. Renal function. 4. Physiology of Micturition		2 theoretical 4 + practical	the fourth

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle and Nerve: 1. Structure of Neurons, membrane potential and generation of action potential. 2. Nerve impulse conduction, saltatory conduction.		2 theoretical 4 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle and Nerve: 3. Neuromuscular junction and drugs acting on it – Myasthenia. 4. Degeneration and regeneration in peripheral nerves – Wallerian degeneration of electrotonus and flaggers Law.		2 theoretical 4 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle: 1. Type of muscles and their gross structure, stimulus chronaxie, strength duration curve. 2. Structure of sarcomere – Basis of muscle contraction, Starling's Law and changes during muscle contraction		2 theoretical 4 + practical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle: 3. Electrical – Biphasic and monophasic action potentials. 4. Chemical, thermal and physical changes, isometric and isotonic contraction.		2 theoretical 4 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle: 5. Motor units and its properties, Clonus, Tetanus, All or None Law, Beneficial Effect. 6. Nature of Voluntary		2 theoretical 4 + practical	Ninth

		contraction, Fatigue.			
,Reports oral and written theoretical examination s	,Blackboard power point ,slides practical experiments	Nervous System: 1. Types and properties of receptors, types of sensations. 2. Structure of Synapses, Reflex and its properties, occlusion summation, sub minimal fringe , etc.		2 theoretical 4 + practical	The tenth
,Reports oral and written theoretical examination s	,Blackboard power point ,slides practical experiments	Nervous System: 3. Tracts of Spinal Cord. 4. Descending, pyramidal and extra pyramidal tracts.		2 theoretical 4 + practical	eleventh
,Reports oral and written theoretical examination s	,Blackboard power point ,slides practical experiments	Nervous System: 5. Hemi section and complete section of spinal cord, upper and lower motor neuron paralysis. 6. Cerebral cortex – areas and functions, EEG		2 theoretical 4 + practical	twelveth
,Reports oral and written theoretical examination s	,Blackboard power point ,slides practical experiments	Nervous System: 7. Structure, connections and functions of Cerebellum. 8. Connections and functions of Basal Ganglia and Thalamus		2 theoretical 4 + practical	Thirteenth
,Reports oral and written theoretical examination s	,Blackboard power point ,slides practical experiments	Nervous System: 9. Reticular formation, tone, posture and balance. 10. Autonomic nervous system.		2 theoretical 4 + practical	fourteenth
,Reports oral and written theoretical examination s	,Blackboard power point ,slides practical experiments	Revision		2 theoretical 4 + practical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

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Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Human physiology / PTT106	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
theoretical + 4 practical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
2- .Acquiring the skill in addition to information related to the medical condition	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives The cognitive objectives of studying Medical Physiology in the Department of Physiotherapy Techniques include providing students with in-depth and comprehensive knowledge about how biological systems in the human body function under normal conditions and how illness or injury affects these :functions. The following are basic cognitive objectives in this field Principles of Physical Therapy: Application of physiological knowledge in . 1 .physical therapy and rehabilitation techniques	

**Functional Assessment: Learn how to evaluate body functions and develop . 2
.physical therapy plans based on this assessment**

**Understanding drug interactions: Knowledge of how medications affect the . 3
.body's physiology and how they can affect the results of physical therapy**

**Scientific Evidence-Based Learning: Conduct research and interpret . 4
literature to stay up to date with the latest principles and practices in
.physiology**

**Communication Skills: Develop reasonable communication ability to . 5
.explain physiology to patients in an easy-to-understand manner**

**By achieving these cognitive goals, physical therapy techniques students gain
the cognitive foundation necessary to understand the physiological needs of
their patients and how to use this knowledge to improve physical therapy and
.rehabilitation outcomes**

.B . Course-specific skills objectives

**The skill objectives for studying medical physiology in the Department of
Physical Therapy Techniques revolve around developing practical skills that
can be used in evaluating and managing patients' conditions, and improving
:the physical therapy process. Here are some main goals**

**Functional Training: The ability to use function-enhancing and healing . 1
.techniques based on physiological knowledge**

**Professional Communication: Develop the ability to explain physiological . 2
concepts clearly and professionally to other members of the health care team
.and to patients**

**Research skills: The ability to participate in scientific research activities to . 3
develop a deeper understanding of physiology and its applications in physical
.therapy**

**Technology use skills: Learn to use modern technologies in assessing . 4
.physiological functions and implementing treatments**

**Analysis and deduction: The ability to analyze complex health conditions . 5
.and devise appropriate treatment strategies**

**By achieving these skill objectives, physical therapy technology graduates
,become equipped with practical skills necessary to provide high-quality
.effective care based on a thorough understanding of medical physiology**

Teaching and learning methods

**In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects
. Scientific visits and practical training in hospitals by specialized medical staff**

Evaluation methods

**Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during
. the lesson**

C. Emotional and value goals

The affective and value-based objectives of studying medical physiology in the Department of Physiotherapy Techniques involve developing personal values and attitudes that promote the practice of the profession in a humane and :ethical manner. These goals include

**Continuing professional development: Encouraging the motivation for . 1
continuous learning and diligence in staying up to date with the latest
.developments in the field of medical physiology**

**Teamwork: Encouraging teamwork in a multidisciplinary context, which . 2
.helps achieve better patient outcomes**

**Flexibility: Develop the ability to adapt to professional challenges and . 3
.changes in patients' health conditions**

**Sense of initiative: instilling self-confidence and courage to take appropriate . 4
.action at the right time**

**Cultural and Social Awareness: Develop awareness and sensitivity to . 5
.cultural and social differences that may impact health care**

**By achieving these goals, students are able to apply knowledge of medical physiology in a way that is compassionate, compassionate, and responsible
.toward their patients**

Teaching and learning methods

**(In-person lectures), summer and vocational training, and graduation projects
. Field visits and practical training for clinical subjects**

• **Evaluation methods**

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.D1 . Cooperation skills and teamwork

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. D5 . Internet conversation skills

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,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Excretory System: 1. Gross and minute structure of Kidney and features of Renal circulation. 2. Mechanism of formation of Urine, GFR and Tubular function.		2 theoretical 4 + practical	the third

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,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Muscle and Nerve: 1. Structure of Neurons, membrane potential and generation of action potential. 2. Nerve impulse conduction, saltatory conduction.		2 theoretical 4 + practical	Fifth
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,Reports oral and written	,Blackboard power point ,slides	Muscle: 5. Motor units and its properties, Clonus,		2 theoretical	Ninth

theoretical examinations	practical experiments	Tetanus, All or None Law, Beneficial Effect. 6. Nature of Voluntary contraction, Fatigue.		4 + practical	
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Nervous System: 1. Types and properties of receptors, types of sensations. 2. Structure of Synapses, Reflex and its properties, occlusion summation, sub minimal fringe , etc.		2 theoretical 4 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Nervous System: 3. Tracts of Spinal Cord. 4. Descending, pyramidal and extra pyramidal tracts.		2 theoretical 4 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Nervous System: 5. Hemi section and complete section of spinal cord, upper and lower motor neuron paralysis. 6. Cerebral cortex – areas and functions, EEG		2 theoretical 4 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Nervous System: 7. Structure, connections and functions of Cerebellum. 8. Connections and functions of Basal Ganglia and Thalamus		2 theoretical 4 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Nervous System: 9. Reticular formation, tone, posture and balance. 10. Autonomic nervous system.		2 theoretical 4 + practical	fourteenth
,Reports oral and written	,Blackboard power point ,slides	Revision		2 theoretical	Fifteenth

theoretical examinations	practical experiments			4 + practical	
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• Infrastructure	
	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan
Updating the course periodically in order to add materials that are in line with modern scientific development

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Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Kinesiology / PTT102	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
Theoretical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
.Knowing the types and analysis of advanced movement in the human body and how to deal with it	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives .A1 . Defining the natural laws affecting the movement of the human body .A2 . Defining the factors that help analyze the movement of the human body	
.B . Course-specific skills objectives B 1 . Identifying the deficiency or defect in body movement and how to return it to a normal state .B 2. Knowing the specific exercises for each of the different body movements	

Teaching and learning methods

In-person education (scientific films and videos, summer and vocational (training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

C. Emotional and value goals

C1 . So that the student acquires the concepts and basics of movement in the .human body

C2 . Analyzing the problems facing its employees and how to develop the .necessary solutions

.C3 . Working in a team spirit among different cadres

. C4 . Accommodating the suffering of patients and alleviating their pain

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation projects . And field visits

- Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson . in the hospital

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

.D3 . Communication skills in English

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written	,Blackboard power point slides	peripheral joints The shoulder complex: Structure	Accompanied by arousal	2 Theoretical 1	the first

theoretical examinations		and components of the shoulder complex and their integrated function			
,Reports oral and written theoretical examinations	,Blackboard power point slides	The elbow complex: Structure and function of the elbow joint – humeroulnar and humeroradial articulations, superior and inferior radioulnar joints; mobility and stability of the elbow complex; the effects of immobilization and injury.		2 Theoretical	the second
,Reports oral and written theoretical examinations	,Blackboard power point slides	The wrist and hand complex: Structural components and functions of the wrist complex; structure of the hand complex; prehension; functional position of the wrist and hand.		2 Theoretical	the third
,Reports oral and written theoretical examinations	,Blackboard power point slides	The hip complex: Structure and function of the hip joint; hip joint pathology - arthrosis, fracture, bone abnormalities of the femur.		2 Theoretical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point slides	The knee complex: Structure and function of the knee joint – tibiofemoral joint and patellofemoral joint; effects of injury and disease.		2 Theoretical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point slides	The ankle and foot complex.: structure and function of the ankle joint, subtalar joint, talocalcaneonavicular joint, transverse tarsal joint, tarsometatarsal joints, metatarsophalangeal joints, interphalangeal joints, structure and function of the plantar arches, muscles of the ankle and foot, deviations from normal structure and function – Pes Planus and Pes Cavus		2 Theoretical	VI
,Reports oral and written theoretical	,Blackboard power point slides	The ankle and foot complex.: structure and function of the ankle joint, subtalar joint, talocalcaneonavicular joint, transverse tarsal		2 Theoretical	Seventh

examinations		joint, tarsometatarsal joints, metatarsophalangeal joints, interphalangeal joints, structure and function of the plantar arches, muscles of the ankle and foot, deviations from normal structure and function – Pes Planus and Pes Cavus			
,Reports oral and written theoretical examinations	,Blackboard power point slides	Thorax and Chest wall: General structure and function, Rib cage and the muscles associated with the rib cage, Ventilatory movements: its coordination and integration, Developmental aspects of structure and function, Changes in normal structure and function I relation to pregnancy, scoliosis and COPD		2 Theoretical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point slides	Thorax and Chest wall: General structure and function, Rib cage and the muscles associated with the rib cage, Ventilatory movements: its coordination and integration, Developmental aspects of structure and function, Changes in normal structure and function I relation to pregnancy, scoliosis and COPD		2 Theoretical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Temporomandibular Joint: General features, structure, function and dysfunction		2 Theoretical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Gait: Define, the stance, swing and double support phases of gait, the sup-division of the stance and swing phases of gait, the time and distance parameters of gait		2 Theoretical	elevanth

,Reports oral and written theoretical examinations	,Blackboard power point slides	Gait: Joint motion at the hip, knee and ankle for one extreme during a gait cycle. The location of line of gravity in relation to the hip, knee and ankle during the stance phases of gait. The gravitational moments of force acting at the hip, knee and ankle during the stance phase.		2 Theoretical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Gait: Muscle activity at the hop, knee and ankle throughout the gait cycle, including why and when a particular muscle is active and the type of construction required. The role of each of the determinants of gait.		2 Theoretical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Gait: The muscle activity that occurs in the upper extremity and trunk. Pathological gaits and gait deviations		2 Theoretical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Revision		2 Theoretical	Fifteenth

• **Infrastructure**

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• **Course development plan**

**Updating the course periodically in order to add materials that are in line
. with modern scientific development**

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Clinical Chemistry / PTT109	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
2 theoretical + 4 practical	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
3- Acquiring the skill in addition to information related to the medical condition	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives The cognitive objective of studying clinical chemistry in the Department of Physiotherapy Techniques includes understanding the chemical and biochemical processes that occur in the body, and how these processes affect the health and treatment of patients . Other goals include: 1. Understanding the chemical composition of the body: Identifying the basic chemical components such as proteins, fats, carbohydrates, and vitamins and their role in maintaining health.	

- 2. Clinical tests:** Learn how to conduct and interpret various clinical chemical tests that help diagnose diseases and follow the course of treatment.
- 3. The relationship of chemistry to physical therapy:** Understanding how chemical changes in the body can affect functional performance and recovery, and how physical therapy can interfere with these processes.
- 4. Integrating chemical knowledge into therapeutic practices:** Using clinical chemistry knowledge to improve physical therapy techniques and develop personalized treatment programs for each patient.
- 5. Clinical decision making:** Developing the ability to evaluate clinical chemical data and use it effectively in making medical decisions regarding physical therapy.

This comprehensive understanding helps students in physical therapy techniques communicate better with the patient care team and contribute more to the patient's overall treatment plan

.B . Course-specific skills objectives

objectives of studying clinical chemistry in the Department of Physical Therapy Techniques focus on enabling the student to carry out several practical and applied activities. Here are some of these goals:

- 1. Sample Analysis Skills:** Learn how to properly collect and prepare biological samples for chemical analysis.
- 2. Operating laboratory equipment:** Gaining the ability to deal with laboratory devices and techniques used in clinical chemistry, such as spectrometers and blood chemical analyzers.
- 3. Laboratory technical skills:** developing the ability to conduct biochemical tests and interpret their results accurately.
- 4. Laboratory safety skills:** understanding and applying biological and chemical safety rules within the laboratory.
- 5. Evaluation and analysis of results:** Developing skills in evaluating clinical chemical results and linking them to the patient's health status.
- 6. Critical Thinking and Problem Solving:** Enhance the ability to think critically in analyzing chemical data and its application in physical therapy situations.
- 7. Effective Communication:** Improve communication skills with other members of the medical team and with patients in an effective manner, especially when explaining procedures and results.

8. Continuing Education: Encouraging students to continue their education and professional development in the field of clinical chemistry and physical therapy.

Training in these skills prepares students to become qualified professionals able to support healthcare teams and improve the quality of physical therapy provided to patients

Teaching and learning methods

**In-person education (scientific films and videos, Laboratories, summer and vocational training, and graduation projects
. Scientific visits and practical training in hospitals by specialized medical staff**

Evaluation methods

**Daily tests, semester exams - final exams, weekly reports within the subject, seminars
. within the academic subjects , discussions and conversations during the lesson**

C. Emotional and value goals

,Emotional and ethical goals are an essential part of the educational process especially in a field such as clinical chemistry related to physical therapy. Here are some of these goals:

- 1. Respect for biological and biological diversity: Appreciating the individual diversity of patients and understanding that biochemical differences need an individual approach to treatment.**
- 2. Professional responsibility: Developing a sense of responsibility as health care providers and paying attention to every detail in the treatment process.**
- 3. Empathy and compassion: Enhancing the feeling of empathy towards patients and developing the ability to communicate emotionally and support them psychologically**
.
- 4. Adherence to ethical standards: Adherence to ethical rules and a code of conduct to avoid harm and ensure the highest levels of patient care.**
- 5. Continuous development and passion for knowledge: Finding the motivation for continuous development and updating knowledge to provide the best possible treatment.**

We also work to instill value:

- 6. Appreciation of the importance of clinical chemistry: Develop an understanding of how clinical chemistry contributes to improving the quality of life for patients.**
- 7. Self-confidence and professionalism: Building confidence in personal abilities and acquired skills and acting professionally at all times.**
- 8. Teamwork and cooperation: Encouraging cooperation and teamwork between students of physical therapy and other health professions.**
- 9. Leadership: Encouraging the development of leadership and initiative skills in order to effectively contribute to improving health care practices.**

Through these compassionate and value-based goals, students are prepared to become professionals who strive for excellence in their field and are motivated to .make a positive difference in the lives of patients

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation projects
 . Field visits and practical training for clinical subjects

• Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with
 . practical discussions followed by the practical lesson in the hospital

- Dr . Transferable general and qualifying skills (other skills related to
 .(employability and personal development
 .D1 . Cooperation skills and teamwork
 .D2 . Computer typing skills
 .D3 . Communication skills in English
 .D4 . Ability to perform work and solve problems
 . D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	Blackboard, power point ,slides practical experiments	CELL	Accompanied by arousal	2 theoretical 4 + practical	the first
,Reports oral and written theoretical examinations	Blackboard, power point ,slides practical experiments	BODY FLUIDS		2 theoretical 4 + practical	the second
,Reports oral and written theoretical	Blackboard, power point ,slides practical	BIOMOLECULES: AMINO ACIDS, PEPTIDES & PROTEINS		2 theoretical 4 + practical	the third

examinati ons	experimen ts				
,Reports oral and written theoretical examinati ons	Blackboar d, power point ,slides practical experimen ts	BIOMOLECUL ES: AMINO ACIDS, PEPTIDES & PROTEINS		2 theoretical 4 + practical	the fourth
,Reports oral and written theoretical examinati ons	Blackboar d, power point ,slides practical experimen ts	ENZYMES		2 theoretical 4 + practical	Fifth
,Reports oral and written theoretical examinati ons	Blackboar d, power point ,slides practical experimen ts	CARBOHYDRA TES		2 theoretical 4 + practical	VI
,Reports oral and written theoretical examinati ons	Blackboar d, power point ,slides practical experimen ts	LIPIDS		2 theoretical 4 + practical	Seventh
,Reports oral and written theoretical examinati ons	Blackboar d, power point ,slides practical experimen ts	LIPIDS		2 theoretical 4 + practical	VIII
,Reports oral and written theoretical examinati ons	Blackboar d, power point ,slides practical experimen ts	NUCLEIC ACIDS		2 theoretical 4 + practical	Ninth
,Reports oral and written theoretical	Blackboar d, power point ,slides	NUTRITIONAL BIOCHEMISTR Y:		2 theoretical 4 + practical	The tenth

examinations	practical experiments	MINERALS & TRACE ELEMENTS			
,Reports oral and written theoretical examinations	Blackboard, power point, slides, practical experiments	NUTRITIONAL BIOCHEMISTRY: MINERALS & TRACE ELEMENTS		2 theoretical 4 + practical	eleventh
,Reports oral and written theoretical examinations	Blackboard, power point, slides, practical experiments	VITAMINS		2 theoretical 4 + practical	twelveth
,Reports oral and written theoretical examinations	Blackboard, power point, slides, practical experiments	NUTRITION		2 theoretical 4 + practical	Thirteenth
,Reports oral and written theoretical examinations	Blackboard, power point, slides, practical experiments	MOLECULAR BIOLOGY		2 theoretical 4 + practical	fourteenth
,Reports oral and written theoretical examinations	Blackboard, power point, slides, practical experiments	Revision		2 theoretical 4 + practical	Fifteenth

• **Infrastructure**

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

- **Course development plan**

**Updating the course periodically in order to add materials that are in line
. with modern scientific development**

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the .learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Medical Physics /110 PTT	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
2 theoretical + 4 practical	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
4- Acquiring the skill in addition to information related to the relationship of physics to .movement and its relationship to physical therapy	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives It involves understanding how physical laws apply to the human body and using physical therapies to improve health. Objectives include the following : 1. Understanding the scientific foundations and physical principles that are considered the basis of natural treatments. 2. Learn how to use physics-based medical machines and devices in physical therapy.	

3. Extrapolating how movement, forces, and pressure affect the human body.

4. Learn how to use heat, cold, ultrasound, and electricity therapy to manage patients' conditions.

5. Develop the ability to analyze data and conduct appropriate assessments to choose the optimal treatment.

Achieving these goals ensures students have the necessary skills to understand and apply medical physics competently in the physical therapy profession

.B . Course-specific skills objectives

The skills objectives for studying Medical Physics in the Department of Physiotherapy Techniques aim to develop a set of practical skills that enhance the student's ability to interact directly with patients and use different tools and technologies. These goals may include:

- 1. Mastering the use of specialized devices and tools in physical therapy.**
- 2. Apply therapeutic techniques based on physical principles safely and effectively.**
- 3. Developing effective communication skills with patients while providing physical treatments.**
- 4. Evaluating individual cases and determining appropriate doses for physical therapy using medical physics.**
- 5. Develop critical thinking and problem-solving skills associated with physical therapy.**
- 6. Learn how to perform tests and interpret results to evaluate the effectiveness of treatments.**

These skills help students become professionals who are able to work independently and contribute effectively to healthcare teams

Teaching and learning methods

In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

C. Emotional and value goals

The objectives of studying medical physics in the Department of Physiotherapy Techniques relate to developing the attitudes, values, and feelings of students towards their profession and their patients. Here are some of these goals:

- 1. Promoting a sense of professional and ethical responsibility in providing health care.**
- 2. Appreciate the importance of accuracy and attention to detail in therapeutic procedures.**
- 3. Self-development and the inclination for continuous learning to keep pace with developments in the medical and physical fields.**
- 4. Empathy with patients, understanding their needs, and the desire to improve their quality of life.**

5. Building work skills within a team through cooperation and sharing experiences and knowledge with colleagues.
6. Encouraging a positive attitude towards work, as well as passion and motivation to improve therapeutic practices.
7. Developing self-confidence and the ability to make balanced decisions in practical contexts.

Compassionate goals contribute to building professionals who are not only skilled but also .compassionate and prepared to work according to the highest standards of healthcare

(In-person lectures), summer and vocational training, and graduation projects
 . Field visits and practical training for clinical subjects

- Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson . in the hospital

- Dr . Transferable general and qualifying skills (other skills related to
 .(employability and personal development
 .D1 . Cooperation skills and teamwork
 .D2 . Computer typing skills
 .D3 . Communication skills in English
 .D4 . Ability to perform work and solve problems
 . D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ELECTRICITY AND MAGNETISM	Accompanied by arousal	2 theoretical 4 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	STATIC ELECTRICITY		2 theoretical 4 + practical	the second
,Reports oral and written theoretical	,Blackboard power point ,slides practical experiments	CURRENT ELECTRICITY		2 theoretical 4 + practical	the third

examinations					
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ELECTROMAGNETISM		2 theoretical 4 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ELECTRO MECHANICS		2 theoretical 4 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	CLASSIFICATION OF CURRENTS		2 theoretical 4 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	MEDIUM FREQUENCY CURRENT		2 theoretical 4 + practical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	HIGH FREQUENCY CURRENT		2 theoretical 4 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	SOUND WAVES		2 theoretical 4 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	HEAT		2 theoretical 4 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ELECTROMAGNETIC RADIATION		2 theoretical 4 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	SAFETY IN BIOMEDICAL INSTRUMENTS		2 theoretical 4 + practical	twelveth

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	RADIATION PROTECTION		2 theoretical 4 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	PRACTICAL		2 theoretical 4 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	PRACTICAL		2 theoretical 4 + practical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Principles of Microbiology / MTC101	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
theoretical + 4 practical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
• Knowing the history and branches of microorganisms and dealing with them through accurate diagnosis of the correlation with the effect on the body's systems, which helps the physical therapist to deal with such cases	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives	
1. Knowing the types of causes that cause injuries to the body	
2. .Genetic factors and chromosomal changes	
3. .The body's defense mechanism against pathogens	
4. .Some pathogens and how to prevent them	

.B . Course-specific skills objectives

- 6. Develop an understanding of the basics of microbiology and the research methods used in this field.**
- 7. Acquire technical skills in using the microscope and other laboratory tools used in analyzing live samples.**
- 8. ,Identify different types of microorganisms, including bacteria, viruses fungi, and parasites.**
- 9. Develop the ability to estimate the size, shape, and cellular composition .of living organisms using a microscope**

Teaching and learning methods

**In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects
 . Scientific visits and practical training in hospitals by specialized medical staff**

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

C. Emotional and value goals

- C1 . Achieve interest and positive interaction with biology Promoting awareness of the importance of microorganisms in daily life and understanding the vital role they play in the environment and public health**
- C2 . Analyzing the problems facing its employees and how to develop the .necessary solutions**
- .C3 . Working in a team spirit among different cadres**
- . C4 . Accommodating the suffering of patients and alleviating their pain**

Teaching and learning methods

**(In-person lectures), summer and vocational training, and graduation projects
 . Field visits and practical training for clinical subjects**

• Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson . in the hospital

Dr . Transferable general and qualifying skills (other skills related to
.(employability and personal development
.D1 . Cooperation skills and teamwork
.D2 . Computer typing skills
.D3 . Communication skills in English
.D4 . Ability to perform work and solve problems
. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Histo microbiology- History	Accompanied by arousal	2 theoretical 4 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Branches of Microbiology		2 theoretical 4 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Structure of Microbes		2 theoretical 4 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Morphology of bacteria		2 theoretical 4 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Requirement of Bacteria		2 theoretical 4 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Nutrition ((Autotrophic : Photoautotrophic, Chemoautotrophic) Heterotrophic)		2 theoretical 4 + practical	VI
,Reports oral and written theoretical	,Blackboard power point ,slides	Factors influencing growth (Physical factors + Chemical factors)		2 theoretical 4 + practical	Seventh

examinations	practical experiments				
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Physical and chemical methods		2 theoretical 4 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ANTIBIOTICS THE BASES OF CHEMOTHERAPY		2 theoretical 4 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Classification tissue / Nucleic acid / properties Tissue/		2 theoretical 4 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	growth curve		2 theoretical 4 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction to Biosafety and Security, The main components of bio risk management, Safety measures in all laboratories and laboratory design, General safety precautions, Personal protective equipment.		2 theoretical 4 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Biosafety level, risk assessment strategy, Hazard groups, biosafety levels and equipment, Standard practices required in biological laboratories.		2 theoretical 4 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The biological factors, Routes of infection, Risk group classification, Biosafety measures, Control of substances hazardous to health.		2 theoretical 4 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Revision		2 theoretical 4 + practical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Fundamentals of nursing and first aid / PTT103	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
2 theoretical + 3 practical	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
5- .Acquiring the skill in addition to information related to the medical condition	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives A1 . Knowledge of the practical practice of the nursing profession and how to solve problems .related to it A2 . How to treat the patient, as well as establishing an atmosphere of understanding and .cooperation between the patient and the therapist	
.B . Course-specific skills objectives .B 1 . How to measure vital signs .B 2. How to give injections and their types .B 3. Installation of a drug administration device (cannula)	

B 4. First aid (fractures, burns, suffocation, wounds, poisoning...etc.)

Teaching and learning methods

**In-person education (scientific films and videos, Laboratories, summer and vocational training, and graduation projects
. Scientific visits and practical training in hospitals by specialized medical staff**

Evaluation methods

**Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during
. the lesson**

C. Emotional and value goals

C1 . So that the student acquires the concepts and basics of nursing and first .aid

C2 . Analyzing the problems facing its employees and how to develop the .necessary solutions

.C3 . Working in a team spirit among different cadres

. C4 . Accommodating the suffering of patients and alleviating their pain

Teaching and learning methods

**(In-person lectures), summer and vocational training, and graduation projects
. Field visits and practical training for clinical subjects**

• Evaluation methods

**Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson
. in the hospital**

**Dr . Transferable general and qualifying skills (other skills related to
. (employability and personal development**

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

.D3 . Communication skills in English

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction Definition of first aid. Importance of first aid, Golden rules of first aid, Scope and concept of emergency.	Accompanied by arousal	2 theoretical 3 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies Burns & Scalds: Causes, Degrees of burns, First aid treatment, General treatment.		2 theoretical 3 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies <i>Poisoning:</i> Classification (irritants, acid, alkali, narcotics), Signs and symptoms. First aid treatment, general treatment.		2 theoretical 3 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies <i>Trauma due to foreign body intrusion:</i> Eye, ear, nose, throat, stomach and lungs.		2 theoretical 3 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies <i>Bites:</i> First aid, signs, symptoms and treatment. Dog bite: rabbit bite Snake bite: neurotoxin, bleeding diathesis Snake bite: neurotoxin, bleeding diathesis		2 theoretical 3 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Skeletal injuries Definition: Types of fractures of various parts of the body. Causes, Signs and Symptoms. Rules of treatment, transportation of patient with fracture and spinal cord injuries. First aid measures in dislocation of joints. Treatment of muscle injuries.		2 theoretical 3 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Respiratory emergencies: Asphyxia: Etiology, Signs & Symptoms, rules of treatment		2 theoretical 3 + practical	Seventh
,Reports oral and written	,Blackboard power point ,slides	Respiratory emergencies:		2 theoretical	VIII

theoretical examinations	practical experiments	Drowning: Definition and management.		3 + practical	
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Respiratory emergencies: Artificial respiration: Types and techniques.		2 theoretical 3 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Wounds and Hemorrhage Wounds: Classification, management		2 theoretical 3 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Wounds and hemorrhage Haemorrhages: Classification, signs and symptoms, rules for treatment of hemorrhage		2 theoretical 3 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Wounds and hemorrhage Treatment of hemorrhage from special areas (scalp, mouth, nose, ear, palm and various veins). Internal hemorrhages: Visible and concealed.		2 theoretical 3 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	F. Shock and unconsciousness Definition: Types of shock, Common causes of shock, signs and symptoms of shock (assessment of established shock). General and special treatment of established shock		2 theoretical 3 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Transportation of the injured 1. Methods of transportation: Single helper, Hand seat, Stretcher, Wheeled transport (ambulance). 2. Precautions taken: Blanket lift, Air and Sea travel		2 theoretical 3 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Revision		2 theoretical 3 + practical	Fifteenth

• **Infrastructure**

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

- **Course development plan**

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Fundamentals of nursing and first aid / PTT103	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
2 theoretical + 3 practical	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
6- .Acquiring the skill in addition to information related to the medical condition	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives A1 . Knowledge of the practical practice of the nursing profession and how to solve problems .related to it A2 . How to treat the patient, as well as establishing an atmosphere of understanding and .cooperation between the patient and the therapist	
.B . Course-specific skills objectives .B 1 . How to measure vital signs .B 2. How to give injections and their types .B 3. Installation of a drug administration device (cannula)	

B 4. First aid (fractures, burns, suffocation, wounds, poisoning...etc.)

Teaching and learning methods

**In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects
. Scientific visits and practical training in hospitals by specialized medical staff**

Evaluation methods

**Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during
. the lesson**

C. Emotional and value goals

C1 . So that the student acquires the concepts and basics of nursing and first .aid

C2 . Analyzing the problems facing its employees and how to develop the .necessary solutions

.C3 . Working in a team spirit among different cadres

. C4 . Accommodating the suffering of patients and alleviating their pain

Teaching and learning methods

**(In-person lectures), summer and vocational training, and graduation projects
. Field visits and practical training for clinical subjects**

• Evaluation methods

**Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson
. in the hospital**

**Dr . Transferable general and qualifying skills (other skills related to
. (employability and personal development**

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

.D3 . Communication skills in English

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction Definition of first aid. Importance of first aid, Golden rules of first aid, Scope and concept of emergency.	Accompanied by arousal	2 theoretical 3 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies Burns & Scalds: Causes, Degrees of burns, First aid treatment, General treatment.		2 theoretical 3 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies <i>Poisoning:</i> Classification (irritants, acid, alkali, narcotics), Signs and symptoms. First aid treatment, general treatment.		2 theoretical 3 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies <i>Trauma due to foreign body intrusion:</i> Eye, ear, nose, throat, stomach and lungs.		2 theoretical 3 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	First aid emergencies <i>Bites:</i> First aid, signs, symptoms and treatment. Dog bite: rabbit bite Snake bite: neurotoxin, bleeding diathesis Snake bite: neurotoxin, bleeding diathesis		2 theoretical 3 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Skeletal injuries Definition: Types of fractures of various parts of the body. Causes, Signs and Symptoms. Rules of treatment, transportation of patient with fracture and spinal cord injuries. First aid measures in dislocation of joints. Treatment of muscle injuries.		2 theoretical 3 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Respiratory emergencies: Asphyxia: Etiology, Signs & Symptoms, rules of treatment		2 theoretical 3 + practical	Seventh
,Reports oral and written	,Blackboard power point ,slides	Respiratory emergencies:		2 theoretical	VIII

theoretical examinations	practical experiments	Drowning: Definition and management.		3 + practical	
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Respiratory emergencies: Artificial respiration: Types and techniques.		2 theoretical 3 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Wounds and Hemorrhage Wounds: Classification, management		2 theoretical 3 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Wounds and hemorrhage Haemorrhages: Classification, signs and symptoms, rules for treatment of hemorrhage		2 theoretical 3 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Wounds and hemorrhage Treatment of hemorrhage from special areas (scalp, mouth, nose, ear, palm and various veins). Internal hemorrhages: Visible and concealed.		2 theoretical 3 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	F. Shock and unconsciousness Definition: Types of shock, Common causes of shock, signs and symptoms of shock (assessment of established shock). General and special treatment of established shock		2 theoretical 3 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Transportation of the injured 1. Methods of transportation: Single helper, Hand seat, Stretcher, Wheeled transport (ambulance). 2. Precautions taken: Blanket lift, Air and Sea travel		2 theoretical 3 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Revision		2 theoretical 3 + practical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

- **Course development plan**

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the .learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Fundamentals of Anatomy /PTT108	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
2 theoretical + 4 practical	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
• Learn the importance of anatomy and the location of organs for .the student in his field of specialization	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives	
1. .Gain knowledge of the structure of the human body in general	
2. .Knowledge of anatomical positions, terms and levels	
3. .Types of tissues	
4. Understanding the histological features of different organs	
5. .Identify muscle tissue and its types	
6. .Identify bones and their types	
7. .Identify joints and their types	
8. Identify the bones, muscles, and nervous system of the upper limb	

.B . Course-specific skills objectives

The general goal of teaching the basic sciences of the human -1 anatomy branch is to provide important scientific knowledge that involves knowing the structural structure of the body at the level of .systems, organs, and cells

Raising students' ability to link anatomical facts with clinical - 2 applications using radiographs, ultrasound, magnetic resonance .imaging, and histological slides

.Implementing professional and ethical education for students -3

Teaching and learning methods

In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during . the lesson

.C. Emotional and value goals

C1 . The ability to communicate effectively with those involved in the field of .specialization

.C2 . Recognizing the need and ability to engage in lifelong education

. C3 . Knowledge of contemporary issues in the field of specialization

C4 . The broad education necessary to understand solutions at the global level and to economic, environmental, and social problems to provide health institutions with the specializations they need in rehabilitation and treatment .of patients in specialized hospitals and consulting clinics

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation . projects. Field visits and practical training for clinical subjects

• Evaluation methods

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson . in the hospital

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development

- .D1 . Cooperation skills and teamwork**
- .D2 . Computer typing skills**
- .D3 . Communication skills in English**
- .D4 . Ability to perform work and solve problems**
- . D5 . Internet conversation skills**

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction: Define Anatomy and mention its sub-divisions, Name regions, cavities and systems of the body.	Accompanied by arousal	2 theoretical + 4 practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Histology: General Histology, study of the basic tissues of the body (classify and mention the microscopic structure of types of tissues) such as, Cell, Epithelium, Connective Tissue, Cartilage, Bone, Muscular tissue, Nerve Tissue – TS & LS, Circulatory System – large sized artery, medium sized artery, large sized vein, lymphoid tissue, Skin and its appendages.		2 theoretical + 4 practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Osteology: Anatomical positions of the body, axes, planes, common anatomical terminologies (grooves, tuberosity, trochanters etc), Connective tissue classification,		2 theoretical + 4 practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Osteology: Bones Composition and functions, classification of types according to morphology and development, growth and repair, structure of long bone, vertebral column, types of vertebrae, bones of extremities and body landmarks		2 theoretical + 4 practical	the fourth

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Arthrology: Definitions, Classification of joints, Construction of joints, Motions of joints, Structure of fibrous, cartilaginous joints,		2 theoretical + 4 practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Arthrology: Blood supply and nerve supply of joints, articulations – articular surfaces, types of joints, motions of upper and lower extremities, trunk, head		2 theoretical + 4 practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Myology: Types of muscle tissue, Muscles of upper extremity, lower extremity, trunk, eye, face etc. origin, insertion, nerve supply and action (in detail)		2 theoretical + 4 practical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Myology of other systems: Cardiovascular system, Blood lymph, tissue fluid-characteristics, composition, and function, The heart-main arteries, veins, capillaries, Lymph circulation		2 theoretical + 4 practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Upper extremity		2 theoretical + 4 practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Pectoral region, Outline the features of pectoral region, Name and identify the sternum, clavicle, scapula and humerus. Outline the main features of the bones of shoulder girdle, Identify the parts, borders and surfaces of sternum. Identify the ends, surfaces, curves and other features of clavicle. Identify the borders, angles, surfaces, processes, fossae and other features of scapula.		2 theoretical + 4 practical	The tenth
,Reports oral and written theoretical	,Blackboard power point ,slides	Scapular region, Comprehend the main features of the muscle in the scapular region, State the layered		2 theoretical + 4	eleventh

examinations	practical experiments	arrangements of the muscles of the back, Name and identify the muscles of the scapular region. Mention their origin, insertion, nerve supply and actions, Demonstrate the bony landmarks of scapula, humerus and clavicle		practical	
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Shoulder Girdle, Comprehend the main features of the joints of the shoulder girdle. Name the joints of shoulder girdle. Identify the articular surfaces and name the ligaments and movements of sternoclavicular and acromioclavicular joints.		2 theoretical + 4 practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Shoulder Girdle, Mention the type of the joints. Demonstrate and name the movements of scapula. Mention the chief muscles producing these movements. Correlate movements of scapula. Assign functional roles of the articular disc, costoclavicular ligament of sternoclavicular joint and coracoclavicular ligament.		2 theoretical + 4 practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Shoulder joint, Mention the type, articular surfaces and ligaments of the shoulder joint.		2 theoretical + 4 practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Define and demonstrate the movements of the shoulder joint, Name and identify the chief muscles producing these movements. Mention the blood supply and nerve supply of this joint.		2 theoretical + 4 practical	Fifteenth

• **Infrastructure**

The presence of study halls

	And C and D specialized laboratories
	The presence of capable cadres

- **Course development plan**
- Updating the course periodically in order to add materials that are in line . with modern scientific development**

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the .learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Medical Microbiology / 4 PTT10	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
theoretical + 4 practical 2	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
7- .Acquiring the skill in addition to information related to the medical condition	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives The cognitive objectives of studying Medical Microbiology in the Department of Physiotherapy Techniques are mainly to give students the theoretical and scientific foundation they need to understand how different microbes, such as bacteria, viruses, fungi, and parasites, can affect human health and how to deal with them. Below is a breakdown of some of the main cognitive objectives: 1. Understanding the principles of medical microbiology: learning about the basic characteristics of microbes and how to classify them. 2. Knowledge of bacteriology and virology: Gain information about types of bacteria and viruses, their life cycles, and mechanisms of causing disease.	

3. Study prevention and control methods: understanding how to prevent the spread of infection and working to contain microbial infections in clinical settings.

4. Developing knowledge of infectious diseases: learning about various infectious diseases and their effect on the human body.

5. Laboratory techniques: Know how to perform and interpret laboratory tests to diagnose infections.

6. Clinical treatment and management: Understanding the different treatment options for infectious diseases.

7. Evaluating scientific information: Learn how to evaluate scientific literature and new research in the field of medical microbiology.

8. Application of Knowledge: The ability of students to apply their knowledge of medical microbiology to physical therapy practices.

9. Work within a multidisciplinary team : Learn how to work collaboratively with other health care professionals to provide comprehensive treatment to patients.

These cognitive objectives are essential to provide students with the necessary skills and knowledge to understand the impact of infectious diseases in the field of physical therapy and to enhance their ability to contribute effectively to the comprehensive health care of patients

.B . Course-specific skills objectives

The skill objectives for studying medical microbiology in the Department of Physiotherapy Techniques are focused on developing students' practical and technical abilities to deal with microorganisms and using these skills in their professional practice. Here are some of these goals:

1. Diagnostic skills : Develop the ability to correctly collect clinical samples and perform laboratory tests to diagnose infectious diseases.

2. Laboratory skills: Gain experience using a microscope, performing microbial cultures, and identifying organisms Microscopic.

3. Apply infection control procedures: Practice standard infection prevention procedures, including sterilization control and use of personal protective measures.

4. Analytical skills: Learning how to analyze laboratory test results and evaluate their suitability for clinical diagnosis.

5. Communication: Developing the ability to communicate effectively with health care teams and exchange information about diagnosis and treatment management of infected patients.

6. Integrated Clinical Skills: Learn how to integrate medical microbiology knowledge with clinical practice in physical therapy.

7. Self-assessment and continuous learning ability: Encourage students to self-assess their skills and identify the need for continuous learning for continuous improvement in clinical practice.

8. Research skills: Strengthening research capabilities to contribute to answering clinical questions and participating in scientific discoveries.

By developing these skills, physical therapy students have the tools to understand the vital role the microbiota plays in human health and develop prevention strategies and therapeutic interventions

Teaching and learning methods

In-person education (scientific films and videos, Laboratories, summer and (vocational training, and graduation projects

. Scientific visits and practical training in hospitals by specialized medical staff

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during the lesson

C. Emotional and value goals

The affective and ethical objectives of the study of Medical Microbiology in the Department of Physiotherapy Techniques are directed towards the development of attitudes and values that nourish ethical professional practice and promote responsible behaviour. The following are some of the pivotal objectives in this context:

- 1. Developing health awareness:** Developing a conscious attitude towards public health and the importance of infection prevention.
- 2. Appreciate the important role of microbes:** Learn to appreciate the effective role that microorganisms play in the environment and in human health.
- 3. Ethical development:** Encouraging ethical behaviors and commitment to scientific integrity while performing experiments and interpreting data.
- 4. Professional responsibility:** Promoting a sense of responsibility towards safe and effective health care.
- 5. Empathy and respect:** Developing empathy towards patients and respecting their right to privacy and decent treatment.
- 6. Self-learning and development:** Encouraging students to invest in self-learning and continuous familiarity with new developments in the field of microbiology.
- 7. Cooperation and teamwork:** Learn how to work within a team, where roles and experiences are integrated in order to achieve the best results for patients.

8. Respect for diversity and differences: Awareness of the importance of biological diversity and respect for cultural and individual differences among people.

9. Dealing with stress: Developing students' ability to deal with the stress that may arise while working in environments related to microbiology and infectious diseases.

10. Initiative and creativity: Encouraging students to take initiative and innovation in proposing solutions to challenges related to microbiology in the field of physical therapy.

This aspect of education focuses on developing the whole person, including his or her values and attitudes, in a way that enhances professional competence and contributes to the delivery of ethical and patient-friendly health care

Teaching and learning methods

(In-person lectures), summer and vocational training, and graduation projects
 . Field visits and practical training for clinical subjects

- Evaluation methods**

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson in the hospital

- Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development**
- .D1 . Cooperation skills and teamwork**
 - .D2 . Computer typing skills**
 - .D3 . Communication skills in English**
 - .D4 . Ability to perform work and solve problems**
 - . D5 . Internet conversation skills**

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction	Accompanied by arousal	2 theoretical 4 + practical	the first

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Classification		2 theoretical 4 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Sterilization & disinfection		2 theoretical 4 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	immunology		2 theoretical 4 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	immunology		2 theoretical 4 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Laboratory Diagnosis		2 theoretical 4 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Bacteriology		2 theoretical 4 + practical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Bacteriology		2 theoretical 4 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Viruses		2 theoretical 4 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Viruses		2 theoretical 4 + practical	The tenth
,Reports oral and written	,Blackboard power point ,slides	Mycology		2 theoretical	eleventh

theoretical examinations	practical experiments			4 + practical	
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Introduction to Biosafety and Security		2 theoretical 4 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Biosafety level, risk assessment strategy		2 theoretical 4 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	The biological factors		2 theoretical 4 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	Revision		2 theoretical 4 + practical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

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Northern Technical University/ Health and Medical Technical College / Al-Dur	<ul style="list-style-type: none">• Educational institution
Physical therapy techniques	<ul style="list-style-type: none">• Scientific department/center
Computer / MTCD101	<ul style="list-style-type: none">• Course name/code
In-person lectures	<ul style="list-style-type: none">• Available attendance forms
2024-2023	<ul style="list-style-type: none">• Semester/year
1 theoretical + 1 practical	<ul style="list-style-type: none">• Number of study hours (total)
2024/7/1	<ul style="list-style-type: none">• Date this description was prepared
<ul style="list-style-type: none">• Course objectives	
<ul style="list-style-type: none">• Providing the student with the skills of dealing with basic office applications and creating office files and documents. The use of the operating system as well as the basics of working within the digital environment	
<ul style="list-style-type: none">• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives Providing the student with knowledge in managing and using various computer -1 applications	
. B . Course-specific skills objectives Understand basic concepts in computer science and the history of the -1 development of computational technology	
<ul style="list-style-type: none">• Gain skills in using operating systems and office software such as Microsoft Office	

- **Develop online research skills and learn how to evaluate information sources on the web**

Teaching and learning methods

In-person education (scientific films and videos, laboratories)

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during the lesson

C. Emotional and value goals

C1 . Enhancing confidence in using technology and computing and achieving comfort and certainty in dealing with computer hardware and software

C2 . Analyzing the problems facing its employees and how to develop the necessary solutions

.C3 . Working in a team spirit among different cadres

. C4 . Accommodating the suffering of patients and alleviating their pain

Teaching and learning methods

(In-person lectures and practical training)

- **Evaluation methods**

'Daily, quarterly and final tests, submitting weekly reports Patients seminars , patient clinical follow-up reports, and practical discussions followed by the practical lesson in the hospital

Dr . Transferable general and qualifying skills (other skills related to employability and personal development

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

.D3 . Communication skills in English

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
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,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	اساسيات الحاسوب Computer Fundamentals مفهوم الحاسوب، اطوار دورة حياة الحاسوب تطور اجيال الحاسوب	Accompanied by arousal	1 theoretical 1 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	مزايا الحاسوب ومجالات استخدامه تصنيف الحاسوب من حيث الغرض والحجم ونوع البيانات		1 theoretical 1 + practical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	مكونات الحاسوب Computer Components مكونات الحاسوب الاجزاء المادية للحاسوب الكيانات البرمجية		1 theoretical 1 + practical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حاسوبك الشخصي مفهوم امن الحاسوب وتراخيص البرامج		1 theoretical 1 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	امان الحاسوب وتراخيص البرامج Computer Safety & Software Licences		1 theoretical 1 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	اخلاق العالم الالكتروني، اشكال التجاوزات، امن الحاسوب، خصوصية الحاسوب		1 theoretical 1 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	تراخيص برامج الحاسوب وانواعها، الملكية الفكرية، الاختراق الالكتروني، اهم برمجيات خبيثة، اهم الخطوات اللازمة للحماية من عمليات الاختراق، اضرار الحاسوب على الصحة		1 theoretical 1 + practical	Seventh

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	نظم التشغيل Operating Systems تعريف نظام التشغيل، الوظائف، الاهداف، التصنيف امثلة لبعض نظم التشغيل		1 theoretical 1 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	نظم التشغيل نظام التشغيل ويندوز 7		1 theoretical 1 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	مكونات سطح المكتب قائمة ابدأ شريط المهام		1 theoretical 1 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	المجلدات والملفات الايقونات		1 theoretical 1 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	اجراء عمليات على النوافذ خلفيات سطح المكتب		1 theoretical 1 + practical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	لوحة التحكم لوحة تحكم ويندوز "Control Panel " مجموعات)Category(1 theoretical 1 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	من لوحة التحكم Defragment تنظيم الملفات داخل الحاسوب، تنصيب البرامج وحذفها		1 theoretical 1 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	بعض الحالات والإعدادات الشائعة في الحاسوب، ادارة الطابعة ضبط الوقت والتاريخ، صيانة الاقراص الاولية		1 theoretical 1 + practical	Fifteenth

- **Infrastructure**

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

- **Course development plan**

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

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Northern Technical University/ Health and Medical Technical College / Al-Dur	<ul style="list-style-type: none">• Educational institution
Physical therapy techniques	<ul style="list-style-type: none">• Scientific department/center
Human Rights and Democracy /MTCD102	<ul style="list-style-type: none">• Course name/code
In-person lectures	<ul style="list-style-type: none">• Available attendance forms
2024-2023	<ul style="list-style-type: none">• Semester/year
Theoretical 2	<ul style="list-style-type: none">• Number of study hours (total)
2024/7/1	<ul style="list-style-type: none">• Date this description was prepared
<ul style="list-style-type: none">• Course objectives	
The Rights and Democracy course provides increased student awareness and training on the importance of active participation in aspects of life, such as .enhancing respect for general human rights principles in various aspects of life	
<ul style="list-style-type: none">• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives Increasing the student's knowledge of the theoretical conceptual aspect and the .historical development of the subject of human rights and democracy Developing the student's analytical and critical skills regarding the reality and future of human rights and democracy. Enabling students to understand the importance of education and its role in spreading the culture of human rights and democracy in building a civilized society based on good governance, of which one of its most important components is Belief in human rights	

.B. Course-specific skills objectives

- 1- **.Introducing the history of human rights and the stages of development**
- 2- **.Spreading culture and nurturing students from the Islamic side**
- 3- **How to preserve society and the country by strengthening the country's love for them**
- 4- **Identify the most important rights granted to them in accordance with international norms and laws**
- 5- **.Promoting citizenship among students**

Teaching and learning methods

Education is in-person

Evaluation methods

Daily tests, semester exams - final exams, weekly reports within the subject seminars within the academic subjects , discussions and conversations during the lesson

.C. Emotional and value goals

Teaching students to search for realistic problems, link them to the –C1 scientific material, and present them in a logical order and sequence

Urging students to be objective in discussions about the challenges – facing the country

Embodying the concept of freedom for students and clarifying wrong – practices, their consequences, and how to avoid them

. Giving the highest priority to the expression of rights –C2

. C3– Emphasizing the importance of human rights

. C4– Objectivity in discussions

Teaching and learning methods

(in-person lectures)

- **Evaluation methods**

Daily, quarterly and final exams, submitting weekly reports and patient seminars, and reports on monitoring the patients' clinical condition, with practical discussions followed by the practical lesson in the hospital

- Dr . Transferable general and qualifying skills (other skills related to
 .(employability and personal development
 .D1 . Cooperation skills and teamwork
 .D2 . Computer typing skills
 .D3 . Communication skills in English
 .D4 . Ability to perform work and solve problems
 . D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	التطور التاريخي لحقوق الانسان، حقوق الانسان في الحضارات القديمة	Accompanied by arousal	2 Theoretical	the first
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حقوق الانسان في الشرائع السماوية مع التركيز على حقوق الانسان في الإسلام		2 Theoretical	the second
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حقوق الانسان في العصور الوسطى والحديثة		2 Theoretical	the third
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	الاعتراف الاقليمي لحقوق الانسان على الصعيد الاوربي الامريكي والافريقي والاسلامي والعربي		2 Theoretical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	المنظمات غير الحكومية ودورها في حقوق الانسان (اللجنة الدولية للصليب الاحمر منظمه العفو الدولية منظمة مراقبة حقوق الانسان المنظمة العربية لحقوق الانسان)		2 Theoretical	Fifth

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حقوق الانسان في المواثيق الدولية والاقليمية والتشريعات الوطنية		2 Theoretical	VI
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حقوق الانسان في المواثيق الإقليمية (الاتفاقية الاوربية لحقوق الانسان الاتفاقية الامريكية لحقوق الانسان الميثاق الافريقي لحقوق الانسان والميثاق العربي لحقوق الانسان)		2 Theoretical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حقوق الانسان في التشريعات الوطنية (الدستور العراقي)		2 Theoretical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	اشكال واجيال حقوق الانسان (الحقوق الفردية والجماعية)		2 Theoretical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ضمانات حقوق الانسان وحمايتها على الصعيد الوطني		2 Theoretical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	ضمانات حقوق الانسان وحمايتها على الصعيدين الاقليمي والدولي		2 Theoretical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	تصنيف الحريات العامة (الأساسية والفردية حريه الامن والشعور بالاطمئنان حرية الذهاب والإياب والحرية الشخصية)		2 Theoretical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	الحريات الفكرية والثقافية (حرية الراي وحرية المعتقد وحرية التعليم)		2 Theoretical	Thirteenth

,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	حرية الصحافة حرية التجمع وحرية تشكيل الجمعيات		2 Theoretical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point ,slides practical experiments	التطور التاريخي لحقوق الانسان، حقوق الانسان في الحضارات القديمة		2 Theoretical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Physical education (sport)NTU113	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
theoretical + 1 practical 1	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
The student acquires motor skills	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives .Awareness of sports culture . A1 A2 . Providing students with sufficient information about gaming laws and explaining good .behavior when participating in races	
. B . Course-specific skills objectives .B 1 . Developing students' skills in different sports .B2. Knowledge of the laws and regulations for each game .B3. Developing and developing physical fitness and motor skills	

Teaching and learning methods

In-person education (scientific films and videos of sports training/field practices)

Evaluation methods

Daily tests, semester exams and final exams

C. Emotional and value goals

C1 . Providing training and gaming opportunities to apply technical aspects .for those with sports competencies

.C2 . Working in a team spirit among different cadres

Teaching and learning methods

In-person lectures/field training)

- Evaluation methods

Daily, semester and final tests

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

. D3 . Communication skills in Arabic

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point slides	الرياضة تعريفها واهميتها وانواعها	Accompanied by arousal	1 theoretical 1 + practical	the first
,Reports oral and written theoretical examinations	,Blackboard power point slides	البيانة حركة جسم الانسان		1 theoretical 1 + practical	the second
,Reports oral and written	,Blackboard power point slides	الإصابات الرياضية الشائعة		1 theoretical	the third

theoretical examinations				1 + practical	
,Reports oral and written theoretical examinations	,Blackboard power point slides	المهارات الأساسية للعبة كرة السلة		1 theoretical 1 + practical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point slides	القانون الدولي للعبة كرة السلة		1 theoretical 1 + practical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point slides	المهارات الأساسية للعبة تنس الطاولة وقانونها الدولي		1 theoretical 1 + practical	VI
,Reports oral and written theoretical examinations	,Blackboard power point slides	المهارات الأساسية للعبة كرة الطائرة وقانونها الدولي		1 theoretical 1 + practical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point slides	رياضة السباحة		1 theoretical 1 + practical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point slides	المهارات الأساسية للعبة التنس الأرضي وقانونها الدولي		1 theoretical 1 + practical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point slides	المهارات الأساسية للعبة كرة اليد		1 theoretical 1 + practical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	القانون الدولي للعبة كرة اليد		1 theoretical 1 + practical	eleventh
,Reports oral and written theoretical examinations	,Blackboard power point slides	العاب الساحة والميدان) أنواعها ، القانون الدولي للعبة (1 theoretical 1 + practical	twelveth

,Reports oral and written theoretical examinations	,Blackboard power point slides	المهارات الأساسية لكرة القدم		1 theoretical 1 + practical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	إدارة المسابقات والمنافسات الرياضية		1 theoretical 1 + practical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	القوانين والتشريعات الرياضية		1 theoretical 1 + practical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line . with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	• Educational institution
Physical therapy techniques	• Scientific department/center
Arabic / NTU 103	• Course name/code
In-person lectures	• Available attendance forms
2024-2023	• Semester/year
2 theoretical	• Number of study hours (total)
2024/7/1	• Date this description was prepared
• Course objectives	
The student recognizes spelling and linguistic errors	
• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives The student learns the methods and rules of administrative . A1 .correspondence .A2 . The student learns about the method of linguistic communications in work administrations	
.B . Course-specific skills objectives .B 1 . Developing students' listening, reading and expression skills .B2. Providing students with classical expression skills	

B 3. Developing positive attitudes and values among students towards their .Arabic language related to religion and Arab heritage

Teaching and learning methods

In-person education (scientific films and special videos in classical Arabic)

Evaluation methods

Daily tests, semester exams and final exams

C. Emotional and value goals

C1 . So that the student acquires a correct language in terms of reading and .spelling

.C2 . Working in a team spirit among different cadres

Teaching and learning methods

in-person lectures)

• Evaluation methods

Daily, semester and final tests

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development

.D1 . Cooperation skills and teamwork

.D2 . Computer typing skills

. D3 . Communication skills in Arabic

.D4 . Ability to perform work and solve problems

. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point slides	مقدمة عن الأخطاء اللغوية – تاء المربوطة والطويلة والتاء المفتوحة	Accompanied by arousal	2 Theoretical	the first
,Reports oral and written theoretical	,Blackboard power point slides	قواعد كتابة الالف الممدودة والمقصورة – الحروف الشمسية والقمرية		2 Theoretical	the second

examinations					
,Reports oral and written theoretical examinations	,Blackboard power point slides	الضاد والظاء		2 Theoretical 1	the third
,Reports oral and written theoretical examinations	,Blackboard power point slides	كتابة الهمزة		2 Theoretical 1	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point slides	علامات الترقيم		2 Theoretical 1	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point slides	الاسم والفعل والتفريق بينهما		2 Theoretical 1	VI
,Reports oral and written theoretical examinations	,Blackboard power point slides	المفاعيل		2 Theoretical 1	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point slides	العدد		2 Theoretical 1	VIII
,Reports oral and written theoretical examinations	,Blackboard power point slides	تطبيقات الأخطاء اللغوية الشائعة		2 Theoretical 1	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point slides	تطبيقات الأخطاء اللغوية الشائعة		2 Theoretical 1	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	النون والتنوين – معاني حروف الجر		2 Theoretical 1	eleventh

,Reports oral and written theoretical examinations	,Blackboard power point slides	الجوانب الشكلية للخطاب الاداري		2 Theoretical 1	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point slides	لغة الخطاب الاداري		2 Theoretical 1	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	لغة الخطاب الاداري		2 Theoretical 1	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	نماذج من المراسلات الادارية		2 Theoretical 1	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line with modern scientific development

Course description form

Course description

This course description provides a summary of the most important characteristics of the course and the learning outcomes that the student is expected to achieve, demonstrating whether he or she has made the most of the .learning opportunities available. It must be linked to the program description

Northern Technical University/ Health and Medical Technical College / Al-Dur	<ul style="list-style-type: none">• Educational institution
Physical therapy techniques	<ul style="list-style-type: none">• Scientific department/center
English / NTU101	<ul style="list-style-type: none">• Course name/code
In-person lectures	<ul style="list-style-type: none">• Available attendance forms
2024-2023	<ul style="list-style-type: none">• Semester/year
2 theoretical	<ul style="list-style-type: none">• Number of study hours (total)
2024/7/1	<ul style="list-style-type: none">• Date this description was prepared
<ul style="list-style-type: none">• Course objectives	
Acquire the skill of dialogue in the English language and read and analyze scientific research and medical terminology correctly	
<ul style="list-style-type: none">• Course outcomes and teaching, learning and evaluation methods	
a . Cognitive objectives Identify the tenses and verbs used with each tense and adjust the . A1 .context of the sentence .A2 . Learn about general rules, interrogative tools, and conversation formulation	

. B . Course-specific skills objectives
.B 1 . Speak correct English
.B2. Being able to read medical tests
B3. Knowledge of medical terminology in the English language due to its importance in the field of medical work

Teaching and learning methods

In-person education (scientific films and videos on the correct pronunciation (of the English language

Evaluation methods

Daily tests, semester exams and final exams

C. Emotional and value goals

C1 . In order for the student to acquire a correct language, he will be able to .read and translate analyzes and medical terminology
.C2 . Working in a team spirit among different cadres

Teaching and learning methods

(in-person lectures)

- Evaluation methods**

Daily, semester and final tests

Dr . Transferable general and qualifying skills (other skills related to .(employability and personal development
.D1 . Cooperation skills and teamwork
.D2 . Computer typing skills
.D3 . Communication skills in English
.D4 . Ability to perform work and solve problems
. D5 . Internet conversation skills

Course structure

Evaluation method	Teaching method	Name of the unit/topic	Required learning outcomes	hours	the week
,Reports oral and written theoretical examinations	,Blackboard power point slides	Cardinal numbers/years/prices/ times(in words and figures).	Accompanied by arousal	2 theoretical	the first
,Reports oral and written	,Blackboard power point slides	Phonetic of alphabet letters, punctuation.		2 theoretical	the second

theoretical examinations					
,Reports oral and written theoretical examinations	,Blackboard power point slides	Countries/Capitals, arrange words (makes full sentence)/ arrange letters (make full word).		2 theoretical	the third
,Reports oral and written theoretical examinations	,Blackboard power point slides	Simple present/1. Verb to be (is/am/are) (affirmative, negative and interrogative).		2 theoretical	the fourth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Simple present/2. Verb to do(Do/Does) (affirmative, negative and interrogative).		2 theoretical	Fifth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Simple present/3. Verb to have(have/has) (affirmative, negative and interrogative).		2 theoretical	VI
,Reports oral and written theoretical examinations	,Blackboard power point slides	Simple present/4. Ordinary verbs like (eat, go, play ...etc.) (affirmative, negative and interrogative).		2 theoretical	Seventh
,Reports oral and written theoretical examinations	,Blackboard power point slides	Tag questions and short answers(yes/no questions).		2 theoretical	VIII
,Reports oral and written theoretical examinations	,Blackboard power point slides	Review (simple present).		2 theoretical	Ninth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Question words (what, where, when, who, why, how, whom, whose, which).		2 theoretical	The tenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Abbreviation (short form), adjectives (and their opposite).		2 theoretical	eleventh

,Reports oral and written theoretical examinations	,Blackboard power point slides	Plural nouns (regular and irregular).		2 theoretical	twelveth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Possession (all types).		2 theoretical	Thirteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Pronunciation (-s at the end of a word).		2 theoretical	fourteenth
,Reports oral and written theoretical examinations	,Blackboard power point slides	Pronouns (all types).		2 theoretical	Fifteenth

• Infrastructure

	The presence of study halls
	And C and D specialized laboratories
	The presence of capable cadres

• Course development plan

Updating the course periodically in order to add materials that are in line with modern . scientific development