

T. C.
ÜSKÜDAR UNIVERSITY FACULTY OF HEALTH SCIENCES
DEPARTMENT OF AUDIOLOGY COURSE CONTENTS
FIRST GRADE
1st TERM (FALL)

TURK103 Turkish Language - I (2 + 0) 2 ECTS: 2

What is language and culture? Language-Culture Relationship, What is the place of Turkish in the world languages? What is Polish-Dialect-Mouth? Spelling (Spelling) Rules, Phonetic and Syllable, Vocabulary, Sentence, Elements of Sentence, Some Speech Characteristics of Turkish.

ING103 English - I (2 + 0) 2 ECTS: 2

This course is designed for beginners of English and aims to develop basic language skills. It helps learners to acquire listening, speaking, reading and writing skills through different teaching techniques and practice studies. Learners learn basic grammar patterns and vocabulary using dialogues and texts used in situations encountered in real life. At the end of this course, learners are prepared to progress from English to beginner to intermediate to beginner level.

ATA103 Atatürk's Principles and History of Turkish Revolution I (2 + 0) 2 ECTS: 2

Turkish recognition features and the similar concept of revolution, of his reforms in the Ottoman Empire before the Turkish Revolution, the Turkish War of Independence, the proclamation of the Republic, Ataturk importance of revolutions and Atatürk Reforms threats to events in the birth and development of modern Turkey, ideas and principles.

SBF141 Basic Anatomy (2 + 2) 3 ECTS: 3

In this course, the anatomy science and the topics of interest to the musculoskeletal system anatomy, nervous system anatomy, circulatory system, digestive system, head and neck anatomy and sensory organs will be discussed in a systematic manner.

SBF149 Basic Genetics (2+0) 2 ECTS: 3

The role and importance of genetics and molecular biology in medicine, structure, replication and protein synthesis of genetic material, mutations in DNA, repair mechanisms of mutations,

cytogenetic, molecular cytogenetic and molecular diagnostic methods used in medical genetics, molecular technologies, common single gene diseases, heredity theory and Mendelian genetics, autosomal and gonosomal inheritance patterns and examples of diseases inherited in accordance with these patterns, cell cycle, proliferation and control, mitosis and meiosis, sex and development, basic molecular mechanisms of cancer development, prenatal and postnatal diagnosis methods, gaining knowledge and skills to explain the ethical dimension of genetic applications.

SBF128 Basic Physiology (3+0) 3 ECTS: 5

In this course, the physiological characteristics of the human organism will be discussed, starting from the basic functions of the cell and progressing to the functions of the systems in the human body.

ODY109 Introduction to Audiology (1 + 2) 2 ECTS: 3

In this course, introduction of audiology and audiologist, basic anatomy and physiology of hearing and balance system, basic audiological test battery and basic audiological rehabilitative approaches will be discussed at the introductory level.

SBF142 Biophysics (2+0) 2 ECTS: 3

This course covers various topics such as Biophysical Properties of Body Fluids, Regulation of Acid-Base Balance in the Organism, Membrane Transport Mechanisms, Action Potentials, Biophysics of Hearing, Effects of Electric Currents on Tissue.

ODY115 Child Development and Hearing Impairment (2 + 0) 2 ECTS: 2

The aim of this course is to give detailed information about the developmental stages of normal and hearing impaired children. Motor, social, cognitive, language, speech and auditory development areas are examined.

RKUL103 University Culture (0 + 2) 1 ECTS: 4

This course aims to provide the students with the intellectual knowledge about social, cultural and political events, to be open to multidisciplinary knowledge process outside of their general curricula, to gain the ability to think critically and questioningly and to act analytically. The student will also have the ability to comment by attending seminars of experts in the fields of science, technical, social, political and cultural issues that are discussed outside the public domain. Students will attend approximately 48-50 seminars and programs during their university life.

FIRST GRADE
2nd TERM (SPRING)

TURK104 Turkish Language - II (2 + 0) 2 ECTS: 2

Punctuation, Speech Disorders, Written Composition, Oral Composition, Beautiful and Effective Speech.

ING104 English - II (2 + 0) 2 ECTS: 2

This course is designed for beginner learners of English and aims to develop basic language skills. It helps learners to acquire listening, speaking, reading and writing skills through different teaching techniques and practice studies. Learners learn basic grammar patterns and vocabulary using dialogues and texts used in situations encountered in real life. At the end of this course, learners are prepared to progress from English to beginner to intermediate to beginner level.

ATA104 Atatürk's Principles and History of Turkish Revolution-II (2 + 0) 2 ECTS: 2

Turkish recognition features and the similar concept of revolution, of his reforms in the Ottoman Empire before the Turkish Revolution, the Turkish War of Independence, the proclamation of the Republic, Atatürk importance of revolutions and Atatürk Reforms threats to events in the birth and development of modern Turkey, ideas and principles.

ODY130 Basic Histology-Embryology and Microbiology for Audiologist (3+0) 3 AKTS: 3

In this course, topics such as microscope systems, cell histology, tissues and general embryology, organs and circulatory system, development and histology of nervous systems, histological features of sensory organs, especially the ear, types of microorganisms such as viruses, bacteria, fungi, types of microorganisms affecting hearing, methods of evaluation in laboratory environment, their effects on the formation of diseases will be discussed.

ODY110 Basic Otorhinolaryngology (2 + 0) 2 ECTS: 2

In this course, basic otorhinolaryngology knowledge, evaluation methods, diseases, medical and surgical applications used in ENT practice will be given.

ODY126 Audiological Evaluation Methods I (2+4) 4 ECTS: 5

In this course, pure tone audiometry, speech audiometry, clinical masking, tympanometry and acoustic reflex measurements, advanced immittance measurement methods, which are the most important topics of the basic audiological test battery, will be discussed with both detailed theoretical and practical applications.

RKUL104 University Culture II (0 + 2) 1 ECTS: 4

This course aims to provide the students with the intellectual knowledge about social, cultural and political events, to be open to multidisciplinary knowledge process outside of their general curricula, to gain the ability to think critically and questioningly and to act analytically. The student will also have the ability to comment by attending seminars of experts in the fields of science, technical, social, political and cultural issues that are discussed outside the public domain. Students will attend approximately 48-50 seminars and programs during their university life.

SBF144 Neuroanatomy (2+0) 2 ECTS: 3

This course covers general concepts about the structure and function of the nervous system, macroscopic anatomy and physiology of the central nervous system, medulla spinalis, truncus cerebri, formio reticularis, cerebellum, structure and functions of the medulla spinalis, cranial nerves, basal ganglia, diencephalon, visual and auditory pathways, autonomic nervous system, telencephalon.

RPSI109 Positive Psychology and Communication Skills (3+0) 3 ECTS: 5

In this course, Definition of Positive Psychology, Basic Concepts, Theoretical Foundations and applications, Socioemotional experience and behavior, brain-behavior systems studied in cognitive sciences. Topics such as Self and Others Recognition, Awareness and Empathy, Psychosocial Life Skills and Problem Solving Skills, Motivation and Planning, Anger, Aggression and Violence, Relationship Management and Healthy Decision Making, Persistence and Compromise.

ODY120 Acoustic Physics (2+0) 2 ECTS: 3

In this course, the formation, behavior, properties and acoustic structure of wave motions are

examined. The principles of calibration of measurements between the human ear and instruments, the acoustic structure and phonetics of speech, its properties and its progression in the outer and middle ear will be explained.

SECOND GRADE

Ist TERM (FALL)

ODY245 Vestibular System and Assessment Methods I (2+2) 3 ECTS: 5

Information is given about the test methods used during the evaluation of the vestibular system such as electronystagmography, videonystagmography, posturography, caloric tests.

ODY261 Audiological Evaluation Methods II (2 + 4) 4 ECTS: 6

In this course, evaluation methods such as electrocochleography, otoacoustic emission, auditory brainstem response, ASSR, which are the most important topics of diagnostic audiological test battery, will be discussed with the help of both detailed theoretical and practical applications.

ODY271 Pediatric Audiology (1 + 2) 2 ECTS: 3

In this course, general characteristics, pathophysiology, special audiologic test methods used in infancy and childhood diseases, general characteristics of electrophysiological test methods will be given.

ODY247 Instrumentation and Calibration (1+2) 2 ECTS: 3

This course covers topics such as the introduction of tools, equipment and computer programs used in the field of audiology, principles of use, introduction of “sound level meter (SLM) and equipment” used in the calibration of these devices, standards used during calibration and application principles.

RPRE104 Entrepreneurship and Project Culture (2+0) 2 ECTS: 3

This course provides students with comprehensive knowledge on how to implement a graduation product instead of a graduation project. It includes student-centered, real-life goal setting, bringing all relevant academics together, exploring new things, problem solving, time management skills, and community service.

ODY200 Industrial Audiology (2+0) 2 ECTS: 3

The aim of this course is to provide information about industrial noise, vibrations, explosions and noise-induced hearing loss, industrial noise protection methods, evaluation and treatment of noise-induced hearing loss.

ODY239 Language and Speech Science (2+0) 2 ECTS: 3

In this course, the basic interests of linguistics, components of language, phonology, articulation, language acquisition theories will be discussed.

SECOND GRADE

2nd TERM (SPRING)

ODY240 Electrophysiological Test Methods in Audiology (1 + 2) 2 ECTS: 4

In this course, general characteristics of electrophysiological tests such as mid-latency, late latency, P300, MMN used in the evaluation of auditory pathways at the central nervous system level will be discussed and their distinctive features in diagnostic audiology.

ODY232 Hearing Screenings (2+0) 2 ECTS: 2

The aim of this course is to give detailed information about the philosophies, methods and methodology used in newborn hearing screening, preschool and school period hearing screenings and occupational hearing screenings.

ODY264 Vestibular System and Assessment Methods II (2+2) 3 ECTS: 5

Information is given about the test methods used during the evaluation of the vestibular system such as electronystagmography, videonystagmography, posturography, caloric tests.

ODY242 Introduction to Amplification Applications (2+2) 3 ECTS: 4

The aim of this course is to give basic information about cochlear implants by addressing topics such as parts, types and technology of hearing aids, parts and technology of cochlear implants, signal processing methods in cochlear implants.

ODY284 Clinical Practice - I (0+8) 4 ECTS: 6

Within the scope of this course, it is aimed to reinforce their professional skills and knowledge by having the opportunity to apply the theoretical knowledge they have learned in the clinical environment.

ODY204 Acoustic and Phonetic Principles (2+0) 2 ECTS: 3

The aim of this course is to provide the necessary knowledge and skills in acoustics and phonetics. Principles of physics of sound, acoustic structure of sound, physiological effects of human voice, calibration principles of measurements between the human ear and instruments, acoustic structure of speech and tone of voice.

ODY211 Speech and Language Disorders for Audiologists (2+0) 2 ECTS: 3

The aim of this course is to provide the necessary knowledge and skills in speech and language disorders. It aims to have the theoretical knowledge about the communication disorders that may be encountered in the field of audiology, the disruptions and disorders in the development of language and speech skills.

ODY343 Audiologic and Vestibular Evaluation with Cases-I (3+2) 4 ECTS: 4

Within the scope of this course, it is aimed to develop the student's reasoning ability for audiological diagnosis by interpreting the current audiological findings on real patients in order to establish the philosophy of differential diagnosis of hearing and balance system diseases in the student.

ODY325 Auditory Implants-I (2+2) 3 ECTS: 4

In this course, topics such as cochlear implant selection criteria in infants, children and adults, cochlear implant adjustments, important issues when adjusting cochlear implants, cochlear implant patient follow-up, orientation will be discussed.

ODY341 Hearing Aid Selection and Application Principles (2+2) 3 ECTS: 5

In this course, hearing aid selection criteria in infants, children and adults, hearing aid adjustments, important issues when adjusting hearing aids, hearing aid patient follow-up, orientation, acclimatization will be discussed.

ODY329 Vestibular System Diseases and Rehabilitation (1+2) 2 ECTS: 4

In this course, strengthening, adaptation exercises and therapy maneuvers used in the rehabilitation of balance disorders resulting from vestibular system diseases will be discussed both theoretically and practically.

ODY313 Turkish Sign Language - I (2+0) 2 ECTS: 3

In this course, the basic features of Turkish Sign Language, grammatical structure, application forms, finger alphabet will be discussed in the form of practical application.

ODY367 Special Topics in Audiology-I (2+0) 2 ECTS: 3

Within the scope of this course, it is aimed to increase the equipment of the students in different special topics of Audiology.

ODY305 Central Auditory Processing Disorders (2+0) 2 ECTS: 2

In this course, topics such as anatomy and physiology of central auditory pathways, auditory neuroscience, assessment methods used in auditory processing disorders, differential diagnostic criteria, auditory therapy methods applied in auditory processing disorders will be discussed.

ODY391 Basic Principles of Auditory Rehabilitation (0+2) 1 ECTS: 3

In this course, communication and rehabilitation methods for infants, children and adults will be discussed. Topics such as hearing aid training applications, pre and post cochlear implant training applications, auditory verbal therapy applications, auditory training, auditory perception skills development, total communication applications will be discussed theoretically and practically.

ODY323 Advanced Electrophysiological Test Methods (1+2) 2 ECTS: 4

In this course, the general characteristics, application areas and distinctive features of electrophysiological tests such as middle latency, late latency, P300, MMN used in the evaluation of auditory pathways at the central nervous system level will be discussed.

THIRD GRADE 2nd TERM (SPRING)

ODY354 Auditory Rehabilitation with Cases (0+2) 1 ECTS: 3

In this course; Using examples from auditory rehabilitation patient cases, the process followed before rehabilitation, rehabilitation planning and rehabilitation practices specific to the needs of the person will be discussed.

ODY340 Auditory Implants-II (2+2) 3 ECTS: 4

In this course, middle ear implants, devices implanted in bone, cochlear implant, auditory brainstem implant, working principles of implants, surgical techniques, sound processing techniques, programming will be discussed.

ODY374 Special Topics in Audiology -II (0+2) 2 ECTS: 3

In this course, topics such as brainstem implants, middle ear implants, bone tract implants, electrical electrophysiological measurement methods, electroneurography will be covered.

ODY314 Turkish Sign Language - II (2+0) 2 ECTS: 3

Within the scope of this course, topics such as the basic features of Turkish sign language, grammatical structure, application forms, finger alphabet will be discussed in the form of practical application.

ODY315 Geriatric Audiology (2+0) 2 ECTS: 3

In this course, defining the geriatric group, understanding age-related changes and age-related changes in the hearing system are discussed.

ODY394 Clinical Practice - II (0+6) 3 ECTS: 6

Within the scope of this course, students are aimed to reinforce their professional skills and knowledge by having the opportunity to apply the theoretical knowledge they have learned in a clinical setting.

ODY324 Audiologic and Vestibular Evaluation with Cases II (2+0) 2 ECTS: 3

In this course, intervention methods for hearing and balance system diseases are evaluated and how to interpret the diagnostic findings of the disease are discussed.

ODY339 Audiology and Art (2+0) 2 ECTS: 3

In this course, the contributions of Art branches to the field of Audiology are explained. Within the scope of the course, applications such as role-playing, producing scenarios suitable for the situation are made to expand the thoughts of the students.

ODY342 Ear Mold Applications (1+0) 2 ECTS: 3

The aim of this course is to examine hearing aids, implants and assistive technologies for hearing loss in detail and to learn ear mold models and to have knowledge about the effectiveness of mold

applications in hearing aids.

**FOURTH GRADE
1st TERM (FALL)**

ODY407 Clinical Study - I (0+15) 7 ECTS: 15

Treatment and evaluation approaches used in the field of audiology are reviewed and knowledge and skills related to practical applications are developed.

ODY405 Graduation Project I (0+4) 2 ECTS: 6

Within the scope of this course, it is aimed to reinforce their education both theoretically and practically with a scientific project in the field of Audiology and to take the first steps towards their possible academic career.

ODY401 Creativity Skills for Audiologists (2+0) 2 ECTS:3

The aim of this course is to provide basic knowledge to understand the concepts and theories related to sensory integration, assessment and treatment techniques, about the senses and their integration development and in the learning process, sensory perspective and the effects of senses on human behavior.

ODY415 Rehabilitation in Geriatric Audiology (2+0) 2 ECTS:3

The aim of this course is to ensure that audiologists have the necessary dialog and equipment for the applications to be made specifically for the geriatric group.

ODY411 Vestibular Rehabilitation in Children (2+0) 2 ECTS:3

The aim of this course is to teach the theoretical and practical knowledge to determine the disorders and symptoms related to vestibular dysfunction that can be seen in children, to evaluate the triggering factors, to choose appropriate rehabilitation approaches.

**FOURTH GRADE
2nd TERM (SPRING)**

ODY408 Clinical Study - II (0+15) 7 ECTS: 15

Treatment and evaluation approaches used in the field of audiology are reviewed and knowledge and skills related to practical applications are developed.

ODY406 Graduation Project - II (0+4) 2 ECTS: 6

Within the scope of this course, it is aimed to reinforce their education both theoretically and practically with a scientific project in the field of Audiology and to take the first steps towards their possible academic career.

ODY413 Sectoral Approach Strategies in Audiology (2+0) 2 ECTS: 3

Within the scope of this course, it is aimed to give information about job opportunities in the field of Audiology and developing a different perspective on work.

ODY414 Rehabilitation in Individuals with Multiple Disabilities (2+0) 2 ECTS: 3

The aim of this course is to provide students with information about the concept of disability, the concept of multiple disabilities, hearing loss and additional disabilities, approach to the individual with hearing and additional disabilities.

ODY302 Music and Play Therapy for Hearing Impaired (2+0) ECTS:3

The aim of this course is; to give information about music and play, which have an important place in the development of children, to learn information about music and games according to the developmental stages in children, to determine the games for different developmental levels, to organize programs for musical games suitable for supporting auditory skills in individuals with hearing loss / impairment.

