| COURSE INFORMATON | | | | | | |
|-----------------------------|---------|-------------|----------|---------|------|--|
| Course Title | Code | Semester | L+P Hour | Credits | ECTS | |
| Case Based Forensic Science | MED 634 | Phase 1/2/3 | 28 | 2 | 2* | |

^{*} ECTS credits are the university credits of the courses in Yeditepe University, Faculty of Medicine, Undergraduate Medical Education Program

| Prerequisites | None |
|---------------|------|
|---------------|------|

| Language of Instruction | English |
|-------------------------|---|
| Course Level | Second Cycle including First Cycle Degree (One Tier Programme) |
| Course Type | Free Elective |
| Course Coordinator | |
| Instructors | Sıtkı Tıplamaz, MD Assist. Prof. |
| Assistants | - |
| Goals | To increase the awareness of students about forensic cases by presenting them as real case presentations through forensic sciences, where some of the patients that they will examine routinely in their professional lives are forensic cases. |
| Content | In each course, brief introduction information about one of the basic forensic sciences will be given, and with the help of this forensic science, how the case is elucidated and how the process is managed, will be explained in the courses. |

| Learning Outcomes Students who take this course will be able to | Program Learning Outcomes | Teaching Methods | |
|--|---|---------------------|-------|
| give preliminary information about what the forensic sciences are, and their relationship with medicine and each other. | 1.1.1,1.1.4,1.1.9,2.1.2, | 1,2,3,4 | A,B,C |
| give examples an idea about the types of forensic cases they may encounter in their professional routine. | | 1,2,3,4 | A,B,C |
| gain the awareness that every patient that they examine can turn into a forensic case. | | 1,2,3,4 | A,B,C |
| explain the liability of healthcare professionals against forensic cases and what kind of problems both patients and healthcare professionals may encounter if they are omitted. | 1.1.1,1.1.4,1.1.9,2.1.2, 2.1.3,2.1.4,2.2.3,2.4.2, 2.5 1 3 2 1 3 2 2 | 1,2,3,4 | A,B,C |

| give preliminary information about the management process of the forensic case. | 1.1.1,1.1.4,1.1.9,2.1.2, 2.1.3,2.5.1,3.2.1,3.2.2 | 1,2,3,4 | А,В,С |
|---|---|---------|-------|
| explain the importance of the holistic approach in the management of forensic cases | 1.1.1,1.1.4,1.1.9,2.1.2, 2.1.3,2.1.4,2.4.2, 2.5.1,3.2.2 | 1,2,3,4 | A,B,C |
| explain the importance of professionalization and coordination in forensic science. | 1.1.1,1.1.4,1.1.9,2.1.2, 2.1.3,2.1.4,2.2.3,2.4.2, 2.5.1,3.2.1,3.2.2 | 1,2,3,4 | A,B,C |

| Teaching Methods: 1: Lecture, 2: Q-A, 3: Group discussion, 4: Small group teaching methods | | |
|---|---|--|
| Assessment Methods: | A: Exam, B: Paper, C: Student presentation, | |

| Wool | ek Topics Study Material | | | |
|------|--|-----------------|--|--|
| week | Topics | Study Materials | | |
| 1 | Introduction to Forensic Sciences | | | |
| 2 | Forensic Pathology and Case Presentation | | | |
| 3 | Forensic Anthropology and Case Presentation | | | |
| 4 | Forensic Odontology and Case Presentation | | | |
| 5 | Forensic Entomology and Case Presentation | | | |
| 6 | Forensic Genetic and Case Presentation | | | |
| 7 | Forensic Ballistics and Case Presentation | | | |
| 8 | Friction Ridge Examination and Case Presentation | | | |
| 9 | Forensic Toxicology and Case Presentation | | | |
| 10 | Questioned Documents and Case Presentation | | | |
| 11 | Forensic Hair Examinations and Case Presentation | | | |
| 12 | Fires and Explosions and Case Presentation | | | |
| 13 | Law and Forensic Sciences | | | |

| 14 | A Holistic Approach to Forensic Sciences | |
|----|--|--|
| | | |

| RECOMMENDED SOURCES | | | | |
|----------------------|---|--|--|--|
| Textbook | Siegel JA, Saukko PJ, Houck MM, eds. Encyclopedia of Forensic Sciences. 2nd ed. Academic Press/Elsevier; 2013. https://www.sciencedirect.com/referencework/9780123821669/encyclopedia-of-forensic-sciences. Accessed August 20, 2020. Houck MM, Siegel JA. Fundamentals of Forensic Science. 2nd ed. Academic Press/Elsevier; 2010. https://www.elsevier.com/books/fundamentals-of-forensic-science/houck/978-0-12-374989-5. | | | |
| Additional Resources | 3. Butler JM (John M, Butler JM (John M. Fundamentals of Forensic DNA Typing. Academic Press/Elsevier; 2010. https://www.sciencedirect.com/science/book/9780123749994. Accessed March 12, 2017. | | | |

| MATERIAL SHARING | | | |
|------------------|---|--|--|
| Documents | - | | |
| Assignments | - | | |
| Exams | - | | |

| COURSE CATEGORY | Free elective |
|-----------------|---------------|
|-----------------|---------------|

| COURSES CONTRIBUTION TO PROGRAM | | | | | |
|---|---|--------------|---|---|---|
| COMPETENCE AREA-1 / Professional Practices | | Contribution | | | |
| COMPETENCE 1.1. Health Service Provider | 1 | 2 | 3 | 4 | 5 |
| Competency 1.1.1. Integrates knowledge, skills, and attitudes acquired | | | Х | | |
| from basic and clinical medical sciences, behavioral sciences, and social | | | | | |
| sciences to provide health services. | | | | | |
| Competency 1.1.2. Demonstrates a biopsychosocial approach that | | | | | |
| considers the individual's sociodemographic and sociocultural background | | | | | |
| without discrimination based on language, religion, race, or gender in | | | | | |
| patient management. | | | | | |
| Competency 1.1.3. Prioritizes the protection and improvement of | | | | | |
| individuals' and community's health in the delivery of healthcare services. | | | | | |
| Competency 1.1.4. Performs the necessary actions in the direction of | | | | Х | |
| maintaining and improving the state of health as considering the | | | | | |
| individual, social, social and environmental factors affecting health. | | | | | |
| Competency 1.1.5. Provides health education to healthy/ill individuals | | | | | |
| and their families, as well as to other healthcare professionals, by | | | | | |
| recognizing the characteristics, needs, and expectations of the target | | | | | |
| audience. | | | | | |

| Competency 1.1.6. Demonstrates a safe, rational, and effective approach | | | | | |
|--|---|----|--------|------|---|
| in the processes of protection, diagnosis, treatment, follow-up, and | | | | | |
| rehabilitation in health service delivery. | | | | | |
| Competency 1.1.7. Performs interventional and/or non-interventional | | | | | |
| procedures safely and effectively for the patient in the processes of | | | | | |
| diagnosis, treatment, follow-up, and rehabilitation. | | | | | |
| Competency 1.1.8. Provides healthcare services considering patient and | | | | | |
| employee health and safety. | | | | | |
| Competency 1.1.9. Considers changes related to the physical and socio- | | | | X | |
| economic environment at both regional and global scales that affect | | | | | |
| health, as well as changes in the individual characteristics and behaviors | | | | | |
| of those who seek healthcare services. | | | | | |
| COMPETENCE AREA-2 / Professional Values and Approaches | | Co | ntribu | tion | |
| COMPETENCE 2.1. Adopting Professional Ethics and Principles | 1 | 2 | 3 | 4 | 5 |
| Competency 2.1.1. Considers good medical practices while performing the profession. | | | | | |
| Competency 2.1.2. Fulfills duties and obligations within the framework of | | | | Х | |
| ethical principles, rights, and legal responsibilities required by the | | | | ^ | |
| profession. | | | | | |
| Competency 2.1.3. Demonstrates determined behavior in providing high- | | | | | Х |
| quality healthcare while considering the patient's integrity. | | | | | |
| Competency 2.1.4. Evaluates own performance in professional practices | | | | X | |
| by considering own emotions and cognitive characteristics. | | | | ^ | |
| COMPETENCE 2.2. Health Advocate | | | | | |
| | | | | | |
| Competency 2.2.1. Advocates for the improvement of healthcare service | | | | | |
| delivery by considering the concepts of social accountability and social responsibility in the protection and enhancement of community health. | | | | | |
| Competency 2.2.2. Plans and implements service delivery, education, | | | | | |
| and counseling processes related to individual and community health, in | | | | | |
| collaboration with all stakeholders, for the protection and improvement of | | | | | |
| health. | | | | | |
| Competency 2.2.3. Evaluates the impact of health policies and practices | | | Х | | |
| on individual and community health indicators and advocates for the | | | ^ | | |
| improvement of healthcare quality. | | | | | |
| Competency 2.2.4. Gives importance to protecting and improving own | | | | | |
| physical, mental, and social health and takes necessary actions for it. | | | | | |
| COMPETENCE 2.3. Leader-Manager | | | | | |
| | | | | | |
| Competency 2.3.1. Demonstrates exemplary behavior and leadership within the healthcare team during service delivery. | | | | | |
| Competency 2.3.2. Utilizes resources in a cost-effective, socially | | | | | |
| beneficial, and compliant manner with regulations in the planning, | | | | | |
| implementation, and evaluation processes of healthcare services as the | | | | | |
| manager in the healthcare institution. | | | | | |
| COMPETENCE 2.4. Team Member | | | | | |
| Competency 2.4.1. Communicates effectively within the healthcare team | | | | | |
| and takes on different team roles as necessary. | | | | | |
| Competency 2.4.2. Displays appropriate behaviors while being aware of | | | X | | |
| the duties and responsibilities of healthcare workers within the healthcare | | | | | |
| team. | | | | | |
| Competency 2.4.3. Works collaboratively and effectively with colleagues | | | | | |
| and other professional groups in professional practice. | | | | | |

| COMPETENCE 2.5. Communicator | | | | | |
|--|--------------|---|---|---|---|
| Competency 2.5.1. Communicates effectively with patients, their families, | | | Х | | |
| healthcare professionals, and other occupational groups, institutions and | | | | | |
| organizations. | | | | | |
| Competency 2.5.2. Communicates effectively with individuals and groups | | | | | |
| who require a special approach and have different sociocultural characteristics. | | | | | |
| Competency 2.5.3. Demonstrates a patient-centered approach that | | | | | |
| involves the patient in decision-making mechanisms during the diagnosis, | | | | | |
| treatment, follow-up, and rehabilitation processes. | | | | | |
| COMPETENCE AREA-3 / Professional and Personal Development | Contribution | | | | |
| COMPETENCE 3.1. Scientific and Analytical Approach | 1 | 2 | 3 | 4 | 5 |
| Competency 3.1.1. Plans and implements scientific research, as | | | | | |
| necessary, for the population it serves, and utilizes the results obtained, | | | | | |
| as well as those from other research, for the benefit of the community. | | | | | |
| Competency 3.1.2. Accesses and critically evaluates current literature | | | | | |
| related to their profession. | | | | | |
| Competency 3.1.3. Applies evidence-based medicine principles in the | | | | | |
| clinical decision-making process. | | | | | |
| Competency 3.1.4. Uses information technologies to enhance the | | | | | |
| effectiveness of healthcare, research, and education activities. | | | | | |
| COMPETENCE 3.2. Lifelong Learner | | | | | |
| Competency 3.2.1. Manages effectively individual study processes and | | | X | | |
| career development. | | | | | |
| Competency 3.2.2. Demonstrates skills in acquiring, evaluating, | | | | | X |
| integrating new information with existing knowledge, applying to | | | | | |
| professional situations, and adapting to changing conditions throughout | | | | | |
| professional career. | | | | | |
| Competency 3.2.3. Selects the right learning resources to improve the | | | | | |
| quality of health care and organizes the learning process. | | | | | |

| ASSESSMENT | | | |
|--|--------|------------|--|
| IN-TERM STUDIES | NUMBER | PERCENTAGE | |
| Assignments | 1 | 50 | |
| Final Examination | 1 | 50 | |
| Total | | 100 | |
| CONTRIBUTION OF FINAL EXAMINATION TO OVERALL GRADE | | 50 | |
| CONTRIBUTION OF IN-TERM STUDIES TO OVERALL GRADE | | 50 | |
| Total | | 100 | |

| ECTS ALLOCATED BASED ON STUDENT WORKLOAD BY THE COURSE DESCRIPTION | | | | | |
|--|----------|--------------------------|----|--|--|
| Activities | Quantity | Quantity Duration (Hour) | | | |
| Duration (Total of exam and class hours) | 14 | 2 | 28 | | |
| Out of class study time | 14 | 1 | 14 | | |
| Mid-term exam | - | - | - | | |
| Assignments | 1 | 14 | 14 | | |
| Final | 1 | 4 | 4 | | |
| Total Work Load | | | 60 | | |
| Total Work Load / 30 (h) | | | 2 | | |
| ECTS Credit of the Course | | | 2 | | |