**Tehran University of Medical Sciences School of Public Health** 

**Department of Medical Parasitology and Mycology** 

Ph.D. in Medical Mycology

School of Public Health

Department of Medical Parasitology and Mycology

**Title**: Medical Mycology

Degree: Ph.D.

**Duration:** 4-4.5 years

Introduction

The definition of the course and relevant level

A Ph.D. degree in Medical Mycology is the highest level of education.

Mission

The mission of the program of Mycology Ph.D. degree is the training of experts and specialists in this course of the basic medical sciences. These people do activities and give services to promote scientific research and education in Medical Mycology. On the other hand, the effort in solving the problems of medical fungi for maintenance of health.

Vision

The graduates of this course will be able to use the most modern achievements of science and related fields in Medical Mycology for training and research programs, health services, and laboratory activities. They can use their information, skills, and creativity in problemsolving and problems in the field of identifying fungi and laboratory diagnosis, prevention, and control of diseases caused by them.

## General-purpose

- (A) Training of specialists, researchers, and teachers to perform the duties of teaching, research, and service in the field of Medical mycology for medical universities and other institutions of higher education, research, and services in the country.
- (B) Training experts in the collection, evaluation, innovation, production, development, and transfer of science and technology in the field of Medical Mycology and related disciplines will be formidable.

The role of graduates

- 1. Servicing
- 2. Educational
- 3. Research

## The courses for Ph.D. in Medical Mycology

Medical information systems	1
Introduction to medical mycology	
Systemic mycoses infection	3
Subcutaneous and submucosal mycoses	2
Superficial and cutaneous mycoses	3
Fungal pathogenesis	3
Fungal physiology	2
<b>Epidemiology of fungal diseases</b>	2
Histopathology of fungal diseases	2
Immunomycology	3
Dermatology	1
Advanced and applicable biochemistry in	3
mycology	

Antifungal drugs and mechanisms of	2
action	
Applicable and diagnostic mycology	2
Disinfectants, antiseptics, and	1
preservatives	
Project and seminar	1
Training in lab	2
Electronic microscopic training	1
Bioinformatics	1
Biotechnology and molecular methods in	2
medical mycology	
Fungus nutrition and food hygiene	1
Mycotoxins and mycotoxicosis	1
Research methods in health sciences	2
Advanced biostatistics method	3
<b>Epidemiology and prevention of disease</b>	2
Laboratory animals	1
Immunology in medical mycology	2
Histology	2
Applicable biostatistics and utilization of	2
computer in the analysis of health data	
Health information systems	1
Cellular and molecular biology	2
Fungal genetics	2
pathogenesis of mycosis	4
Electronic microscope	2
Immunomycology	2
Thesis	12