



In the Name of God

Islamic Republic of Iran
Ministry of Health and Medical Education
Deputy Ministry for Education

Endocrinology and Metabolism

Degree: Subspecialty

Program Description

Recent years have witnessed remarkable improvements in the field of endocrinology and metabolism across the world. These improvements inevitably call for a review of the relevant curricula. Careful assessment of the needs, shortcomings, strengths and weaknesses, getting inspiration from research and training curricula of world's top universities, interviewing students, and benefiting from the experiences of the field's esteemed professors have all been greatly valuable in the path towards a comprehensive curriculum that takes national priorities and social needs into consideration. This curriculum has been developed and made available to universities following discussions and ideations in committee meetings.

Definition and Duration of the Training Program:

Endocrinology and metabolism is a subspecialty of internal medicine, and is about diseases of the endocrine glands including hypothalamus, pituitary gland, thyroid gland, pancreas, adrenal glands, ovaries and testes, and parathyroid gland, as well as with the disorders of calcium and phosphorous metabolism, bone metabolism, and lipid metabolism.

Duration is 2 years.

Aims:

- 1-To train capable, efficient, committed sub specialists who would make every effort to prevent, diagnose, manage, and follow up on the diseases of endocrine glands and hormonal and metabolic disorders of all individuals within the society, as well as help to enhance and enrich the knowledge and research in the field.
- 2-In next 10 years, we expect to be offering standards and quality of education, science production, and services in endocrinology and metabolism that are superior to other countries in the region.

Admission Requirements

- M.B.B.S./M.D. and specialty or equivalent certificates
- Certificate of Internship or Certificate of Practice

Language Requirements:

- Language requirements: Evidence of English Proficiency on the TOEFL or IELTS tests. The minimum score for TOEFL PBT, TOEFL iBT and IELTS is 533, 72 and 5.5 respectively.
- Applicants from Persian (Farsi) Speaking countries (They shall both speak and write in Persian) who have applied for graduate Degree-based programs may be exempted, based on the decision of the department, from submitting any certificates regarding their English Language Proficiency. Nevertheless, they are required to hand in their English language certificate which meets SUMS' minimal language proficiency requirements, within one year from commencing their studies at SUMS.

Expected Competencies at the End of the Program

General Competencies*

Procedural Skills (Diagnostic and Therapeutic Procedures)

- 1 Thyroid FNA
- 2 Ultrasound-guided FNA of thyroid
- 3 Inhibitory and stimulatory tests
- 4 Osmometry
- 5 Insulin injection
- 6 Measuring the ketone content of blood and urine
- 7 Using an insulin pump
- 8 Using a glucometer
- 9 Constant monitoring of blood glucose level using CGMs

Educational Strategies, Methods and Techniques*

Student Assessment:

Assessment Methods

The trainers monitor how students provide care and treatment for the patients, the students' academic progress, and their conforming to the principles of medical ethics when interacting with patients and colleague, and fill in relevant assessment forms every six months. Furthermore, meetings are held every six months where trainers and students assess the progress on the curriculum, and trainers discuss and provide feedback to the students regarding their clinical performance and progress. The following assessment methods are generally applied:

1. Written Multiple Choice Questions (MCQ) examination
2. Objective Structured Clinical Examination (OSCE)
3. Case Based Discussion (CBD) assessment
4. Oral examination

Periods of Assessment

The students will be assessed at the end of the program through a written multiple choice examination and an OSCE oral exam. There are also written MCQ exams every three months for two years.

Ethical Considerations*

*Note: The related document(s) can be found at <http://hcmep.behdasht.gov.ir/>.

Ward, unit, or education setting	Contents – Measures	Duration (Months)
Adult endocrinology and metabolism clinic and ward	Visiting and managing outpatients and inpatients, hospitalizing patients, following up patients, attending training programs, medical consultations and on-call hours according to the ward schedule, making progress with thesis, doing procedures	19
Pediatric endocrinology ward and clinic	See above	1
Endocrine pathology ward	Endocrine pathology training	1
Endocrinology and genetics laboratory	Endocrine pathology training	1
Endocrine pathology training		1
Nuclear medicine ward		1

Important Notice:

The above features the curriculum of the Endocrinology and Metabolism Program designed and approved by the Iranian Ministry of Health and Medical Education. Given the fact that Shiraz University of Medical Sciences is constantly improving and updating itself to meet the international academic standards and the state of the art, and based on the availability of facilities, devices, ward, laboratories, etc. at SUMS, all the SUMS curricula are approximately 20% subject to change.