

## **(100-MED-08-03) DM – ENDOCRINOLOGY**

### **Significance of Program**

These specialists play a pivotal role in diagnosing and treating various hormonal conditions that affect overall health and well-being. From childhood and puberty-related issues to bone health and menstrual health, endocrinologists help ensure that our hormonal systems function optimally.

### **Career Options**

A career as an Endocrinologist is a specialised clinical professional. He or she is responsible for diagnosing conditions that affect glands. An Endocrinologist may treat hormone imbalances in the endocrine glands such as pituitary, thyroid, adrenals, ovaries, testes and pancreas.

### **Program Objectives**

The goal of this program is for fellows to become outstanding clinical endocrinologists in either academic or clinical practice settings. This track is best suited for persons who wish the focus of their career to be sub-specialty patient care and/or medical education. Endocrinology deals with hormone-related problems. Due to environmental issues and change in lifestyle, we are familiar with the term “hormonal problem”. It has come to our notice that there are a lot of people who are suffering from this issue, that ends up interfering with their normal body functioning. Endocrinology is seeing huge demand, as we see people suffering from these diseases. Be it, small children or adults, all of them are seeing an increase in hormonal issues. These issues, if not treated at the right time, can be fatal. The scope of endocrinology is excellent both in India and outside India. The doctor’s play an important role in diagnosing hormone-related problems. Medicine is one field that will be in demand as long as the human population continues to exist. Even outside the field of endocrinology is well established

### **Outcomes of the Program**

- Ability to elicit a proper history and relevant clinical findings.
- Ability to interpret results of hormonal assays
- Ability to plan and carry out special diagnostic tests often in conjunction with other departments Familiarity with basic procedures of relevance like USG and FNA thyroid
- Familiarity with the use of devices of relevance to endocrinology practice like continuous glucose monitoring system and insulin pump
- Good communication skills

- Ability to train paramedical staff in imparting basic patient education regarding common endocrine problems

### **Major Course Outlines**

1. Human anatomy relevant to Endocrine clinical practice-Anatomy of various Endocrine glands, blood supply and their developments DM-Endocrinology
2. Human physiology related to Endocrinology-Mechanism of action of different hormones-Peptide hormones and steroids, Genetic control of hormoneogenesis
3. Clinical Pharmacology- related to Endocrinology and Diabetes drugs

#### **Nutrition-**

Normal requirements, assess men to nutritious status, calculation of calories and calorie counting

#### **Endocrinology**

1. Hypothalamous and Pituitary – Neuro Endocrinology, Anterior pituitary, Posterior Pituitary.
2. Thyroid-Thyrotoxicosis, Hypothyroidism, Thyroiditis, Nodular goiter and Thyroid Neoplasia Disorders of Carbohydrate metabolism-Diabetes Mellitus Type 1&2, Complications of Diabetes, Hypoglycemia,
3. Disorders of Lipid metabolism-Obesity-Hyperlipidemias
4. Polyendocrine disorders-Multiple endocrine neoplasia
5. Adrenal-Adrenal cortical disorders, Adrenal Medullary diseases, Endocrine Hypertension.
6. Reproductive system- Sexual differentiation, Testicular disorders, Ovarian disorders, Hormonal contraception, sexual dysfunction in men and women, disorders of sex development, disorders of puberty.
7. Endocrinology of normal growth and Aberrant growth disorders
8. Mineral Metabolism – Hormones and Disorders of Mineral Metabolism, Metabolic bone disease, Hypo & Hyperparathyroidism Paraendocrine syndromes, Hormonal manifestation of malignancy, Carcinoid tumors and carcinoid syndromes.
9. Endocrinology of HIV and AIDS
10. Gastro intestinal hormones and Gut hormones
11. Endocrine changes of pregnancy
12. Endocrinology of aging
13. Immunoendocrine pathophysiology

CORE	Electives	Skill Course
<ul style="list-style-type: none"> <li>ENDOCRINOLOGY</li> </ul>	MEDICINE	Must have a clinical eye to observe the symptoms of a disease and reaction of medicine upon the patients