

NAME OF ROTATION: Clinical Pharmacology

FOCUS OF THIS ROTATION

The goal of this elective rotation is to provide the Internal Medicine trainee in core of discipline with the opportunity to develop advanced competencies in the optimal use of drugs, with the application of pharmacological principles in clinical care. This includes assessing for adverse drug effects, and understanding and applying therapeutics and toxicology including reproductive toxicology, cardiovascular risks, perioperative drug management and psychopharmacology.

CBD stage(s) for this rotation:

- COD

Length of this rotation:

- 1 block

PGY Level(s) for this rotation:

- PGY2
- PGY3

Locations for rotation:

- SHSC
- UHN-TGH

Required training experiences included in this rotation: indicate all that apply

- **Required training experiences (Core of Discipline = PGY2s and PGY3s)**
 - COD 1 Clinical training experiences:
 - 1.1.2 Ambulatory care: clinic and/or day hospital. This must include experience with a broad spectrum of conditions as well as patients with complex disorders
 - 1.1.3 Service providing Clinical pharmacology consultation to other disciplines or to medical subspecialty inpatient units
 - 1.1.4 Service providing preoperative assessment and perioperative care
 - 1.1.6 Experience with critically ill patients. This must include ICU, CCU, and internal medicine consultation to the emergency department
- **Other training experiences (Core of Discipline = PGY2s and PGY3s)**
 - COD 4 Methods of delivery of internal medicine care
 - 4.4.2 Interprofessional ambulatory care

EPAs Mapped to this rotation:	Total # of EPAs
CORE OF DISCIPLINE (COD) PGY2S AND PGY3S	
COD 1 Assessing, diagnosing, and managing patients with complex or atypical acute medical presentations	Optional
COD 2A Assessing and managing patients with complex chronic conditions: Part A: Assessment, Diagnosis, and Management	2
COD 2B Assessing and managing patients with complex chronic conditions: Part B: Patient Education/Communication	1
COD 3A Providing internal medicine consultation to other clinical services: Part A: Patient Assessment and Decision-Making	2
COD 3B Providing internal medicine consultation to other clinical services: Part B: Written Communication:	2

EPAs Mapped to this rotation:	Total # of EPAs
COD 3C Providing internal medicine consultation to other clinical services: Part C: Oral Communication	Optional
COD 7 Discussing serious and/or complex aspects of care with patients, families, and caregivers	1
COD 8 Caring for patients who have experienced a patient safety incident (adverse event)	Do whenever possible

Other assessments during this rotation:	Tool Location / Platform (e.g. POWER, Entrada):
1. ITAR	POWER

Key Objectives for this Rotation:	CanMEDS Role(s):
1. Demonstrate an understanding of clinical pharmacology principles for drug therapy in clinical care.	Medical expert
2. Perform an accurate and appropriately patient assessment for the purpose of applying principles of clinical pharmacology practice.	Medical expert
3. Develop a patient-centered, evidence-based, cost-effective approach to the drug therapy for patient.	Medical expert
4. Apply knowledge of unique aspects of pharmacotherapy in certain populations including the pregnant person, the person with organ dysfunction and the older adult.	Medical expert
5. Recognize and treats adverse drug reactions, including substance abuse and drug overdose.	Communicator
6. Participate in an effective manner with the interprofessional health care team involved in their patients' care, including conflict resolution, when required.	Collaborator
7. Respond to an individual patient's health needs by advocating with the patient within and beyond the clinical environment.	Health Advocate

Royal College Internal Medicine Competencies emphasized on the Geriatrics rotation.

Numbers refer to items identified in the Royal College Competencies document

Therapy

Apply knowledge of pharmacology as it relates to pharmacokinetics, pharmacodynamics, mechanism of action, routes of delivery and elimination, and adverse effects of medications, in understanding the indications/contraindications, side-effects and pharmacokinetics of the following therapies in the care of patients: 1.3.8.

- Analgesics 1.3.8.1.
- Antimicrobials 1.3.8.2.
- Cardiovascular medications 1.3.8.3.
- Endocrine medications 1.3.8.4.
- Immune modulating therapies 1.3.8.5.
- Neuropsychiatric medications 1.3.8.6.
- Respiratory medications 1.3.8.7.
- Systemic therapies for cancer 1.3.8.8.
- Drugs commonly used recreationally 1.3.8.9.
- Supplementary and complementary medications 1.3.8.10.

Toxicology

Apply knowledge of the toxicology of drugs of abuse: prescription and recreational 1.3.9.

Common medical emergencies

Apply knowledge of the manifestations, investigation, and management of common medical emergencies 1.4.13.1.

- Poisoning 1.4.13.1.5.
- Severe drug reactions including but not limited to anaphylaxis and toxic epidermal necrolysis 1.4.13.1.6.