

# Island Health Pharmacy Practice Residency

## SURGERY ROTATION (ORTHOPEDIC)



### Preceptor(s)

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### ROTATION DESCRIPTION

This rotation will involve the direct care of patients admitted to an Orthopedic Surgery unit for management of both surgical and non-surgical orthopedic diagnoses. This rotation is based in Victoria at the Royal Jubilee Hospital (RJH). This rotation will allow the resident to expand their knowledge in many areas of orthopedics, including, but not limited to, post-operative pain management, the management of chronic pain in non-surgical patients, VTE prophylaxis in a variety of surgical and non-surgical situations, treatment of related infections (osteomyelitis, septic arthritis, etc.), and the treatment and prevention of osteoporosis. If time and resources allow, the resident will also be given the opportunity to directly observe an orthopedic surgery.

The resident will be provided with the opportunity to learn about the role of the pharmacist within the patient care team, which serves a variety of orthopedic patients. They will also have the opportunity to make initial assessments and recommendations and then provide follow-up and monitoring for commonly encountered orthopedic conditions. The resident will work to identify and resolve each of their patient's drug therapy problems (DTPs), make suggestions to the interdisciplinary team, monitor therapy, and provide education and feedback regarding evidence-based approaches to treatment. The level of involvement may differ for each patient depending on patient-specific factors; however, every effort will be made to identify and assign patients to the resident for whom complex disease processes, complex medication regimens, or the presence of multiple actual or potential DTPs provide an opportunity for the most beneficial pharmacist involvement as well as an optimal experience for learning and skills development.

Each day, the resident will take on the care of at least one patient admitted to the unit. It is therefore expected that the resident will comprehensively work up and follow a minimum of 20 patients during their four week rotation. The number of patients a resident will be responsible for at one time will vary depending on the acuity and intensity of the patients admitted to the unit. Generally, this will be limited to 10-15 patients at one time. It is the responsibility of the resident to discuss workload with the preceptor if it becomes overwhelming. The preceptor will make every effort to ensure that workload is appropriate and applicable to the goals of the residency.

As new therapeutic topics arise that are relevant to each patient case, they will be covered daily via a combination of self-directed and preceptor-assisted learning. Scheduled therapeutic

discussions on select topics will be confirmed at the start of the rotation, and other items may be discussed informally according to the resident's area(s) of interest/need for learning, as well as the types of patients encountered during the rotation. These topics will generally be preceded by assigned readings.

## **ROTATION GOALS AND OBJECTIVES**

The first goal and list of objectives and required activities are specific to this rotation. Goals two to four and accompanying objectives are common to all direct patient care rotations and are based on the Canadian Pharmacy Residency Board (CPRB) accreditation standards.

### **Rotation Specific Goal 1:**

Develop and apply knowledge and clinical skills specifically related to the specialty practice area of orthopaedic surgery.

### **Objectives:**

The resident will:

1. Work with the preceptor to address all personal learning objectives identified at the beginning of the rotation.
2. In the synthesis of patient care plans, incorporate specific drug and disease knowledge in the following areas, as opportunity arises:
  - a. VTE prophylaxis
  - b. Treatment and prevention of infection in orthopedic patients (including osteomyelitis, septic arthritis, etc.)
  - c. Pain management – both acute and chronic
  - d. Treatment and prevention of osteoporosis
  - e. Management of osteoarthritis
3. Demonstrate understanding of the following patient-related non-therapeutic knowledge as it pertains to the patients encountered in the rotation:
  - Ethical issues (e.g. treatment of pain and infections in palliative patients)
  - Cultural issues (e.g. implications of refusal of certain therapies, etc.)
  - Socioeconomic issues (e.g. risk factors for MRSA infections, ability to obtain and administer necessary medications for a safe discharge)
4. Be able to identify and utilize orthopedic related resources and guidelines.
5. Provide accurate and relevant drug information to other health-care members in a timely manner as requested and required.

## **REQUIRED ACTIVITIES**

A general calendar of activities will be provided on the first day of the rotation. Some degree of flexibility will be required of the resident, as entries on the calendar may change due to the needs of the patients, unit, resident and preceptor.

The resident will:

1. Provide 5 (five) measurable and reasonable learning objectives on the first day of the rotation.
2. Present patient cases to preceptor on a daily basis and discuss appropriate management.
3. Prepare for and attend patient care rounds (bedside rounds or multi-disciplinary rounds).
4. Discuss select therapeutic disease states including pathophysiology and treatment.
5. Participate in other activities as discussed (e.g. Journal Club, case presentation, interdisciplinary education, attendance at educational rounds, etc.).

### **PRECEPTOR CONTACT TIME**

1. The preceptor will spend a minimum of one hour per day with the resident discussing patient cases and approaches to identification, prevention, and resolution of drug-related problems, development of therapeutic plans, and development of monitoring plans. This will not include time spent with the resident during patient care rounds.
2. The preceptor will spend a minimum of one hour per week with the resident discussing select therapeutic disease states.

### **EVALUATIONS AND ASSESSMENT**

The learning needs of the resident will be assessed and informal feedback will be provided to the resident regularly. The resident is expected to assume responsibility for his/her own learning and notify the preceptor if there are any concerns related to meeting any of the stated rotation objectives. Informal check-ins will be conducted to provide formative feedback frequently.

In addition, the resident and preceptor shall complete and review together the mid-point and final evaluations. The mid-point evaluations should be completed at the half-way point of the rotation. Final evaluations shall be completed at the end of the rotation.

#### **Mid-point evaluations:**

- preceptor's evaluation of the resident

#### **Final evaluations:**

- resident's self-evaluation
- resident's evaluation of the rotation and preceptor

- preceptor's evaluation of the resident (Direct Patient Care Rotation In-Training Evaluation of Resident, or ITER)

## **RESIDENTS PERSONAL LEARNING OBJECTIVES FOR ROTATION**

Prior to the start of the rotation the resident will enter three to five personal learning objectives into their one45 procedure log. The resident and preceptor will review these personal learning objectives together on the first day of the rotation. Once the preceptor has read and discussed these personal learning objectives with the resident, they will sign off in the procedure feedback log. The preceptor will then take steps to integrate learning activities into the rotation to help the resident achieve these learning objectives.

The achievement of these objectives will be assessed and documented in Section D of both the midpoint and final evaluation forms.

### **Goals and Objectives For All Direct Patient Care Rotations (Goals 2-4)**

#### **Goal 2:**

Develop and integrate the knowledge required to provide direct patient care as a member of the inter-professional team.

#### **Objectives:**

The resident will be able to:

1. Relate knowledge of the pathophysiology, risk factors, etiology and clinical presentation of medical conditions, including symptoms, physical assessment, relevant diagnostics, and laboratory findings, to patient-specific clinical findings to make appropriate, patient-specific drug therapy recommendations. (2018 CPRB 3.1.1.b)
2. Relate knowledge of pharmacology, pharmacokinetics, pharmaceuticals, and evidence-based therapeutics to patient-specific clinical findings to make appropriate, patient-specific drug therapy recommendations. (2018 CPRB 3.1.1.b, 3.1.2.a.b.c)
3. Acquire and utilize knowledge of safe medication practices to manage and improve medication use for patients. (2018 CPRB 3.2.5, 3.2.6, 3.3.2)

#### **Goal 3:**

Demonstrate the necessary clinical skills to provide direct patient care as a member of the inter-professional team.

## Objectives:

The resident will be able to:

1. Place a high priority on, and be accountable for, selecting and providing care to patients who are most likely to experience drug therapy problems. (2018 CPRB 3.1.1.a, 3.1.7)
2. Establish a respectful, professional, ethical relationship with the patient and/or their caregiver(s). (2018 CPRB 3.1.4, 3.1.8.a)
3. Gather relevant patient information through patient interview and from all appropriate sources. (2018 CPRB 3.1.8.d.e)
4. Develop a prioritized medical problem list and describe the currently active issues that are responsible for the patient's admission or clinic visit. (2018 CPRB 3.1.8.f)
5. Identify, justify, and prioritize a list of patient-specific drug therapy problems. (2018 CPRB 3.1.8.c, 3.2.4)
6. Establish and incorporate patient's desired outcome(s) of therapy and principles of shared decision making into his/her practice. (2018 CPRB 3.1.5, 3.1.6, 3.1.8.b.f)
7. Establish care plans for individual patients that include consideration of the patient's goals and the roles of the other team members. (2018 CPRB 3.1.5, 3.1.6, 3.1.8.b.f)
8. Identify, prioritize, assess, and justify a list of reasonable therapeutic alternatives and discuss pros/cons of each, considering efficacy, safety, patient factors, administration issues, and cost. (2018 CPRB 3.1.2.b.c, 3.1.8.d.e.f)
9. Develop, prioritize, justify, defend and implement a list of patient-specific recommendations for identified drug therapy problems. (2018 CPRB 3.1.1.d, 3.1.3.c, 3.1.6, 3.1.8.f.g)
10. Design and implement monitoring plans for drug therapy outcomes that accommodate new or changing information. Provide patient education related to their medication, self-management and or monitoring (2018 CPRB 3.1.8.h.i)
11. Establish and maintain effective inter- and intra-professional working relationships for collaborative care. Engage in respectful, compassionate, non-judgmental, culturally safe, tactful conversations with members of the healthcare team. Work effectively with other healthcare professionals by actively participating with other care providers in making care decisions. Provide safe and effective transfer of care responsibility during care transitions (2018 CPRB 3.1.3.a.b.e.f)
12. Recognize when care should be handed over to another team member. (2018 CPRB 3.1.3.a.b.e.f)
13. Proactively communicate care plans using written or electronic means of documentation about the care being provided, in a manner that will optimize clinical decision-making, patient safety, confidentiality and privacy. (2018 CPRB 3.1.1.d, 3.1.8.i)
14. Effectively respond to medication- and practice-related questions and educate others in a timely manner, utilizing systematic literature search, critical appraisal skills and appropriate means of communication (verbal or written, as appropriate). (2018 CPRB 3.1.2.a.b.c, 3.5.1.a.b.c.d.e)
15. Independently prioritize tasks, think critically, use scientific reasoning, problem solve and manage own time. (2018 CPRB 2.1.5.3, 3.1.1.c, 3.4.1)

**Goal 4:**

Demonstrate the attitudes and behaviours that are hallmarks of a practice leader and mature professional.

**Objectives:**

The resident will:

1. Demonstrate responsibility for own learning, by exhibiting self-direction, motivation. Modify behaviour in response to feedback. Engage in professional conduct by exhibiting punctuality, communication about deadlines, accepting responsibility for recommendations and reliably following through on all assigned tasks. (2018 CPRB 2.1.5.3, 2.1.5.4, 3.1.1.c, 3.4.1)
2. Demonstrate commitment to the profession, exhibiting professional and ethical conduct. Demonstrate respect for colleagues and members of care teams and understand of role within the inter-professional team. (2018 CPRB 2.1.5.6, 3.1.3.a.b.c.d, 3.2.2, 3.3.4)