

Sarasota Memorial Hospital

PGY1 Pharmacy Residency Program Content, Purpose, and Structure

1. Overview of residency program

Sarasota Memorial Hospital (SMH) started its residency program in July 1999. It is a one-year, **ASHP accredited** training program in a diverse healthcare practice setting. The program focuses on the core areas of practice specified by ASHP and also offers the flexibility to design rotations to match the resident's individual interests. The pharmacy residency program is designed to offer an individualized training plan for each resident based on their interests, goals, past experiences and identified areas for improvement.

2. Purpose

The PGY1 pharmacy residency program at Sarasota Memorial builds on Doctor of Pharmacy (Pharm.D.) education and outcomes to contribute to the development of clinical pharmacists responsible for medication-related care of patients with a wide range of conditions, eligible for board certification, and eligible for postgraduate year two (PGY2) pharmacy residency training.

3. Program Structure

The yearlong residency will consist of a one-week hospital and department orientation followed by a month-long service/training rotation, ten (10) 5 week-long rotations (including 3 electives), and longitudinal experiences for leadership, projects, and service. Six (6) residency positions are available for 2018-19. Residents will alternate taking on the responsibility of Chief Resident to build leadership, management, organizational, and communication skills. The Chief Resident serves as a liaison between residents and preceptors/RPD, coordinates resident meetings/educational programming, manages resident schedules, and coordinates journal clubs/presentations and submission of necessary paperwork and preparation for CE presentations.

4. Core Rotations: The resident will complete **seven** core rotations, which include:

- **Acute Pain Management**

This five week rotation is designed to allow the resident to become proficient at assessing and managing patients with acute and acute on chronic pain in the hospital setting. The resident will be exposed to a variety of patient populations experiencing acute pain (IE-surgical pain, orthopedic pain, cancer pain) with a wide range of comorbidities. Acute pain patients will be stratified by complexity and the resident will be expected to show progression with regard to the complexity of pain patient he/she is able to assess and manage throughout the rotation.

- **Adult Medicine**

The Adult Medicine rotation is a five week unit-based learning experience designed to provide the resident with the ultimate application of knowledge and skill. The resident will gain an understanding of patient care pharmacist workflow, time management, multi-tasking and an appreciation of how the pharmacist can enhance the quality of pharmaceutical care delivered in the department and to the nursing unit. The resident will have the unique opportunity to interact face-to-face with a variety of healthcare professionals, including our new class of internal medicine residents, and make real time interventions on daily structured interdisciplinary bedside rounds. The resident will identify areas they are strong in and those in need of improvement, both clinically and personally. The goal is to have identified and mastered all areas in need of improvement by the end of this rotation.

- **Ambulatory Care**

The purpose of this rotation is to provide residents with the opportunity to learn skills utilized in medication therapy management in the ambulatory care clinic setting. The resident will work directly with the medical residents and attending physicians to manage patient's chronic disease states with a focus on patient medication adherence and education, obtaining medications through patient assistance programs, Good Samaritan pharmacy or discounted medication programs. The resident will also assist the medical team with the management of medication related transitions of care issues after a patient is discharged from the hospital. Primary learning experiences will come from actual patient cases and case discussion. Reading material and guideline recommendations will be provided to the resident.

- **Antimicrobial Stewardship**

This core rotation in antimicrobial stewardship is a 5-week long learning experience. The purpose of this rotation is to allow the resident to gain experience in appropriate empiric and definitive utilization of antimicrobial agents in patients at a large acute care community hospital. The resident will gain exposure to a variety of stewardship concepts and will become proficient at dosing, recommending, and managing antimicrobial agents with regards to PK/PD parameters, site of infection, possible toxicities and other patient specific variables. The resident will have opportunities to monitor and evaluate antimicrobial therapy in various infectious disease states, shadow in the microbiology lab, and round with an infectious disease physician or advanced practice provider.

- **Critical Care**

The critical care rotation is a core, 5 week learning experience. The goal of the critical care pharmacotherapy rotation is to allow the resident to develop pharmacotherapeutic skills in the identification and resolution of drug therapy problems in the critical care setting. In doing so, the resident will assume responsibility for the patient and assure positive drug therapy outcomes and be an active member of the ICU multidisciplinary team. The resident will have the responsibility of co-precepting students. Responsibilities will increase as the weeks progress, leading to the resident working up assigned patients independently and participating in team rounds. The preceptor will be available for questions and will monitor resident skill development and critical thinking skills.

- **Formulary Management**

The goal of this core rotation is to provide the resident with an understanding of policies and procedures as it relates to formulary management and the role of Pharmacy and Therapeutics Committee. The resident will actively participate in the organization's formulary process through various activities such as reviewing the non-formulary medication orders report, managing drug shortages and recalls, reviewing adverse drug reactions in HAS work queue, and improving communication of formulary decisions to staff via the pharmacy webpage. In addition, the resident will also be responsible for answering drug information questions, updating policies for being reviewed at P&T Committee and precepting APPE students completing Advanced Hospital Pharmacy rotation during the same month. Resident is expected to maintain a log of all activities: projects, drug info questions, policies reviewed, meetings attended etc. The log will be used to document and track the progression of the resident and the interventions performed. Other activities such as preparing a drug monograph/ conducting a drug class review, and conducting an MUE are covered as part of the resident's longitudinal learning experience. Throughout the rotation, the resident is expected to use effective verbal and written communication skills. Additionally, the resident is expected to exhibit professional conduct and further develop his/her leadership skills.

- **Informatics**

The goal of the Informatics rotation is to provide the resident with an overview of Informatics and the Pharmacy Information Systems. The resident will gain an understanding of the information flow between the Pharmacy systems and the other major hospital systems including Pharmacy, ADT, CPOE, ADC, EMR, Lab, Respiratory and Finance. The resident will discover how Pharmacy and other hospital information systems affect clinical practice and patient care. The resident will come to know how the medication formulary is created and maintained. The resident will learn how to gather and analyze data and to configure the system to enhance patient care. The resident will also learn the role of the Pharmacy System Administrator including basic system monitoring, maintenance and error correction, and how to support end-users.

5. Elective Rotations: The resident will have the opportunity to complete three elective rotations including, but not limited to:

- **Cardiology**

During this five week elective rotation, the resident will gain experience with respect to the clinical management of patients via three distinct rotation components. They consist of the following: disease state management, hospital protocol management, and patient education. Through the study of disease state management, the resident will learn to evaluate, initiate, monitor and modify an individual patient's current medication regimen for a particular condition (i.e. Atrial Fibrillation, Heart Failure). With this detailed training, the resident will also be able to maximize drug regimens for increased efficacy and results. Management of hospital protocols is also a major portion of the Cardiology Rotation. With various protocols (i.e. SMH Cardiac Heparin Infusion Protocol; Coumadin ® Dosing Protocol), the resident will receive training to independently evaluate, initiate, monitor, modify therapeutic regimens as appropriate when consulted. Through this program, the resident will also gain experience in serving as a liaison between the physician, nurse and patient while coordinating hospital protocols for various medications. Upon completion of this rotation, the resident will have gained substantial exposure regarding the independent management of a pharmaceutical care service in the discipline of Cardiology.

- **Drug Information**

The Drug Information (DI) rotation is offered as an elective 5-week rotation which will build upon skills taught during the Formulary Management core rotation. On this rotation the resident is responsible for responding to drug information requests by providing comprehensive, unbiased, evidenced-based medication information. This includes obtaining the correct information from the inquirer, effectively searching and evaluating appropriate sources of drug information, and successfully disseminating the information to the inquirer. The resident will also be involved with coordinating and leading the Pharmacy and Therapeutics (P&T) Committee. In addition, the resident will be responsible for handling non-formulary requests, updating departmental/hospital policies/protocols as needed, educating staff regarding medication use policy guidelines and formulary changes and reviewing ADR reports. The resident will also be responsible for precepting students on any medication use evaluation or quality improvement initiatives that they have been assigned.

- **Emergency Medicine**

The Emergency Medicine rotation is a 5-week learning experience for PGY-1 pharmacy residents in the Emergency Care Center (ECC) at Sarasota Memorial Hospital. The ECC is a 65-bed emergency department caring for both adult and pediatric patients. The ECC team is comprised of physicians, physician assistants, nurses, medical technicians, and pharmacists. The rotation introduces residents to clinical pharmacy practice in the emergency department (ED) setting. It is designed to further develop the residents' knowledge and understanding of the pharmacotherapy of emergency medicine patients with exposure to a variety of disease states. There are many factors that the ED healthcare team must consider in the therapeutic decision making process, such as the lack of a written history, the possibility of no history, vague chief complaints, and a variety of differential diagnoses. The resident will learn how pertinent drug information and the institution of protocols and order sets can help streamline decision-making in pharmacologic therapy. The resident will also gain an understanding of the provision of emergent medical care and an appreciation of the role of an ED pharmacist as part of the ECC team. The resident will gain an understanding of the patient flow in the ED from triage to discharge from the ED and the hospital.

- **Infectious Disease**

This 5-week elective rotation in Infectious Diseases builds upon on the knowledge and experience gained during the Antimicrobial Stewardship core rotation. This rotation will focus on the management of common infectious diseases encountered in a large acute care community hospital as well as an introduction to the management of chronic HIV patients in the ambulatory setting. Primary learning experiences will come from actual patient cases and case discussions. Residents will also have the opportunity to round with an Infectious Diseases physician and participate on an interdisciplinary team. The outpatient clinical care activities will take place within the clinic located at a local infectious disease office. The clinic runs 2-3 days/month and provides all patients with a structured education and adherence program on HIV therapy. Each session consists of a one on one interview between the patient and the pharmacist.

- **Inpatient Oncology**

During the course of the five week Inpatient Oncology Rotation, the resident will gain experience in developing the skills in identifying and resolving medication related problems and apply sound pharmacotherapy principles to improving patient care. The resident will be responsible for the pharmaceutical patient care of all inpatients (both oncology and non-oncology) on 8WT. An interdisciplinary approach consisting of a close working relationship with nurses, physicians, case managers, dieticians, pharmacists, and health care providers along with direct patient contact should facilitate optimal delivery of this care.

- **Outpatient Oncology**

Outpatient oncology is an elective, five week learning experience at Sarasota Memorial Infusion (SMI). SMI is an ambulatory outpatient infusion center consisting of 2 beds and 13 chairs. Patients on SMI are scheduled by the physician's office for a variety of therapies. Some of these include biotherapy, chemotherapy, hydration, injections, IV antibiotics, and blood products. The rotation is designed to help the resident develop pharmacotherapeutic skills in the identification and resolution of drug therapy problems in oncology patients treated in the ambulatory setting. The pharmacy resident will work toward assuming care for all patients on the unit throughout the learning experience. Resident will provide all chemotherapy education and perform medication reconciliation on all new oncology patients during pre-clinic appointment. The resident will work exclusively on a nursing education project or a pharmacy staff presentation. The resident will present 1 journal club to the pharmacy staff. The resident will work on policy and protocol development as required. Good communication and interpersonal skills are vital to success in this experience. The resident must devise efficient strategies for accomplishing the required activities in a limited time frame.

- **Pediatrics/NICU**

The Pediatrics/NICU rotation is an elective, five week learning experience. The overall goal of this rotation is to develop the resident's understanding of the nature and scope of pharmaceutical care necessary to promote safe and rational use of drugs in the pediatric and neonatal patients. Through participation in daily multi-disciplinary rounds, daily monitoring of assigned patients and scheduled topic discussions, the resident will become familiar with common pediatric disease states and therapies. The resident will also have the opportunity to learn how to accurately prepare very small doses and participate in sterile product preparation for pediatric and neonatal ICU patients. An introduction to the Neonatal Intensive Care Unit (NICU) and overview of this population will also be covered. Good communication and interpersonal skills are vital to success in this experience. The resident must devise efficient strategies for accomplishing the required activities in a limited time frame. The resident is expected to exhibit professionalism, respect, confidentiality and honesty at all times.

- **Psychiatry**

The Psychiatry elective is a five week learning experience. Sarasota Memorial Hospital has two inpatient psychiatric units at Bayside Behavioral Health Center; one for adults and one for adolescents. Patient specific treatment approaches combine advanced medical practice, pharmacology and psychotherapists to treat emotional disorders, which affect interpersonal or occupational functioning. Residents will work with the Psychiatry specialist to maintain the psychopharmacotherapy program, manage medication profiles through making recommendations to physicians, participate in interdisciplinary team meetings, as well as a variety of other duties.

- **Sterile Products**

The IV Room elective is a five week, learning experience with Sarasota Memorial Hospital. IV room services are provided to almost all departments and various patients within the hospital. At all times, there will be at least one full time pharmacist and one full time technician staffing the IV room. The IV room elective will provide the resident an opportunity to gain knowledge of core functions and operations of an IV room. The resident is responsible for all activities related to compounding, verifying and dispensing of sterile products for Sarasota Memorial Hospital. The resident will also focus on the workflow of the IV room which is necessary to deliver the correct IV product to the correct patient in the timeliest manner. In all capacities, the resident will supervise technical staff and answer phone calls from various disciplines on intravenous medication issues that arise (such as compatibility, rates of infusion, etc). Throughout the experience, the resident will learn to interpret and apply United States Pharmacopeial Convention guidelines that provide foundational information for compounding and handling of medications. The resident will learn the concepts and technique which encompasses aseptic technique. Good multitasking, organizational skills, self-confidence and positive composure will be required to master this area.

- **Toxicology**

The Toxicology rotation is a 5-week elective learning experience based in the Emergency Department (ED). Completing the goals and objectives of the Emergency Medicine Elective is a pre-requisite for this rotation. This experience focuses on the care of poisoned patients and is designed to develop the residents' knowledge and understanding of the pathophysiology and toxicokinetics of various xenobiotic exposures seen in the community hospital setting. To participate in patient care, the resident will be stationed in the ED satellite pharmacy and respond to all toxicology consults, adverse drug reactions, accidental and intentional ingestions, environmental exposures, and overdosed patients. The resident will be responsible for authoring all toxicology consult notes in the Electronic Health Record, making written and verbal recommendations to ED providers, and communicating patient care plans to nursing staff. Specialized knowledge regarding toxicology will be gained through patient assessment and discussion, topic discussions, communication with the Poison Control Center, and protocol development.

- **Trauma**

The Trauma rotation is a 5-week elective learning experience for residents. The goal of the trauma rotation is to allow the resident to develop pharmacotherapeutic skills in the identification and resolution of drug therapy problems in the trauma patient population in both the critical care and floor setting. The resident will be responsible for patient workup, attending interdisciplinary rounds, formulating appropriate interventions, completing assigned patient care consults, assisting the team with critical patients and during procedures, and answering questions from the trauma and nursing teams. Topic discussions will occur twice weekly on topics relating to critical care and trauma. The resident will be required to complete a quality improvement project while on service, including but not limited to a nursing inservice, orderset or protocol creation, patient discharge handout, etc. The completion of a journal club is required while on rotation from an article relating to trauma, surgery, emergency medicine, or critical care. The resident will also attend ECC trauma alerts when appropriate.

6. Service Requirements

The year-long service rotation is designed to provide the residents a structured program by which they can master the everyday responsibilities of a staff hospital pharmacist. In addition, they will have the opportunity to enhance their patient care skills by incorporating them into their daily practice. Upon completion of this rotation, the resident will have gained enough exposure to independently practice as a staff hospital pharmacist.

7. Longitudinal Experiences:

The resident will be involved in several longitudinal experiences including:

- **Culture Review Service**

The Culture Review Service is a longitudinal learning experience for PGY-1 pharmacy residents at Sarasota Memorial Hospital. The purpose of the service is to provide culture follow-up for patients in the Emergency Care Center (ECC); this applies to adult and pediatric patients seen in the ECC and discharged home before culture results are available. The rotation is designed to further develop the residents' knowledge and understanding of microbiology and antimicrobial therapy for patients with a variety of disease states. The resident will also gain a better understanding of managing patients' therapy during transitions of care, and will have the opportunity to collaborate with other members of the health care team (e.g., ECC Physicians, ID Pharmacists) in order to formulate therapeutic regimens. The resident will learn how pertinent drug information and the institution of protocols can help streamline decision-making in pharmacologic therapy.

- **Leadership/Administration**

The goal of the longitudinal leadership rotation is to provide residents with the opportunity to learn skills utilized in the management and leadership of a department of pharmacy services. The resident will be exposed to real life examples of how a pharmacist's clinical activities can directly impact the success of the institution through compliance with standards such as Core Measures, CMS Conditions of Participation, HCAHPS and other quality and safety metrics. The resident will work directly with the pharmacy management team to identify opportunities to improve the medication use process and develop problem solving, communication and negotiation skills.

- **Medication Safety**

The Medication Safety rotation is a longitudinal experience for PGY-1 pharmacy residents at Sarasota Memorial Hospital. The goal of the Medication Safety rotation is to familiarize the resident with the role of a pharmacist as a medication safety officer and assist them in developing the skills and expertise necessary to oversee medication error reporting and analysis as well as the development and management of process improvement initiatives related to medication safety. The residents will also gain an understanding of how various aspects of the medication use system impact patient safety. Residents will participate in a variety of medication safety activities including, medication error analysis and action planning, presenting medication error data and information to applicable healthcare personnel, participating on interdisciplinary safety-related committees/teams, AHCA/Accreditation survey readiness, and other medication safety-related projects as assigned.

- **Project Management**

The successful completion of a major residency project is a requirement for each resident. The purpose of doing a major project is for the resident to attain the necessary skills to investigate a clinically relevant problem in a scientific manner. In addition, the data obtained should contribute to the development of the department or the profession as a whole. This project may be in the form of original research, a problem-solving exercise, or development, enhancement, or evaluation of some aspect of pharmacy services. All such projects shall be directed toward useful outcomes and should not merely be academic exercises for the sole purpose of satisfying this requirement. The term "Residency Project Advisor" designates the individual responsible for assisting the resident in carrying out his/her longitudinal project and manuscript. A completed manuscript suitable for publication is required to fulfill this requirement. The manuscript will be considered complete when the stated objectives have been met per the Residency Project Advisor and Residency Advisory Committee. A residency certificate will not be awarded until the manuscript is completed and deemed suitable by the above individuals.

- **Teaching and Education**

The teaching and education experience is designed to further enhance the resident's skills in teaching, precepting, facilitating, and disseminating knowledge. Throughout the residency year, the resident will have the opportunity to take part in a variety of teaching opportunities. This will be accomplished through modeling and coaching of the residents throughout the year. Residents will be exposed to multiple methods of teaching, environments for learning, and a variety of audiences. Teaching opportunities may come in the form of formal (e.g., ACPE approved CE) or informal lectures to pharmacy students (e.g., Biweekly Case Conference), physicians, nurses, other health care professionals, or the public, or may come in the form of developing written educational materials.

8. Presentations

Each resident must complete the following presentations:

- Medication Safety Updates
- Journal Club
- Controversy in Literature Debate
- Resident-Student Topic Discussions – approximately one every 8 weeks
- Community Education to benefit SMH in Fall or Spring
- SRSHP CE in Fall or Spring
- Nursing Inservice
- Research project – poster at ASHP Midyear Clinical Meeting and presentation at regional residency conference (SERC/FRC)
- MUE – present to P&T Committee
- Formulary Monograph and/or Therapeutic Class Review – present to P&T Committee

Additional presentations may be assigned at the discretion of the preceptor, RAC, or RPD.

9. Benefits

- Professional travel reimbursement - travel time and support to ASHP Midyear meeting and regional residency conference (SERC/FRC). Only the registration will be covered for MAD-ID *or* the Spring ACCP Meeting.
- Medical Library (24-hour access)
- Participation in the Tampa Bay Residency Forum (includes 10 other residency programs)
- Competitive salary
- Medical insurance (health, dental, vision)
- Personal Time Off
- Retirement plan contributions
- Resident office
- Resident computer
- Optional ACLS certification

9. Time Off (Education Days/Vacation Days/Extended Leave)

- 7.37 hours per pay period (24 days per year)
- Vacation (10 days per year) and Sick days (3 days per year)
- Vacation time is taken in December (5 days) – the rest of the vacation hours will be paid out at the completion of the residency per hospital policy.