



THE UNIVERSITY OF KANSAS HEALTH SYSTEM

Department of Pharmacy

**PGY2 Pharmacy Informatics Residency
Supplemental Manual
2024-2025**

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Residency Program Purpose

PGY2 residency programs build upon Doctor of Pharmacy (PharmD) education and PGY1 pharmacy residency training to develop pharmacist practitioners with knowledge, skills, and abilities as defined in the educational competency areas, goals, and objectives for advanced practice areas. Residents who successfully complete PGY2 residency programs are prepared for advanced patient care or other specialized positions, and board certification in the advanced practice area, if available.

The purpose of TUKHS informatics residency program is to develop the skills and knowledge necessary for enhancing medication use processes across the continuum of care through use of health information technology. Experiential training opportunities in informatics fundamentals, pharmacy automation, clinical decision support, data analytics, project management, end-user training, and leadership and management are key components of this program. This 2-year program builds on the foundational skills learned through a PGY1 pharmacy practice residency, combining clinical skills and knowledge with effective use of health information technology in order to positively impact the safety, quality, and efficiency of pharmacy practices.

Residency Program Description

The pharmacy informatics PGY2 program is designed to apply clinical skills developed in a PGY1 Pharmacy Residency to leverage healthcare information systems for optimal patient care and outcomes. By offering in-depth training in informatics, automation technology, project management, and interdisciplinary collaborations focused on the medication-use processes, residents will be equipped with the skills and knowledge to assume central roles in the specialty of pharmacy informatics upon completion of this program.

Residency Program Outcomes

1. Demonstrate professionalism
2. Possess the ability to manage one's own practice
3. Demonstrate leadership skills
4. Develop effective written and verbal communication skills
5. Effectively educate multi-disciplinary health care teams in utilizing available medical technology
6. Contribute to the program growth and development of the informatics pharmacy services
7. Utilize pharmacy informatics concepts to positively impact the medication-use process across the continuum of care

Residency Program Structure

Competencies, Goals, and Objectives

In accordance with the ASHP PGY2 Informatics residency competency areas, goals, and objectives, residents are required to meet seven competency areas. Additional competency areas or electives may be defined by the program or optionally selected based on the resident's interests. The goals and objectives for the various competencies will be met

through a variety of rotations, projects, and other experiences such as informatics certificate programs.

Required Competency Areas from the Standards:

- Informatics Fundamentals – Standards and Best Practices
- Information Technology and Automation
- Clinical Decision Support
- Data Analytics
- Project Management
- Teaching, Education, Dissemination of Knowledge, and Evaluation of Learning Activities
- Leadership and Management

Learning Experiences (Rotations)

Organized rotations provide the structure of resident training in specialized areas of pharmacy practice.

Rotation Goals and Objectives

The resident is expected to consider the goals and objectives for each rotation as a foundation for their experience. Competencies, goals and objectives must be reviewed by the resident at the start of each rotation. These goals and objectives may be found in PharmAcademic.

Rotation Expectations

Residents are expected to perform independently and demonstrate proficiency in their rotations. The residency preceptor provides guidance and assistance to the resident and ensures that the goals set forth by the resident and the program are met. The preceptor also provides the resident with frequent evaluation of their progress, including a written evaluation at the conclusion of the rotation.

Frequent, clear communication is the key to a successful resident/preceptor relationship. In order to maximize the learning experience, the resident is expected to, in a timely manner, personally inform the preceptor of all absences, schedule conflicts, or concerns that might arise during the month. It is at the discretion of the preceptor to allow such conflicts. Residents are also required to prepare for topic discussions, read materials in a timely fashion, and perform all other tasks as assigned by the preceptor.

At least one week prior to the start of each rotation, the resident will contact the rotation preceptor to arrange for a pre-rotation meeting. At this pre-rotation meeting, the resident will provide the preceptor with the following:

- Schedule or list of meetings and other commitments the resident has for the month that will require time away from the rotation
- Rotation specific goals (3-5)
- Example rotation specific goals:
 - Identify effective methods for evaluating requests
 - Learn the tools and resources needed to analyze requests and determine potential solutions
 - Complete a project which optimizes a Clinical Decision Support tool

Additional items that should be discussed at this meeting include, but are not limited to: rotation description, starting time each day, rotation location (telecommute vs on-site), rotation expectations, specific goals the preceptor has for the resident to accomplish, readings to be done prior to the rotation, scheduling of a mid-point and end of rotation evaluation, and the general preceptor expectations of the resident as well as resident expectations of the preceptor. See appendix G for a template for this meeting.

Required Learning Experiences:

- Hospital and Informatics Orientation (12 weeks)
- Inpatient EHR Management (12 weeks)
- Ambulatory EHR Management (4 weeks)
- Oncology and Infusion Services EHR Management (4 weeks)
- Pharmacy Informatics Leadership (4 weeks)
- Reporting and Analytics (4 weeks)
- Inpatient EHR On-call (2 weeks)
- Elective (4 weeks)

Elective Rotation Options May Include:

- Revenue Cycle and Supply Chain
- Automation and Distribution Systems
- Repeating or lengthening a required learning experience

Presentations

The resident will develop and finesse their teaching skills throughout the year. This will be done through formal presentations leading journal club discussions, in-depth topic discussions on applicable topics, and didactic lectures presented to Doctor of Pharmacy students at the University of Kansas School of Pharmacy.

Topic Discussions

The resident will be assigned topic discussions regularly on rotations. These discussions should be at an appropriate resident level which includes a discussion of primary literature. The rotation preceptor and resident should discuss expectations prior to topic discussions.

Longitudinal Leadership Journal Article Discussions

Each resident is responsible for picking a leadership or professional development related article and leading a discussion about interesting points within the article. The article/topic should be selected a month in advance and discussed with the RPD. A preceptor will be assigned to help the resident prepare for the discussion. The article should be sent out to the audience **at least 1 week before the discussion**. The Informatics resident will present their discussion to the Pharmacy Informatics team. The Informatics resident should attend other residents' presentations to pharmacy leadership as this is a mandatory activity. These discussions will occur monthly per the schedule. The schedule for these can be found on the Pharmacy Sharepoint along with other presentations.

Pharmacy Informatics Topic Presentation

The PGY2 Informatics resident will present an informatics topic presentation to the pharmacy informatics team during the second half of the PGY2 year. The resident should select a topic that is timely and relevant to the current or future practice of pharmacy or healthcare informatics. The topic should be approved by Pharmacy Informatics RAC in advance.

Pharmacy School Lecture

The Informatics resident may present a didactic lecture to students at The University of Kansas School of Pharmacy based on lecture availability and resident interest/experience.

Project / Research

The resident will complete one major project to demonstrate proficiency in informatics and project management skills. The scope, magnitude, and type of project may vary according to individual interests but must be completed in a manner suitable for presentation.

The project should be directed at enhancing personal and professional growth while benefiting the pharmacy department through innovative changes in the way pharmacy is practiced. All projects shall be directed toward useful outcomes and not merely be an academic exercise for the sole purpose of satisfying this requirement. The purpose of the resident projects is to develop the resident's problem-solving skills and as applicable, to expose the resident to research methods, while addressing an issue or area in need of study, development, or evaluation. The topic should be one of interest to the resident and of value in the provision of pharmaceutical care or to the department in provision of services. Finally, the resident projects should be selected with the intent of submitting the project as a presentation at an applicable conference as well as written summary in manuscript style for purposes of contributing to scientific literature.

Each resident will be assigned a project preceptor(s) to assist with project direction and to guide the resident throughout the research project.

A formal project plan must be submitted to the RPD for evaluation and approval. This proposal will then be presented to RAC to be evaluated for appropriateness of the topic and feasibility. Prior to submission the resident's project preceptor(s) must review and approve the proposal. Throughout the project, the project preceptor(s) shall ensure that the resident is completing the research project according to the established objectives and procedures, and according to the established time-frame.

Upon approval of the project plan, the resident should create a timetable for deadlines. The resident should make every effort to complete their project according to the deadlines provided. Failure to meet deadlines should be discussed with the project preceptor(s) and, if necessary, the RPD. The residency certificate will not be awarded until all requirements are successfully completed.

The poster/presentation, once approved by the project preceptor(s), will be reviewed for final approval by the RPD. The poster and/or presentation should be completed according to the guidelines of the meeting in which it is to be presented.

The resident will present his/her project at the designated conference. The conference for presentation may be Epic's® XGM, a local residency conference, or another conference as approved by the RPD. The resident will be required to have at least two practice presentations in preparation.

The informatics residency year schedule will incorporate time that can be dedicated to working on the major project/research or other projects and presentations as necessary. This project/research time will include one week scheduled in the Fall, three weeks in December, and one week scheduled in the Spring. See Appendix A for an example residency year schedule.

Publication of Written Results

Written results in manuscript for publication may be submitted to an appropriate professional journal. To publish research results that may be applicable to institutions outside of The University of Kansas Hospital, in most circumstances IRB approval is required. The RPD along with project preceptors will be responsible for determining whether the manuscript meets expectations of the program and of the health system prior to submission.

For publication, the resident, in coordination with their project preceptor(s), is responsible for securing required approvals for their project. This may include, but is not limited to, review by a statistician, Institutional Review Board (IRB)/Human Subjects Committee (HSC) submission and review (if applicable), Protocol Review and Monitoring Committee (PRMC) review (if applicable), or other groups as needed.

All residents, preceptors, and co-investigators are required to complete online IRB training prior to submitting a research protocol to the IRB. Additionally, all residents are required to complete online IRB and IHI (Institute for Healthcare Improvement) training.

The manuscript should follow the guidelines and requirements for submission of manuscripts established by the peer reviewed journal intended for submission.

Meetings

To broaden and coordinate the residency experience, residents may be requested to attend a variety of meetings throughout the year. These may be departmental meetings, administrative staff meetings, or clinical meetings. In most cases, the preceptor will assign meeting attendance at the beginning of the month. In other cases, the resident will be requested to attend a specific meeting by another preceptor in order to broaden the resident's educational experience or assist with the development of a project. It is the residents' responsibility to communicate meeting attendance to the appropriate individuals.

RPD Meetings

The Informatics resident will have regularly scheduled 1 on 1 meetings with the RPD. These will occur more frequently at the beginning of the residency year. The objective of this meeting is to discuss specific topics important to development of the resident not covered in other aspects of the program. Other guests may be invited based on the topic being discussed. Outlook appointments will be sent to the residents upon finalization of the meeting date and time.

The resident and the RPD will also meet within 90 days of beginning residency and then quarterly thereafter to review the resident's customized residency plan.

The resident may request ad hoc meetings as necessary and should not hesitate to do so if support of any kind is desired.

Resident Committee Meetings

The Informatics resident will be assigned a position on one of the resident run committees. The resident will attend meetings as needed for their assigned committee. These meetings are considered a priority and the resident should make every effort to attend. Should they not be able to attend this should be discussed with the committee chair and the RPD.

Leadership Journal Club

The resident is required to attend the leadership journal club sessions and should discuss with the RPD if they are unable to attend.

Pharmacy IT Team Meeting and Daily Status Reviews

The Informatics resident is required to attend the weekly Willow Inpatient Team meeting and daily huddles. The resident should attend the Willow Ambulatory and Beacon team huddles while on applicable rotations.

Certifications and Additional Experiences

Epic© Willow Inpatient Certification

This certification course, offered through Epic©, is required in order to gain access to make modifications to TUKHS Epic© EHR system. The certification process will begin during the Informatics Orientation rotation. All requirements of the certification must be met as outlined by Epic©. The resident must achieve certification within five (5) months of employment. Failure to achieve certification will result in dismissal from the program and no residency certificate will be awarded.

Optional Epic© application proficiency

Proficiency in applications of interest are available to be obtained. These may coincide with rotational experiences and may include, but not be limited to, the following: Epic© Beacon, Epic© Willow Ambulatory, and Epic© Reporting and Analytics.

Healthcare or Pharmacy Informatics Certificate Programs

The resident will be provided the opportunity to participate in a certificate program, such as the ASHP Pharmacy Informatics Certification or other more general healthcare informatics certificate, during the second year of residency that will help introduce high level healthcare informatics topics.

Teaching Certificate Program

The Informatics pharmacy resident may complete the University of Kansas Teaching Certificate Program if there are available spots and the resident is interested.

Teaching

Teaching, education, and dissemination of knowledge is one of the four competencies of the resident program. The Informatics residency training ensures that the resident develops proficient skills in this area.

The ideal situation is for every resident to have a significant amount of experience in all areas of education, while at the same time accomplishing this with a minimal amount of time away from rotational activities. It is important to note that some residents will have more opportunities to gain experiences in different areas than others, depending on rotation schedule. However, it is expected that all residents will complete the residency and core objectives for teaching experiences.

Co-Precepting of pharmacy students and residents

Numerous times throughout the residency year, the resident will lead topic discussions, with pharmacy student(s) and/or resident(s), under the preceptor's oversight. Throughout the year, the Informatics resident should assist the student in reviewing patients prior to rounds, during rounds, following up with patients, reviewing drug information question answers or other daily activities during a rotation.

If the Informatics resident has not independently precepted a student during their training they should co-precept a pharmacy student during a rotation. The resident will work with the student's preceptor to develop the rotation schedule, coordinate topic discussions, patient discussions and be involved with the student's evaluation. The resident should ideally have the student on a rotation where they have previous experience.

University of Kansas College of Pharmacy Lectures

The Informatics resident will have the opportunity to present an introductory informatics lecture at the University of Kansas School of Pharmacy if interested and if a lecture spot is available.

Pharmacy Practice (Staffing)

Consistent with the ASHP residency standards, each resident will complete a pharmacy practice component of the residency program to obtain further training through a clinically oriented practice experience. Although often referred to as "staffing" this practice component represents another learning opportunity within the framework of the residency program. Residency training makes the most of experiential opportunities to practically apply knowledge gained in the classroom and clerkships to practice in the service of patients.

The Informatics resident will gain experience through active participation in the provision of clinical pharmacy services by staffing in the inpatient pharmacy. Responsibilities and areas covered may include order verification, dispense verification, clinical monitoring and interventions, personnel oversight, and process improvement opportunities.

Licensure is required for staffing. See the health system residency manual for additional details related to licensure.

The Informatics resident will staff a minimum of every fourth weekend and two holidays.

The resident will be provided a schedule reflecting the weekends and holidays to be worked for the year. Time off will not be granted for assigned shifts. Shifts may be traded with other residents or pharmacists as necessary.

Residents are expected to decline to participate in trades that would require working:

- A shift or area where they are not competent or are in any way uncomfortable
- More than one “double” shift (> 16 hour day) in one 7 day period unless approved by a supervisor
- A “double” order verification shift
- More than 80 hours per week (averaged over 4 weeks)
- More than 6 days in a 7 day period (averaged over 4 weeks)
- Any trade that would result in failure to comply with the duty hours and moonlighting requirements as outlined in the health system Pharmacy Residency Manual

An email to the Pharmacist Scheduler must be sent for all agreed upon trades and all parties involved in the trade must be included in the email.

On-Call Responsibilities

The PGY2 Informatics Resident will spend a minimum of two (2) weeks covering the Willow Inpatient Team on-call responsibilities during the second half of the PGY2 experience. This experience is intended to assist in developing skills relating to prioritization, triaging, and critical thinking. Additionally, this is an opportunity for the resident to gauge their progress and learning as they advance towards practicing independently throughout the residency experience.

Responsibilities include, but are not limited to, resolving health system requests through the HITs ticketing system, responding to all pages, phone calls, text messages, or other notification of urgent/emergent issues received during the call period and handling of these appropriately. See the Willow Inpatient On-Call document outlining specific responsibilities for more details. A member of the Willow Inpatient Team will be available for consult by the resident as necessary during the call period.

Telecommuting requirements as defined below must be adhered to for on-call responsibilities. Additionally, on-call responsibilities may require arrival to health system locations within 30-60 minutes. The secure mobile device paging application along with applicable security applications must be configured on the resident's personal device or use of a physical pager will be required in order to be contacted during the call period.

- To participate in telecommuting privileges, residents are expected to abide by TUKHS Telecommuting Policy
- VPN Access will be needed for telecommuting
- Telecommute days are of value to residents when weather or other extremes inhibit travel to and from the workplace (approved by your preceptor and leadership where appropriate)
- Telecommute access is also a necessity for Informatics on-call coverage for after-hours issues
- **Keep in mind that when you are not on-site in the health system environment you will potentially be missing opportunities to interact with preceptors and leaders **

Community Service

The Informatics Resident is required to coordinate at least 1 community service event for the Pharmacy Informatics Team. The health system encourages participation in community engagement events through HERO volunteers. The resident may select one of the health system HERO events or another venue per their choosing. The resident should coordinate with the RPD to determine a plan and timeline for their community service event. If the time and event selected

occurs during the days just prior to an Epic© upgrade and is during normal business hours, team members who choose to participate may do so as part of their normal working hours.

Requirements for Successful Completion of Residency Program

The Pharmacy Informatics Resident must complete the following requirements in order to graduate and receive a residency certificate. All work products demonstrating completion must be uploaded to PharmAcademic, utilizing the Evidence section of the Resident Portfolio. Where applicable, and particularly for work products that serve as examples of objective based deliverables, these should be linked to the appropriate objective as outlined below. (See the Help Center in PharmAcademic and search "Portfolio" for instructions)

- Complete all requirements outlined in the Pharmacy Residency Manual
- Epic© Willow Certification/Proficiency
- Informatics Topic Presentation (Obj 6.1.3)
- Leadership/Professional Development Journal Club
- Residency conference or Epic© conference project/research presentation (Obj 4.2.5 and Obj 6.1.2)
- Manuscript for project/research (Obj 5.5.2)
- Community Service Event
- Complete a minimum of 20 staffing shifts
- At least one example for each of the following objective based deliverables:
 - Documentation of CQI initiative participation (Obj 1.2.3)
 - Interface testing (Obj 1.3.4)
 - Documentation of contributing to the assessment of the Pharmacy Plan for a system outage (Obj 1.5.3)
 - Configure a medication record (Obj 2.1.1)
 - Develop an optimization recommendation or perform build related to order processing and verification (Obj 2.3.2)
 - Develop an optimization recommendation or perform build related to medication preparation, distribution, and dispensing (Obj 2.4.2)
 - Develop an optimization recommendation or perform build related to medication administration documentation (Obj 2.5.2)
 - Develop an optimization recommendation or perform build related to clinical monitoring (Obj 2.6.2)
 - Develop an optimization recommendation or perform build related to inventory management (Obj 2.7.2)
 - Develop an optimization recommendation or perform build related to transitions of care (Obj 2.8.2)
 - Create a CDS tool with appropriate information, in the right channel, to the right person, in the right format, and at the right time in the workflow (Obj 3.3.1)
 - Use analytical tool(s) to extract, construct, and utilize reports (Obj 4.2.2)
 - Documentation of audience assessment of learning such as audience self-evaluation questions during a presentation (Obj 6.1.4)
 - Documentation of contribution to pharmacy departmental management (Obj 7.2.1)
 - Documentation of participation in the development of budget estimates and financial projections for the acquisition, implementation, and maintenance of a technology system (Obj 7.3.4)

- Participate in constructing or updating the strategic plan for a technology system (Obj 7.4.1)

Evaluations

Evaluation is an integral part of the residency program. The Informatics resident will be evaluated on a regular basis to assess their progress towards meeting the ASHP residency competencies, goals, and objectives. Evaluations will be documented in PharmAcademic.

Resident performance will be evaluated in a timely manner during each rotation or learning experience. All PharmAcademic evaluations must be completed within 7 days of the date they were due and/or the conclusion of the learning experience, whichever comes first. Every effort should be made to complete evaluations in person before the end of the rotation.

The evaluation will include objective assessments of competence in patient care, pharmaceutical knowledge, practice-based learning and improvement, interpersonal and communication skills, professionalism, and systems-based practice.

Baseline Assessment, Plan for Development and Customized Residency Plan

A resident baseline assessment process is utilized to provide a subjective and objective evaluation of the baseline clinical skills for first-year residents. This process will help to identify areas that the resident will need to further develop or focus on throughout the year and serve as a reference for the preceptors and residency leadership to use in their evaluations. The resident may use this as an aid in the self-assessment process, and to help direct their own learning experiences.

The overall goal is to achieve consistency and proficiency in the basic skills among the residents given their various training backgrounds, to identify and provide feedback on areas for improvement, and ultimately help to build an individualized, structured residency plan.

Baseline assessment is completed through the following:

1. PharmAcademic initial assessment of all learning objectives
2. Customized assessment in PharmAcademic or Survey Monkey
3. Computer based and instructor lead clinical pharmacist education modules (Annual Competency)
4. Written examination consisting of a variety of clinical case-based questions (Clinical Skills Day)

Consistent with ASHP residency standards, each pharmacy resident completing the training program shall prepare an individual plan for development. The resident assumes primary responsibility to develop the plan and document their respective goals, interests, strengths, and planned rotations and activities.

The residency program director and coordinator(s) assume a role to mentor the resident and assist in the decision process for the resident. Within the framework of ASHP resident standards and the administrative guidelines of the program the resident is encouraged to assume ownership of their training experience.

In order to prepare a plan, the resident should address the following topics, preferably in a narrative form.

1. State your professional and personal goals, both short term (5 years) and long term (10 years). The focus should be on professional goals, with a brief summary of personal goals. Personal goals may be written on a basis of importance to you, but may include the following areas: family, career, religion, financial, free time, health, and exercise.
2. Describe your current practice interests.
3. Identify your strengths – clinical and personal.
4. List areas of improvement during the residency year.
5. Complete a baseline assessment using survey monkey tool.

Include a current copy of your curriculum vitae.

The plan for development will be uploaded into Pharm Academic and will serve as the foundation for the resident's customized residency plan.

Consistent with ASHP residency standards, the residency program director will develop a customized residency plan for each pharmacy resident. The customized residency plan takes into account each resident's entering knowledge, skills, attitudes, abilities and interests and will serve as the resident's roadmap to successfully accomplishing customized goals. Residents' strengths and weaknesses will be accounted for by incorporating specific learning activities to facilitate development. The customized plan will account for each resident's specific interests while not interfering with the achievement of the program's educational goals and objectives.

The residency program director will meet during orientation training or within 30 days of the start of the program with the resident to individually review the initial customized plan. The plan is meant to be a fluid document that is shaped by the resident's learning experiences throughout the year. It will be reviewed and updated at least every 90 days (July, October, January, and April) by the RPD and resident, including a final review at the completion of the residency.

Residency Program Director's Responsibilities:

After the completion of each rotation and at the end of each quarter, the PRD will review all the required evaluations and will work with the Residency Advisory Committee to address areas in need of improvement and other comments by developing a plan of action.

Preceptor's Responsibilities

Oral communication of residents' performance is a part of the preceptor's responsibility during each rotation and is an on-going process. The preceptor will discuss their rotation's evaluation and expectations with the resident at the beginning of the rotation as well as provide feedback throughout the rotation along with both verbal and formal written evaluations. Additionally, preceptors assigned to tasks that occur outside of rotations, such as user-initiated fixes or small optimizations ("tickets"), will provide oral communication as well as written evaluations using the on-the-fly mechanism of "Provide Feedback to Resident" in PharmAcademic. The preceptor should complete the assigned evaluations within PharmAcademic prior to communicating verbal formal evaluations or within 7 days of completion of the rotation, whichever occurs first.

Preceptors will utilize the appropriate role to facilitate learning, based upon the resident's experience and progression throughout the program. Roles may include but are not limited to direction instruction, modeling, coaching, and facilitating.

Preceptors will strive to utilize the “things to stop”, “things to continue”, and “things to start” method of providing feedback whenever possible so that feedback is actionable and facilitates the growth and development of the resident.

Resident Responsibilities

- Meet with the rotation preceptor prior to the start of each new rotation, primarily to discuss and customize the rotation’s goals and objectives.
- Review the goals and objectives assigned to the rotation as listed in the rotation description prior to the first day of the rotation.
- Meet with the preceptor on a regularly scheduled basis (e.g. weekly), as determined by the preceptor and resident.
- Solicit feedback on performance on a regular basis, including on-the-fly feedback through “Provide Feedback to Resident”
- Modify the rotation or its goals and objectives as necessary.
- Complete the resident self-assessment and rotation/preceptor evaluations in PharmAcademic prior to evaluation meeting(s) with preceptor (within 7 days of completion of the learning experience).

Mentorship

An Informatics Advisor will be assigned at the beginning of residency. Advisors are in place to ensure personal development of each resident through the following methods:

- Gather rotational feedback from preceptors unable to attend Informatics RAC and provide that feedback to Informatics RAC group
- Communicate Informatics RAC feedback to the resident in a timely fashion as necessary
- Develop the resident through informatics guidance, career coaching, and providing guidance on general performance and improvement
- Meet regularly with resident

Supplemental Pay or Complementary Time Off

Residents will be required to take one comp day per month, excluding orientation and the month of December, approximately 8 days in total. Residents may schedule their comp day in coordination with their rotation preceptor and by informing the Informatics RPD via Outlook appointment of the date. If not scheduled by the resident, the comp day will occur on the first Friday of the calendar month.

Expectations for Comp Days

- The resident must be off site
- The resident may use additional PTO as needed around these days while remaining compliant with PTO requirements (section below)
- Once approved by preceptor – the resident will send out a Reminder Note (ex: Jane Doe – Comp Day (no PTO)) to the same group as the PTO (see PTO section)
- The resident may pick up extra shifts for supplemental pay on their comp day as approved by Residency Leadership while maintaining compliance with the Pharmacy Specific Duty Hours Requirements for the ASHP Accreditation Standard for Pharmacy Residencies.

Duty Hours and Moonlighting

See the health system residency manual for details.

Paid Time Off (PTO)

See the health system residency manual for additional details about this benefit.

Residents accrue PTO as a standard employee benefit. PTO may be used for personal reasons, professional reasons, family illnesses, and personal illness. Requests to use PTO must be submitted to and approved by the RPD as well as the preceptor for the rotation during which the PTO is requested. Residents should submit a PTO request to the RPD in the form of an Outlook calendar invite. If an explanation is required, the resident should make arrangements to discuss with the RPD in person or communicate with them via email. Requests for scheduled PTO must be submitted at least 2 weeks prior to the date of use. Residents are encouraged to submit all requests prior to the start of a new rotation. Based on previous experience, more than 3 days of PTO can significantly hinder a resident's ability to meet the expectations of a rotation. For this reason, residents are discouraged from taking more than 3 days of PTO during any given rotation. If the resident requires more than 3 days per rotation, a request may be granted after providing an explanation of the extenuating circumstances to and receiving approval from the RPD. A plan for completing the rotation requirements will be made with the current preceptor as appropriate.

Program Oversight

The PGY2 Pharmacy Informatics Residency will hold monthly meetings with the Residency Advisory Committee (RAC). This committee will guide all elements of the residency program, including program design and preceptor appointment and reappointment.

In an effort of continuous program improvement, a yearly program evaluation will occur. End-of-year input from graduating resident(s) will be obtained through a survey. This will be reviewed along with input from resident evaluations of preceptors and learning experiences, as well as input from preceptors related to the program. Program improvement opportunities will be discussed and coordinated for implementation through RAC.

Preceptor appointment will follow the Preceptor Development Policy within the Department of Pharmacy PGY1 & PGY2 Programs Residency Manual. Preceptors are responsible for complying with this policy in order to be reappointed. The timeline for preceptor activities may also be found within the aforementioned policy.

The RPD or other designated pharmacist preceptor will work closely with any non-pharmacist preceptors to ensure appropriate educational objectives and activities are selected for the learning experience. Feedback from the non-pharmacist preceptor will be incorporated into the summative evaluation with guidance from the designated pharmacist preceptor. This oversight may be achieved through a combination of the following methods: meetings prior to the learning experience to talk through objectives and planned activities, regular touch-bases throughout the learning experience to monitor progress and make adjustments as necessary, and end of learning experience discussion related to evaluation of the resident's performance and learning experience feedback.

Appendix A: Example Learning Experience Schedule

Month	Item
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July - September	Hospital and Informatics Orientation (12 weeks)
September	Research/Project Week (1 week)
October – December	Inpatient EHR Management (12 weeks)
December - January	Research/Project Month (3-4 weeks)
January - February	Oncology and Infusion Services EHR Management (4 weeks)
February	Inpatient EHR On-Call (1 week)
February - March	Ambulatory EHR Management (4 weeks)
March-April	Pharmacy Informatics Leadership (4 weeks)
April	Inpatient EHR On-Call (1 week)
	Research/Project Week (1 week)
May	Reporting and Analytics (4 weeks)
June	Elective (4 weeks)

Appendix B: Example Informatics Residency Research/Major Project Timeline

Month	Item
August	Select Project
	Resident, project preceptor, and RPD meet to discuss research/major project proposal and rough timetable for project completion.
	Resident presents research/major project proposal to RAC (Contact Project Preceptor for specific draft due date)
	Resident submits application to IRB for major research project (if applicable)
September	Resident obtains approval of project plan and timelines from preceptor and RPD
	Project scope defined
	Analysis of project deliverables
	Stakeholder and governance identification
	Communication strategy developed
	Risks tracker and decision tracker created
October - December	Continued analysis and build
	Stakeholder and governance approvals received
	All risks resolved/acknowledged and decisions made
January	Build completed
	Testing
	Training materials created and approved by stakeholders
February	Training provided
	Back-out plan developed and approved
	Go-live and support

Appendix C: Example Projects and Presentations Timeline

Month	Item
June/July	First day of residency
July	Complete ASHP Entering Interests Form (PharmAcademic)
	Complete Entering Objective-Based Self-Evaluation (PharmAcademic)
	Meet with RPD to discuss Initial Customized Training Plan
August	Meet with RPD and project preceptor(s) to discuss available research/major project topics
End of orientation	Deadline to complete CITI and IHI training

September	Resident, project preceptor, and RPD meet to discuss research/major project proposal changes and timetable for project completion.
	Resident presents research/major project proposal to RAC (Contact Project Preceptor for specific draft due date)
	Resident submits application to IRB for major research project (if applicable)
	First Quarter Evaluations Due: <ul style="list-style-type: none"> - Customized Training Plan (RPD and resident to meet to discuss) - Longitudinal Research/Major Project Evaluation (PharmAcademic) - Longitudinal Pharmacy Practice Evaluation (Staffing) (PharmAcademic)
	Begin Leadership Journal Club Presentation <ul style="list-style-type: none"> - Select and obtain approval for article from preceptor - Complete draft of slides for preceptor review - Finalize presentation materials
October	Present Leadership Journal Club Article
November	
December	Attend ASHP Midyear Clinical Meeting
	Research/Major Project Month
January	Second Quarter Evaluations Due: <ul style="list-style-type: none"> - Customized Training Plan (RPD and resident to meet to discuss) - Longitudinal Major Research Project Evaluation (PharmAcademic) - Longitudinal Pharmacy Practice Evaluation (Staffing) (PharmAcademic)
	Major research project data collection complete
February	Abstract/project submission deadline for Epic© XGM and/or residency conference (tentative – exact date will be communicated)
	Begin Informatics Topic Discussion Presentation <ul style="list-style-type: none"> - Select and obtain approval of topic from preceptor - Complete slides for preceptor review - Finalize presentation materials
March	Present Informatics Topic Discussion
	Research/major project slide draft due to project preceptors and RPD
	Third Quarter Evaluations Due: <ul style="list-style-type: none"> - Customized Training Plan (RPD and resident to meet to discuss) - Longitudinal Major Research/Major Evaluation (PharmAcademic) - Longitudinal Pharmacy Practice Evaluation (Staffing) (PharmAcademic)
April	Resident presents practice presentation slides and data collection should be complete by this time. (Contact project preceptor for specific draft due date.)
May	Attend and present research/major project at Epic© XGM or residency conference
	First draft of research/major project manuscript due to project preceptor and RPD (must be in specific journal format intended for publication submission)
	Manuscript edits from RPD and project advisor due to resident
June	Manuscript final draft due to all co-authors
	Final manuscript due to project preceptor and RPD
	Fourth Quarter Evaluations Due: <ul style="list-style-type: none"> - Customized Training Plan (RPD and resident to meet to discuss) - Longitudinal Research/Major Project Evaluation (PharmAcademic) - Longitudinal Pharmacy Practice Evaluation (Staffing) (PharmAcademic)

Appendix D: Personalized Development Plan Template

	Entering Characteristics and Initial Plan: Changes to Program	1 st Qtr Update/ Effectiveness of Changes	2 nd Qtr Update/ Effectiveness of Changes	3 rd Qtr Update/ Effectiveness of Changes
	Date:	Date:	Date:	Date:
To be completed by Resident				
Strengths:				
<ul style="list-style-type: none"> Existing New 				
Areas for Improvement:				
<ul style="list-style-type: none"> Progress: New: 				
Professional Interests and Career Goals:				
<ul style="list-style-type: none"> 				
Wellbeing and Resilience:				
<ul style="list-style-type: none"> Current state: Changes from previous: Wellbeing/resilience activities: 				
To be completed by RPD or designee				
Adjustments to the program based on evaluation of residency program goals and objectives				
Resident Progress:				
<ul style="list-style-type: none"> Objectives rated NI Changes to goals and objectives Required patient care goals and critical objectives 				
Assessment and Plan:				
<ul style="list-style-type: none"> 				

Successful completion tracking

Requirements for successful completion	1 st Qtr Update	2 nd Qtr Update	3 rd Qtr Update	End of Residency Update
Complete ASHP Entering Self-Assessment Form	Date			
KS Pharmacist License	Date			
Documentation of initial training/onboarding	Date			
Complete Epic Willow Certification/Accreditation/Proficiency	Date			
Successful completion of all required rotations	List rotations completed			
Complete all PA evaluations	List rotation evals completed			
ACHR for 80% of all objectives	List % marked ACHR			
No objectives marked NI on final rating	List any objectives marked NI			
Qtrly Dev Plan uploaded to PA	Date			
Projects, presentations, and assignments uploaded to PA	List			
Monthly duty hours documentation completed in PA	Dates			
Complete community service event	Date			
Leadership/Professional Development Journal Club	Date			
Informatics Topic Presentation	Date			

Project Conference Presentation	Date			
Project Manuscript	Date and title			
Complete 20 staffing shifts	# weekend shifts			
Provide End of Year Feedback to RPD	Date			
One example of each of the following objective based deliverables: <ul style="list-style-type: none"> Documentation of CQI initiative participation (Obj 1.2.3) Interface testing (Obj 1.3.4) Documentation of contributing to the assessment of the Pharmacy Plan for a system outage (Obj 1.5.3) Configure a medication record (Obj 2.1.1) Develop an optimization recommendation or perform build related to order processing and verification (Obj 2.3.2) Develop an optimization recommendation or perform build related to medication preparation, distribution, and dispensing (Obj 2.4.2) Develop an optimization recommendation or perform build related to medication administration documentation (Obj 2.5.2) Develop an optimization recommendation or perform build related to clinical monitoring (Obj 2.6.2) Develop an optimization recommendation or perform build related to inventory management (Obj 2.7.2) Develop an optimization recommendation or perform build related to transitions of care (Obj 2.8.2) Create a CDS tool with appropriate information, in the right channel, to the right person, in the right format, and at the right time in the workflow (Obj 3.3.1) Use analytical tool(s) to extract, construct, and utilize reports (Obj 4.2.2) Documentation of audience assessment of learning such as audience self-evaluation questions during a presentation (Obj 6.1.4) Documentation of contribution to pharmacy departmental management (Obj 7.2.1) Documentation of participation in the development of budget estimates and financial projections for the acquisition, implementation, and maintenance of a technology system (Obj 7.3.4) Participate in constructing or updating the strategic plan for a technology system (Obj 7.4.1) 	Obj. and Date			

Appendix E: Pre-rotation Orientation Meeting Template



THE UNIVERSITY OF KANSAS HEALTH SYSTEM

XX Rotation – Resident Name

Preceptor(s):

Dates:

Resident Strengths:

- 1.
- 2.
- 3.

Areas for Improvement:

- 1.
- 2.
- 3.

Learning Experience Goals:

- 1.
- 2.
- 3.

Ongoing Projects/Responsibilities:

- 1.
- 2.
- 3.

Recurring Meetings:

Weekly:

- 1.
- 2.
- 3.

Monthly

- 1.
- 2.
- 3.

Time Away From Rotation (dates and event):

- 1.
- 2.
- 3.

***Reminder to discuss the following with the preceptor:**

- How and when preceptors will provide feedback to the resident
- How and when residents will provide preceptor and learning experience feedback
- Expectations for documenting resident self-evaluation