Inpatient Oncology Rotation

Overview
Residents work in teams of one senior resident (PGY 2 or 3), and one intern (PGY 1). The team usually also includes a fourth-year medical student (MS4). All teams care for patients with hematologic or oncologic diagnoses across the full age range from 17 year and older. Resident teams develop diagnostic and therapeutic management plans in collaboration with the attending physician of record through daily discussion.

Principal Teaching and Learning Activities

Direct Patient Care (DPC)
Timing: Occurs daily
Residents work together with an attending Oncologist caring for individual patients. Residents assume the role of primary caretaker in this setting, and communicate daily with the attending physicians for review of patient management. Resident teams round individually with the nurse caring for each patient on a daily basis to discuss the plan of care.

Combined Teaching/Management Rounds (CTMR)
Timing: Occurs daily
The team rounds daily with the Attending Oncologist for their patients. Rounds may be conducted in various ways to meet the educational needs of the team, and will be organized by the senior resident and the Attending Oncologist jointly. The usual format is formal case presentation of those patients needing in-depth discussion, accompanied by bedside rounds. However, to meet team educational needs, alternatives may include physical exam rounds or a focused review of a topic in general Internal Medicine.

Professor’s Rounds (PR)
Timing: Once weekly for one hour
The team meets with the Program Director for discussion of a single patient on the team. There is a formal presentation, a visit to the bedside, and an in-depth discussion of the case led by the Program Director.

Morning Report (MR)
Timing: Three times weekly for one hour.
All inpatient teams meet with the Program Director, full-time Faculty, and Chief Resident to discuss three patients admitted to the hospital by the presenting team. The discussion is led by the Program Director, with a focus on differential diagnosis, interpretation of data, and subsequent management. The last 5 minutes of each session is dedicated to follow-up of cases presented in the past.

Electrocardiogram Conference (EKG)
Timing: Once weekly for one hour
All inpatient teams meet with a Cardiologist who is an expert in EKG interpretation. The session combines residents reading informative tracings with didactic discussions.
Tumor Board (TB)
Timing: Once weekly for one hour
The team participates in a case-based conference attended by attending providers of multiple specialties, including Oncology, Radiation Oncology, General Surgery, and others. Discussion is focused on how to approach and manage patients with solid tumors. Cases often include patients who have failed standard therapies or who have comorbidities that prevent standard therapy.

Noon Conference (NC)
Timing: Five times weekly for one hour
A review of core topics in Internal Medicine and its subspecialties are covered. In addition, some specific conferences occur each month:

Clinical-Pathological Conference (CPC)
Each PGY1 resident is given an unknown case, prepared by a staff Pathologist, in advance. The intern reviews the salient points of the case and presents a focused differential diagnosis, followed by their final diagnosis. A general Internal Medicine follows with a complementary discussion of the case, followed by the Pathologist of the case who divulges the diagnosis.

Grand Rounds (GR)
A national or international expert lectures on recent advances in his or her field of expertise.

Morbidity and Mortality (M&M)
A resident presents a case admitted to the hospital with an undesirable outcome. There is an analysis done in concert with a Faculty Attending, the Quality Department, and/or the Risk Management Department of the hospital. The focus is on discussing system errors and developing specific solutions that can be implemented in the hospital. Faculty, guest sub-specialists, and residents all participate in the discussion.

Flea Circus (FC)
Four or five interns (PGY 1) briefly present a topic of their choice.

Senior Talk (ST)
Senior residents (PGY 3 only) present a medical topic of their choice with a quality improvement initiative they completed in regards to that topic.

Journal Club (JC)
Timing: Once monthly for 2 hours
The first session every academic year is a faculty-led discussion on the fundamentals of evidence-based medicine. Thereafter, each session is dedicated to a specific organ system within Internal Medicine. Four articles are selected by the Chief Resident, faculty, and/or guest sub-specialists. Residents present the salient points of the article with an analysis of the study’s strengths and weaknesses. Discussion ensues with participation from residents, faculty, guest sub-specialists, and an epidemiologist or statistician.

Root Cause Analysis (RCA)
Timing: Ad hoc
Should a resident care for a patient in whom a safety event is identified, the resident will participate in the Root Cause Analysis meeting led by a member of the Performance Excellence
Committee. The focus is to have open, frank dialogue in a blameless environment to identify causes that led to the safety event, and discuss and implement a plan to correct the issue.

**Recommended Resources**

**General Medicine Textbooks**
All residents are expected to read about their patients in an appropriate general Internal Medicine text. Further, it is expected that all residents develop a structured reading program to cover a broad range of illnesses. The Exempla Saint Joseph Hospital Library maintains a wide variety of textbooks, which are available 24 hours a day, 7 days a week. Additionally, the full online version of *Harrison’s Principles of Internal Medicine* is available on the hospital intranet.

**Online Services**
To supplement textbook reading, the Exempla Saint Joseph Hospital Library provides residents with free access to ACP Pier, Clin-E-Guide, DynaMed, Journal Watch, Lexi-Comp, MD Consult, STAT!Ref, and Up-to-Date. These applications are available through the hospital intranet.

**Literature Review**
All residents are expected to search the literature for articles pertaining to their patients, and to supplement their ongoing reading of general Internal Medicine. The Exempla Saint Joseph Hospital Library provides residents with free access to Clinical Evidence, Cochrane Library, Ovid, and PubMed through the hospital intranet.

**Medical Knowledge Self-Assessment Program©**
A copy of the current MKSAP program is available in the Program Coordinator’s office for review. Residents may check-out volumes to assess and expand their knowledge in any area of Internal Medicine.

**Evaluation of Residents**
Residents are given verbal feedback during the month by their Attending Teaching Physician, and residents are encouraged to solicit verbal feedback from other members of the team. Formal evaluations are conducted online using MyEvaluations.com. Each evaluation is structured according to the ACGME milestones, and is completed by the Attending Teaching Physician, other resident members of the team, and by any student on the team. All evaluations are reviewed with residents quarterly with either their faculty mentor or the Program Director.

**Educational Goals**
Residents are expected to meet the educational goals outlined in the ACGME milestones. The following pages delineate the expected goals, organized by post-graduate year, core competency, and individual milestones.
Patient Care
Clinical Skills and Reasoning – Residents will learn to manage patients using clinical skills of interviewing and physical examination. They will learn competence in the performance of procedures mandated by the ABIM, and how to appropriately use laboratory and imaging techniques.

Historical Data Gathering
- Acquire accurate and relevant history from the patient in an efficiently customized, prioritized, and hypothesis driven fashion (PC-A1).
- Seek and obtain appropriate, verified, and prioritized data from secondary sources such as family, records, and pharmacy (PC-A2).

Performing a Physical Exam
- Perform an accurate physical examination that is appropriately targeted to the patient’s complaints and medical conditions. Identify pertinent abnormalities using common maneuvers (PC-B1).
- Accurately track important changes in the physical examination over time in the inpatient setting (PC-B2).

Clinical Reasoning
- Synthesize all available data, including interview, physical examination, and preliminary laboratory data, to define each patient’s central clinical problem (PC-C1).
- Develop prioritized differential diagnoses, evidence-based diagnostic and therapeutic plan for common inpatient conditions (PC-C2).

Delivery of patient-centered clinical care – Residents will learn to manage patients with progressive responsibility, across the spectrum of clinical diseases seen in the practice of general Internal Medicine in the inpatient ward setting. They will learn to manage undifferentiated acutely and severely ill patients. Residents will learn to manage patients in the counseling, detection, diagnosis and treatment of gender-specific diseases. Residents will learn to manage patients as a consultant to other physicians.

Diagnostic Tests
- Make appropriate clinical decisions based upon the results of common diagnostic testing, including but not limited to routine blood chemistries, hematologic studies, coagulation tests, arterial blood gases, ECG, chest radiographs, pulmonary function tests, urinalysis and other body fluids (PC-E1).

Patient Management
- Recognize situations with a need for urgent or emergent medical care including life threatening conditions (PC-F1).
- Recognize when to seek additional guidance (PC-F2).
- With supervision, manage hematology and oncology patients with common clinical disorders seen in the practice of inpatient general internal medicine (PC-F4).
- With minimal supervision, manage hematology and oncology patients with common and complex clinical disorders seen in the practice of inpatient general internal medicine (PC-F5).
- Initiate management and stabilize patients with emergent medical conditions (PC-F6).
**Medical Knowledge**

Core Knowledge of General Internal Medicine and its Subspecialties – Residents will demonstrate a level of expertise in the knowledge of those areas appropriate for an Internal Medicine specialist. They will demonstrate sufficient knowledge to treat medical conditions commonly managed by internists, and recognize and provide initial management of emergency medical problems.

Knowledge of core content
- Understand the relevant pathophysiology and basic science for common medical conditions (MK-A1).
- Demonstrate sufficient knowledge to diagnose and treat common conditions that require hospitalization (MK-A2).

Common Modalities Utilized in the practice of Internal Medicine – Residents will demonstrate sufficient knowledge to interpret basic clinical tests and images, use common pharmacotherapy and appropriately use and perform diagnostic and therapeutic procedures.

Diagnostic Tests
- Understand indications for and basic interpretation of common diagnostic testing, including but not limited to routine blood chemistries, hematologic studies, coagulation tests, arterial blood gases, ECG, chest radiographs, pulmonary function tests, urinalysis and other body fluids (MK-B1).

**Practice-based Learning and Improvement**

Learning and improvement via answering clinical questions from patient scenarios – Residents will learn to locate, appraise, and assimilate evidence from scientific studies related to their patients' health problems, and use information technology to optimize learning.

Ask answerable questions for emerging information needs.
- Identify learning needs (clinical questions) as they emerge in patient care activities (PBLI-B1).

Acquire the best evidence
- Access medical information resources to answer clinical questions and library resources to support decision making (PBLI-C1).
- Effectively and efficiently search NLM database for original clinical research articles (PBLI-C2).

Appraise the evidence for validity and usefulness
- With assistance, appraise study design, conduct, and statistical analysis in clinical research papers (PBLI-D1).

Apply the evidence to decision-making for individual patients.
- Determine if clinical evidence can be generalized to an individual patient (PBLI-E1).

Learning and improving via feedback and self-assessment – Residents will learn to identify strengths, deficiencies, and limits in their knowledge and expertise. They will set learning and improvement goals, and identify and perform appropriate learning activities. They will learn to incorporate formative evaluation feedback into daily practice. Residents will participate in the education of patients, families, students, residents, and other health professionals.

Improves via feedback
- Respond welcomingly and productively to feedback from all members of the health care team including faculty, peer residents, students, nurses, allied health workers, patients, and their advocates (PBLI-F1).

Participates in the education of all members of the health care team
• Actively participate in teaching conferences (PBLI-H1).

Interpersonal Communication Skills
Patients and Family – Residents will learn to communicate effectively with patients, families, and the public, as appropriate, across a broad range of socioeconomic and cultural backgrounds.

Communicate Effectively
• Provide timely and comprehensive verbal and written communication to patients/advocates (ICS-A1).
• Effectively use verbal and non-verbal skills to create rapport with patients/families (ICS-A2).
• Use communication skills to build a therapeutic relationship (ICS-A3).

Intercultural sensitivity
• Effectively use an interpreter to engage patients in the clinical setting including patient education (ICS-B1).
• Demonstrate sensitivity to differences in patients including but not limited to race, culture, gender, sexual orientation, socioeconomic status, literacy, and religious beliefs (ICS-B2).

 Physicians and other healthcare professionals – Residents will learn to communicate effectively with physicians, other health professionals, and health related agencies. They will learn to work effectively as a member or leader of a health care team or other professional group, and to act in consultative role to other physicians and health professionals.

Transitions of Care
• Effectively communicate with other caregivers in order to maintain appropriate continuity during transitions of care (ICS-C1).

Inter-professional team
• Deliver appropriate, succinct, hypothesis-driven oral presentations (ICS-D1).
• Effectively communicate plan of care to all members of the health care team (ICS-D2).

Consultation
• Request consultative services in an effective manner (ICS-E1).
• Clearly communicate the role of consultant to the patient, in support of the primary care relationship (ICS-E2).

Medical Records – Residents will maintain comprehensive, timely, and legible medical records.

Health records
• Provide legible, accurate, complete, and timely written communication that is congruent with medical standards (ICS-F1).
**Professionalism**  
Physicianship – Residents will demonstrate compassion, integrity, and respect for others. They will be responsive to patient needs that supersedes self-interest, and be accountable to patients, society and the profession.

Adhere to basic ethical principles
- Document and report clinical information truthfully (P-A1).
- Follow formal policies (P-A2).
- Accept personal errors and honestly acknowledge them (P-A3).

Demonstrate compassion and respect to patients
- Demonstrate empathy and compassion to all patients (P-B1).
- Demonstrate a commitment to relieve pain and suffering (P-B2)

Provide timely, constructive feedback to colleagues
- Communicate constructive feedback to other members of the health care team (P-C1).

Maintain accessibility
- Respond promptly and appropriately to clinical responsibilities including but not limited to calls and pages (P-D1).
- Carry out timely interactions with colleagues, patients and their designated caregivers (P-D2).

Demonstrate personal accountability
- Dress and behave appropriately (P-F1).
- Maintain appropriate professional relationships with patients, families and staff (P-F2).
- Ensure prompt completion of clinical, administrative, and curricular tasks (P-F3).
- Recognize and address personal, psychological, and physical limitations that may affect professional performance (P-F4).
- Recognize the scope of his/her abilities and ask for supervision and assistance appropriately (P-F5).

Practice individual patient advocacy
- Recognize when it is necessary to advocate for individual patient needs (P-G1).

**Patient-Centeredness** – Residents will demonstrate respect for patient privacy and autonomy. They will show sensitivity and responsiveness to a diverse patient population, including but not limited to diversity in gender, age, culture, race, religion, disabilities, and sexual orientation.

Respect the dignity, culture, beliefs, values and opinions of the patient.
- Treat patients with dignity, civility and respect, regardless of race, culture, gender, ethnicity, age or socioeconomic status (P-I1).

Confidentiality
- Maintain patient confidentiality (P-J1).

Recognize and address disparities in health care
- Recognize that disparities exist in health care among populations and that they may impact care of the patient (P-K1).
**Systems Based Practice**

Works effectively with other care providers and settings – Residents will learn to work effectively in various health care delivery settings and systems relevant to their clinical practice. They will coordinate patient care within the health care system relevant to their clinical specialty, work in inter-professional teams to enhance patient safety and improve patient care quality. They will learn to work in teams and effectively transmit necessary clinical information to ensure safe and proper care of patients including the transition of care between settings.

Work effectively within multiple health delivery systems
- Understand unique roles and services provided by local health care delivery systems (SBP-A1).

Work effectively within an inter-professional team
- Appreciate roles of a variety of health care providers, including, but not limited to, consultants, therapists, nurses, home care workers, pharmacists, and social workers (SBP-B1).
- Work effectively as a member within the inter-professional team to ensure safe patient care (SBP-B2).
- Consider alternative solutions provided by other teammates (SBP-B3).

Improving health care delivery – Residents will learn to advocate for quality patient care and optimal patient care systems. They will participate in identifying system errors and implementing potential systems solutions. They will recognize and function effectively in high quality care system.

Recognize system error and advocates for system improvement.
- Recognize health system forces that increase the risk for error including barriers to optimal patient care (SBP-C1).
- Identify, reflect upon, and learn from critical incidents such as near misses and preventable medical errors (SBP-C2).

Cost-effective care for patients and populations – Residents will learn to incorporate considerations of cost awareness and risk-benefit analysis in patient and/or population-based care as appropriate.

Identify forces that impact the cost of health care and advocates for cost-effective care.
- Reflect awareness of common socio-economic barriers that impact patient care (SBP-D1).

Practice cost-effective care.
- Identify costs for common diagnostic or therapeutic tests (SBP-E1).
- Minimize unnecessary care including tests, procedures, therapies and ambulatory or hospital encounters (SBP-E2).
PGY 2

Patient Care
Clinical Skills and Reasoning – Residents will learn to manage patients using clinical skills of interviewing and physical examination. They will learn competence in the performance of procedures mandated by the ABIM, and how to appropriately use laboratory and imaging techniques.

- Historical Data Gathering
  - Obtain relevant historical subtleties that inform and prioritize both differential diagnoses and diagnostic plans, including sensitive, complicated, and detailed information that may not often be volunteered by the patient (PC-A3).

- Performing a Physical Exam
  - Demonstrate and teach how to elicit important physical findings for junior members of the healthcare team (PC-B3).

- Clinical Reasoning
  - Modify differential diagnosis and care plan based upon clinical course and data as appropriate (PC-C3).
  - Develop prioritized differential diagnoses, evidence-based diagnostic and therapeutic plan for common inpatient conditions (PC-C2).

- Invasive Procedures
  - Appropriately perform invasive procedures and provide post-procedure management for common procedures (PC-D1).

Delivery of patient-centered clinical care – Residents will learn to manage patients with progressive responsibility, across the spectrum of clinical diseases seen in the practice of general Internal Medicine in the inpatient ward setting. They will learn to manage undifferentiated acutely and severely ill patients. Residents will learn to manage patients in the counseling, detection, diagnosis and treatment of gender-specific diseases. Residents will learn to manage patients as a consultant to other physicians.

- Diagnostic Tests
  - Make appropriate clinical decisions based upon the results of more advanced diagnostic tests (PC-E2).

- Consultative Care
  - Provide specific, responsive consultation to other services (PC-G1).

Medical Knowledge
Core Knowledge of General Internal Medicine and its Subspecialties – Residents will demonstrate a level of expertise in the knowledge of those areas appropriate for an Internal Medicine specialist. They will demonstrate sufficient knowledge to treat medical conditions commonly managed by internists, and recognize and provide initial management of emergency medical problems.

- Knowledge of core content
  - Demonstrate sufficient knowledge to diagnose and treat undifferentiated and emergent conditions (MK-A4).
  - Demonstrate sufficient knowledge to identify and treat medical conditions that require intensive care (MK-A6).

Common Modalities Utilized in the practice of Internal Medicine – Residents will demonstrate sufficient knowledge to interpret basic clinical tests and images, use common pharmacotherapy and appropriately use and perform diagnostic and therapeutic procedures.
Diagnostic Tests
- Understand indications for and has basic skills in interpreting more advanced diagnostic tests (MK-B2).
- Understand prior probability and test performance characteristics (MK-B3).

Practice-based Learning and Improvement
Learning and improvement via answering clinical questions from patient scenarios – Residents will learn to locate, appraise, and assimilate evidence from scientific studies related to their patients’ health problems, and use information technology to optimize learning.
  - Ask answerable questions for emerging information needs.
    - Classify and precisely articulate clinical questions (PBLI-B2).
    - Develop a system to track, pursue, and reflect on clinical questions (PBLI-B3).
  - Acquire the best evidence
    - Effectively and efficiently search evidence-based summary medical information resources (PBLI-C3).
  - Appraise the evidence for validity and usefulness.
    - With assistance, appraise clinical guideline recommendations for bias (PBLI-D2).
  - Apply the evidence to decision-making for individual patients.
    - Customize clinical evidence for an individual patient (PBLI-E2).

Learning and improving via feedback and self-assessment – Residents will learn to identify strengths, deficiencies, and limits in their knowledge and expertise. They will set learning and improvement goals, and identify and perform appropriate learning activities. They will learn to incorporate formative evaluation feedback into daily practice. Residents will participate in the education of patients, families, students, residents, and other health professionals.
  - Improve via feedback
    - Actively seek feedback from all members of the healthcare team (PBLI-F2).
    - Calibrate self-assessment with feedback and other external data (PBLI-F3).
    - Reflect on feedback in developing plans for improvement (PBLI-F4).
  - Improve via self-assessment
    - Maintain awareness of the situation in the moment, and respond to meet situational needs (PBLI-G1).
  - Participate in the education of all members of the health care team
    - Integrate teaching, feedback, and evaluation with supervision of interns’ and students’ patient care (PBLI-H2).
Interpersonal Communication Skills
Patients and Family – Residents will learn to communicate effectively with patients, families, and the public, as appropriate, across a broad range of socioeconomic and cultural backgrounds.

Communicate Effectively
- Engage patients/advocates in shared decision-making for uncomplicated diagnostic and therapeutic scenarios (ICS-A4).
- Utilize patient-centered education strategies (ICS-A5).

Physicians and other healthcare professionals – Residents will learn to communicate effectively with physicians, other health professionals, and health related agencies. They will learn to work effectively as a member or leader of a health care team or other professional group, and to act in consultative role to other physicians and health professionals.

Transitions of Care
- Role model and teach effective communication with next caregivers during transitions of care (ICS-C2).

Medical Records – Residents will maintain comprehensive, timely, and legible medical records.

Health records
- Ensure succinct, relevant, and patient-specific written communication (ICS-F2).

Professionalism
Physicianhip – Residents will demonstrate compassion, integrity, and respect for others. They will be responsive to patient needs that supersedes self-interest, and be accountable to patients, society and the profession.

Demonstrate compassion and respect to patients
- Provide support (physical, psychological, social and spiritual) for dying patients and their families (P-B3).
- Provide leadership for a team that respects patient dignity and autonomy (P-B4).

Provide timely, constructive feedback to colleagues
- Recognize, respond to, and report impairment in colleagues or substandard care via peer review process (P-C2).

Comply with public health policies
- Recognize and take responsibility for situations where public health supersedes individual health (e.g. reportable infectious diseases) (P-H1).

Patient-Centeredness – Residents will demonstrate respect for patient privacy and autonomy. They will show sensitivity and responsiveness to a diverse patient population, including but not limited to diversity in gender, age, culture, race, religion, disabilities, and sexual orientation.

Confidentiality
- Educate and hold others accountable for patient confidentiality (P-J2).

Systems Based Practice
Works effectively with other care providers and settings – Residents will learn to work effectively in various health care delivery settings and systems relevant to their clinical practice. They will coordinate patient care within the health care system relevant to their clinical specialty, work in inter-professional teams to enhance patient safety and improve patient care quality. They will learn to work in teams and effectively transmit necessary clinical information to ensure safe and proper care of patients including the transition of care between settings.
Work effectively within multiple health delivery systems
- Manage and coordinate care and care transitions across multiple delivery systems, including ambulatory, sub-acute, acute, rehabilitation, and skilled nursing (SBP-A2).

Improving health care delivery – Residents will learn to advocate for quality patient care and optimal patient care systems. They will participate in identifying system errors and implementing potential systems solutions. They will recognize and function effectively in high quality care system.
  - Recognize system error and advocate for system improvement.
  - Dialogue with care team members to identify risk for and prevention of medical error (SBP-C3).
  - Understand mechanisms for analysis and correction of system errors (SBP-C4).

Cost-effective care for patients and populations – Residents will learn to incorporate considerations of cost awareness and risk-benefit analysis in patient and/or population-based care as appropriate.
  - Practice cost-effective care.
  - Demonstrate the incorporation of cost-awareness principles into standard clinical judgments and decision-making (SBP-E3).
Patient Care

Clinical Skills and Reasoning – Residents will learn to manage patients using clinical skills of interviewing and physical examination. They will learn competence in the performance of procedures mandated by the ABIM, and how to appropriately use laboratory and imaging techniques.

- **Historical Data Gathering**
  - Role model gathering subtle and reliable information from the patient for junior members of the healthcare team (PC-A4).

- **Performing a Physical Exam**
  - Routinely identify subtle or unusual physical findings that may influence clinical decision making, using advanced maneuvers where applicable (PC-B4).

- **Clinical Reasoning**
  - Recognize disease presentations that deviate from common patterns and that require complex decision making (PC-C4).

Delivery of patient-centered clinical care – Residents will learn to manage patients with progressive responsibility, across the spectrum of clinical diseases seen in the practice of general Internal Medicine in the inpatient ward setting. They will learn to manage undifferentiated acutely and severely ill patients. Residents will learn to manage patients in the counseling, detection, diagnosis and treatment of gender-specific diseases. Residents will learn to manage patients as a consultant to other physicians.

- **Patient Management**
  - Independently manage patients with a broad spectrum of clinical disorders seen in the practice of general Internal Medicine (PC-F8).
  - Manage complex or rare medical conditions (PC-F9).
  - Customize care in the context of the patient’s preferences and overall health (PC-F10).

- **Consultative Care**
  - Provide Internal Medicine consultation for patients with more complex clinical problems requiring detailed risk assessment (PC-G2).

Medical Knowledge

Core Knowledge of General Internal Medicine and its Subspecialties – Residents will demonstrate a level of expertise in the knowledge of those areas appropriate for an Internal Medicine specialist. They will demonstrate sufficient knowledge to treat medical conditions commonly managed by internists, and recognize and provide initial management of emergency medical problems.

- **Knowledge of core content**
  - Demonstrate sufficient knowledge to evaluate complex or rare medical conditions and multiple coexistent conditions (MK-A7).
  - Understand the relevant pathophysiology and basic science for uncommon or complex medical conditions (MK-A8).
  - Demonstrate sufficient knowledge of socio-behavioral sciences including but not limited to health care economics, medical ethics, and medical education (MK-A9).
Practice-based Learning and Improvement
Learning and improvement via answering clinical questions from patient scenarios – Residents will learn to locate, appraise, and assimilate evidence from scientific studies related to their patients' health problems, and use information technology to optimize learning.

Acquire the best evidence
- Appraise the quality of medical information resources and select among them based on the characteristics of the clinical question (PBLI-C4).
- Appraise the evidence for validity and usefulness.
  - With assistance, appraise study design, conduct, and statistical analysis in clinical research papers (PBLI-D3).
  - Independently, appraise clinical guideline recommendations for bias and cost-benefit considerations (PBLI-D4).

Apply the evidence to decision-making for individual patients.
- Communicate risks and benefits of alternatives to patients (PBLI-E2).
- Integrate clinical evidence, clinical context, and patient preferences into decision-making (PBLI-E3).

Learning and improving via feedback and self-assessment – Residents will learn to identify strengths, deficiencies, and limits in their knowledge and expertise. They will set learning and improvement goals, and identify and perform appropriate learning activities. They will learn to incorporate formative evaluation feedback into daily practice. Residents will participate in the education of patients, families, students, residents, and other health professionals.

Improve via self-assessment
- Reflect (in action) when surprised, applies new insights to future clinical scenarios, and reflects (on action) back on the process (PBLI-G2).

Participate in the education of all members of the health care team
- Take a leadership role in the education of all members of the health care team (PBLI-H3).

Interpersonal Communication Skills
Patients and Family – Residents will learn to communicate effectively with patients, families, and the public, as appropriate, across a broad range of socioeconomic and cultural backgrounds.

Communicate Effectively
- Engage patients/advocates in shared decision-making for difficult, ambiguous or controversial scenarios (ICS-A6).
- Appropriately counsel patients about the risks and benefits of tests and procedures highlighting cost awareness and resource allocation (ICS-A7).
- Role model effective communication skills in challenging situations (ICS-A8).

Intercultural sensitivity
- Actively seek to understand patient differences and views and reflects this in respectful communication and shared decision-making with the patient and the healthcare team (ICS-B3).

Physicians and other healthcare professionals – Residents will learn to communicate effectively with physicians, other health professionals, and health related agencies. They will learn to work effectively as a member or leader of a health care team or other professional group, and to act in consultative role to other physicians and health professionals.

Interprofessional team
- Engage in collaborative communication with all members of the healthcare team (ICS-D3).

Consultation
- Communicate consultative recommendations to the referring team in an effective manner (ICS-E3).

Professionalism
Physicianship – Residents will demonstrate compassion, integrity, and respect for others. They will be responsive to patient needs that supersedes self-interest, and be accountable to patients, society and the profession.
  Recognize conflicts of interest
  - Recognize and manage subtler conflicts of interest (P-E3).
  Demonstrate personal accountability
  - Serve as a professional role model for more junior colleagues (e.g. medical students, interns) (P-F6).
  - Recognize the need to assist colleagues in the provision of duties (P-F7).
Practice individual patient advocacy
  - Effectively advocate for individual patient needs (P-G2).

Patient-Centeredness – Residents will demonstrate respect for patient privacy and autonomy. They will show sensitivity and responsiveness to a diverse patient population, including but not limited to diversity in gender, age, culture, race, religion, disabilities, and sexual orientation.
  Respect the dignity, culture, beliefs, values and opinions of the patient.
  - Recognize and manage conflict when patient values differ from their own (P-I2).
  Recognize and address disparities in health care
  - Advocate for appropriate allocation of limited health care resources (P-K3).

Systems Based Practice
Works effectively with other care providers and settings – Residents will learn to work effectively in various health care delivery settings and systems relevant to their clinical practice. They will coordinate patient care within the health care system relevant to their clinical specialty, work in inter-professional teams to enhance patient safety and improve patient care quality. They will learn to work in teams and effectively transmit necessary clinical information to ensure safe and proper care of patients including the transition of care between settings.
Works effectively within multiple health delivery systems
- Negotiate patient-centered care among multiple care providers (SBP-A3).

Works effectively within an inter-professional team
- Demonstrate how to manage the team by utilizing the skills and coordinating the activities of interprofessional team members (SBP-B4).

Improving health care delivery – Residents will learn to advocate for quality patient care and optimal patient care systems. They will participate in identifying system errors and implementing potential systems solutions. They will recognize and function effectively in high quality care system.
  - Recognize system error and advocate for system improvement.
    - Demonstrate ability to understand and engage in a system level quality improvement intervention (SBP-C5).
    - Partner with other healthcare professionals to identify, propose improvement opportunities within the system (SBP-C6).

Cost-effective care for patients and populations – Residents will learn to incorporate considerations of cost awareness and risk-benefit analysis in patient and/or population-based care as appropriate.
- Practice cost-effective care.
  - Demonstrate the incorporation of cost-awareness principles into complex clinical scenarios (SBP-E4).