

OUTPATIENT LIVER

INTRODUCTION:

The purpose of the Liver rotation is to expose residents in internal medicine to acute and chronic liver diseases. Emphasis is on diagnosis of liver diseases by taking a proper history, perform a good physical examination with special emphasis on the abdomen, and careful evaluation of laboratory tests.

In addition, radiological modalities used in the field of hepatology, (ultrasound, CT scan, MRI, angiography, etc.) and microscopic examination of liver biopsy specimens are discussed and evaluated in detail.

Patient Care

The resident is exposed to acute and chronic disease situation which he/she will eventually come in contact with in practice, and will learn how to assess and treat patients with diseases of the liver. The resident will learn in-depth physical examination of the abdomen. All patients have pertinent physical findings, and repeated exposure to these findings gives the resident experience and confidence in evaluating important physical findings. By the end of the rotation, an overview on the work-up of liver diseases based on the history and physical examination, evaluation of laboratory tests and review of the liver biopsy specimens are achieved. Also, diagnosis and treatment of patients with liver masses are emphasized during this rotation.

The resident will see patients of all races and of various economic backgrounds. Consults from Asia with various types of liver diseases are commonly referred to the liver center. The ratio of male to female patients is about equal, and all ages ranging from newborns to geriatric ages.

Procedures and Services

The resident may perform paracentesis and thoracentesis while on the liver service. He/she may also assist with the liver biopsies. The services performed by the resident include write-up of new patients and follow-up notes in the office. In hospital cases, the residents write all the notes and orders, which are then reviewed by the attending physician.

Order Writing

The resident writes all the notes during the outpatient and inpatient visits, including the orders for the inpatients.

Supervision

The resident shares the patient care responsibilities with the attending physician. All inquiries are discussed and addressed. The resident shares in the decision-making regarding diagnostic procedures, interpretation of tests and management of patients' problems.

By the end of this rotation, R2 residents are expected to:

- ✓ Prioritize patient problems
- ✓ Prioritize a day of work
- ✓ Monitor and follow up on patients appropriately
- ✓ Demonstrate caring and respectful behaviors with patients and families
- ✓ Gather essential, accurate information in interviews and physical exams, and review other data
- ✓ Know indications, contraindications, and some risks of some invasive procedures
- ✓ Provide services aimed at prevention and/or maintenance of health
- ✓ Work with all health care professionals to provide patient –focused care.
- ✓ Understand and weigh alternatives for diagnosis and treatment
- ✓ Use diagnostic procedures and therapies appropriately
- ✓ Elicit subtle findings on physical examination
- ✓ Obtain a precise, logical and efficient history
- ✓ Interpret results of procedures appropriately
- ✓ Manage multiple problems simultaneously
- ✓ Develop and carry out management plans
- ✓ Consider patient preferences when making medical decisions
- ✓ Triage patients to an appropriate location

R3 residents are expected to:

- ✓ Reason well in ambiguous situations
- ✓ Spend time appropriate to the complexity of the problem

Medical Knowledge

Mix of Diseases:

The scope of common acute and chronic liver diseases and liver cancers are encountered in the liver center. These include the viral causes of hepatitis, autoimmune liver disease, chronic viral hepatitis, Wilson's disease, hemochromatosis, and primary biliary cirrhosis. Also, since the liver center functions as a referral center for primary and metastatic liver cancers, the resident will see a number of such cases per month. Patients who have had liver transplants all return for follow-up care and the resident has the opportunity to review immunosuppression therapy and the complications associated with liver transplants.

Educational Materials:

Residents will refer to the hepatology textbook available in the liver center during this rotation. Also, the resident reviews pertinent articles on the patient's disease. Literature searches and in depth reading on pertinent topics is required.

Conferences:

The resident is required to give a talk at the end of the rotation on a specific topic related to liver diseases. The resident is expected to attend all noon conferences and resident case conference while on the liver rotation.

Categorical residents are required to take the annual ACP In-Training examination and review their performance with the Program Director as a guide to monitoring their level of medical knowledge in hepatology.

By the end of this rotation, R2 residents are expected to:

- ✓ Demonstrate knowledge of basic and clinical sciences
- ✓ Apply knowledge to therapy
- ✓ Recognize indications, contraindications and risks of commonly used medications and procedures
- ✓ Demonstrate and apply knowledge of epidemiologic and social behavioral sciences to the care of the patient

R3 residents are expected to:

- ✓ Demonstrate an investigatory and analytic approach to clinical situations

Practice-based Learning

Residents must be able to investigate and evaluate their patient care practices, appraise and assimilate scientific evidence, and improve their patient care practices. Residents are expected to:

- analyze practice experience and perform practice-based improvement activities using a systematic methodology
- locate, appraise, and assimilate evidence from scientific studies related to their patients' health problems
- obtain and use information about their own population of patients and the larger population from which their patients are drawn
- apply knowledge of study designs and statistical methods to the appraisal of clinical studies and other information on diagnostic and therapeutic effectiveness
- use information technology to manage information, access on-line medical information; and support their own education
- facilitate the learning of students and other health care professionals

By the end of this rotation, R2 residents are expected to:

- ✓ Understand his or her limitations of knowledge
- ✓ Ask for help when needed
- ✓ Acquire knowledge through self motivation
- ✓ Use computerized sources of results and information to enhance patient care.
- ✓ Accept feedback and develops self-improvement plans
- ✓ Conduct self evaluation with insight
- ✓ Facilitate the learning of students and other health care professionals

R3 residents are expected to:

- ✓ Analyze personal practice patterns systematically and strive to improve.
- ✓ Compare personal practice patterns to larger populations
- ✓ Locate, appraise and assimilate scientific literature appropriate to specialty
- ✓ Apply knowledge of study

Interpersonal and Communication Skills

Residents must be able to demonstrate interpersonal and communication skills that result in effective information exchange and teaming with patients, their patients families, and professional associates. Residents are expected to:

- create and sustain a therapeutic and ethically sound relationship with patients
- use effective listening skills and elicit and provide information using effective nonverbal, explanatory, questioning, and writing skills
- work effectively with others as a member or leader of a health care team or other professional group

By the end of this rotation, R2 and R3 residents are expected to:

- ✓ Write pertinent and organized notes
- ✓ Document timely and legible medical records
- ✓ Use effective listening, narrative and non-verbal skills to elicit and provide information.
- ✓ Work effectively as a member of the health care team
- ✓ Create and sustain therapeutic and ethically sound relationships with patient and families
- ✓ Provide education and counseling to patients, families and colleagues
- ✓ Discuss end of life care with patients/families

Professionalism

Residents must demonstrate a commitment to carrying out professional responsibilities, adherence to ethical principles, and sensitivity to a diverse patient population. Residents are expected to:

- demonstrate respect, compassion, and integrity; a responsiveness to the needs of patients and society that supersedes self-interest; accountability to patients, society and the profession; and a commitment to excellence and on-going professional development
- demonstrate a commitment to ethical principles pertaining to provision or withholding of clinical care, confidentiality of patient information, informed consent, and business practices
- demonstrate sensitivity and responsiveness to patients' culture, age, gender, and disabilities

By the end of this rotation, R2 and R3 residents are expected to:

- ✓ Establish trust with patients and staff
- ✓ Treat all patients equally
- ✓ Show regard for opinions and skills of colleagues
- ✓ Demonstrate respect, compassion and integrity
- ✓ Respond to the needs of patients and society, which supersedes self interest
- ✓ Display initiative and leadership
- ✓ Delegate responsibility to others
- ✓ Demonstrate commitment to on-going professional development
- ✓ Demonstrate commitment to ethical principals pertaining to the provision or withholding of care, patient confidentiality, and informed consent and business practices
- ✓ Demonstrate sensitivity to patient culture, gender, age, preferences and disabilities
- ✓ Acknowledge errors and works to prevent and minimize them

Systems-based Practice

Residents must demonstrate an awareness of and responsiveness to the larger context and system of health care and the ability to effectively call on system resources to provide care that is of optimal value. Residents are expected to:

- understand how their patient care and other professional practices affect other health care professionals, the health care organization, and the larger society and how these elements of the system affect their own practice
- know how types of medical practice and delivery systems differ from one another, including methods of controlling health care costs and allocating resources
- practice cost-effective health care and resource allocation that does not compromise quality of care
- advocate for quality patient care and assist patients in dealing with system complexities

- know how to partner with health care managers and health care providers to assess, coordinate, and improve health care and know how these activities can affect system performance

By the end of this rotation, R2 residents are expected to:

- ✓ Advocate for patients
- ✓ Demonstrate constructive skepticism
- ✓ Assist patients in dealing with health system complexities
- ✓ Apply knowledge of how to partner with other health care providers to assess, coordinate and improve patient care
- ✓ Use systematic approaches to prevent and reduce errors
- ✓ Participate in developing ways to improve systems of practice and health management

R3 residents are expected to:

- ✓ Demonstrate ability to adapt to change
- ✓ Provide cost effective care
- ✓ Understand how individual practices affect other health care professionals, organizations and society
- ✓ Demonstrate knowledge of types of medical practice and delivery systems
- ✓ Practice effective allocation of health care resources

RESIDENT RESPONSIBILITIES:

The principal teaching method is an outpatient setting where there are an average of 30 new patients per month and approximately 300 follow-up patients per month who are seen at the Liver Center. The resident is expected to see the new patients and then present the cases to the attending physician. The findings are then reviewed with the patient, and diagnostic tests and pertinent x-rays are ordered. The liver biopsy slides on each patient are reviewed with the resident so that the pathologic findings may be correlated with the clinical findings. The resident is exposed to approximately 10 to 20 cases of patients with benign or malignant liver lesions per month.

Inpatient consults are also seen by the resident and then reviewed and seen with the attending physician. The resident is expected to write the orders and notes on each inpatient consult.

The Liver Center has a collaborative program with the UCLA Liver Transplantation / Liver Cancer Center. UCLA physicians visit twice per month to attend hepatocellular clinic and the resident and attending physician attend the Liver Cancer Clinic at UCLA twice per month. Patients with liver cancer are evaluated and treatment is discussed in a multidisciplinary conference held at UCLA on clinic days.

EVALUATION:

- Myron J. Tong, PhD, MD will personally evaluate the resident for competence in Patient Care, Medical Knowledge, Practice-based Learning, Communication Skills, Professionalism and Systems-based Practice. Dr. Tong will verbally provide feedback to the resident on his/her performance during the rotation.