COMBINED CLINICAL FELLOWSHIP IN RENAL PATHOLOGY, HEPATO-BILIARY PATHOLOGY, AND TRANSPLANTATION PATHOLOGY PROGRAM

Department of Laboratory Medicine and Pathology
University of Alberta and Edmonton Zone, Alberta Health Services

Submitted by Program Director: Dr. Banu Sis, M.D., F.R.C.P.C., Associate Professor
PROGRAM DESCRIPTION

The Department of Laboratory Medicine and Pathology offers one-year clinical fellowship position, which is designed for the training of board-eligible candidates who desire to practice renal pathology, hepato-biliary pathology, and transplantation pathology. This fellowship provides training for the interpretation of renal and liver pathology specimens in all areas of nephropathology and hepatopathology, including native medical renal diseases, renal transplant pathology, native medical and neoplastic liver and biliary tract diseases, liver transplant pathology as well as heart transplant pathology. However, individual candidates might agree with the program supervisor to focus on one of the above areas during their fellowship.

The Department receives a mix of adult and pediatric biopsies and complex surgical specimens, including, but not limited to, medical native kidney and liver biopsies, neoplastic liver surgical or biopsy specimens, and transplant biopsies from kidney, liver, and heart allografts. Each year, the pathology laboratory at the University of Alberta Hospital and Royal Alexandra Hospital receives approximately 1200 liver biopsy and resection specimens (native and allograft), 600 kidney biopsies (native and allograft), 300 cardiac allograft biopsies. The program is enhanced by the strong clinical services in nephrology, hepatology, and transplant services and the well-established interdisciplinary relationship with the nephrologists, hepatologists, transplant physicians and surgeons. The large number of interesting cases and extensive database allow the Fellow the opportunity to pursue academic interests. Although this is primarily a clinical fellowship, protected time will be available for scholarly work.

Fellows will attend and participate in the weekly clinicopathological nephropathology and hepatopathology rounds. The fellows’ responsibilities will include slide review and preparation of reports of selected cases, presenting at interdepartmental clinicopathological conferences, and teaching and supervision of pathology residents. The fellow will be supervised and guided by subspecialty trained attending pathologists. There are multiple research opportunities in both nephropathology and hepatopathology, ranging from basic science to translational to clinical. The fellow is encouraged and expected to participate in a scholarly project during the year.

PROGRAM OBJECTIVES

CanMEDS Roles in the areas of renal, hepato-biliary, and transplantation pathology

1. Medical Expert As Medical Experts, physicians integrate all of the CanMEDS Roles, applying medical knowledge, clinical skills, and professional attitudes in their provision of patient-centered care. Medical Expert is the central physician Role in the CanMEDS framework

   1. Is able to function in an autonomous manner with little or no supervision from faculty in the intraoperative setting.
   2. Is able to accurately diagnose microscopically the full range of pathologic specimens at the level of a junior staff member. Accuracy will be at the level expected for a practicing Laboratory Medicine specialist in this subspecialty.
3. Is able to handle the full volume of material expected of a practicing Laboratory Medicine specialist in this subspecialty.

2. **Communicator**  
As Communicators, physicians effectively facilitate the doctor-patient relationship and the dynamic exchanges that occur before, during, and after the medical encounter.

4. Is able to compose succinct, accurate reports. Will not require any significant revision to reports.

5. Is able to relay patient reports in a reliable manner verbally in the operative and nonoperative setting.

6. Is able to communicate in an appropriate and professional manner expected of a practicing pathologist with lab staff, peers, supervisors and clinical staff.

3. **Collaborator**  
As Collaborators, physicians effectively work within a healthcare team to achieve optimal patient care.

7. Interacts appropriately with supervisors, peers and laboratory staff and resolves conflict in a professional and effective manner.

4. **Manager**  
As Managers, physicians are integral participants in healthcare organizations, organizing sustainable practices, making decisions about allocating resources, and contributing to the effectiveness of the healthcare system.

8. Manages own time effectively and efficiently.

9. Understands principles of Lab Management including principles of quality assurance and quality management.

5. **Health Advocate**  
As Health Advocates, physicians responsibly use their expertise and influence to advance the health and well-being of individual patients, communities, and populations.

10. Recognizes the effect his or her work will have on individual patients.

11. Orders tests and investigations in a manner that is not wasteful of the resources of the health care system.

6. **Scholar**  
As Scholars, physicians demonstrate a lifelong commitment to reflective learning, as well as the creation, dissemination, application and translation of medical knowledge.

12. Researches in appropriate depth around his or her cases, using recent materials.

13. Is able to critically and professionally evaluate written and verbal opinions on controversial pathologic issues.

14. Teaches residents well.

7. **Professional**  
As Professionals, physicians are committed to the health and well-being of individuals and society through ethical practice, profession-led regulation, and high personal standards of behaviour.

15. Takes responsibility for cases as if they were his or her own.

16. Demonstrates the energy and persistence necessary in order to consistently be accurate.

17. Acts in a professional manner with all lab and hospital staff including supervisors and peers.
18. Contributes to the formation of a respectful and harmonious work environment.

**FELLOWSHIP TRAINING PROGRAM SUPERVISORS**

**Site 1: University of Alberta Hospital**

**Director:**

**Dr. Banu Sis** (Renal, Hepato-Biliary, and Transplant Pathology)
Associate Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, University of Alberta Hospital Site

**Dr. Safwat Girgis** (Hepato-Biliary Pathology)
Associate Clinical Professor, Department of Laboratory Medicine & Pathology
General Pathologist, University of Alberta Hospital Site

**Dr. Michael Mengel** (Renal and Transplant Pathology)
Associate Professor and Interim Chair, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, University of Alberta Hospital Site

**Dr. David Rayner** (Renal and Transplant Pathology)
Associate Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, University of Alberta Hospital Site

**Dr. Kim Solez** (Renal and Transplant Pathology)
Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, University of Alberta Hospital Site

**Dr. Aducio Thiesen** (Hepato-Biliary Pathology)
Associate Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, University of Alberta Hospital Site

**Dr. Atilano Lacson** (Pediatric Hepato-Biliary Pathology)
Clinical Professor, Department of Laboratory Medicine & Pathology
Pediatric Pathologist, University of Alberta Hospital Site

**Dr. Consolato Sergi** (Pediatric Hepato-Biliary Pathology)
Professor, Department of Laboratory Medicine & Pathology
Pediatric Pathologist, University of Alberta Hospital Site

Site 1 (optional rotations)

**Dr. Patricia Campbell** (Histocompatibility and Clinical Immunology)
Transplant Nephrologist, University of Alberta Hospital Site
Director, Histocompatibility Laboratory
Professor, Department of Medicine
Dr. Luis Hidalgo (Histocompatibility and Clinical Immunology)
Co-Director, Histocompatibility Laboratory
Assistant Professor, Department of Laboratory Medicine & Pathology

Site 2: Royal Alexandra Hospital

Dr. Brinda Balachandra (Hepato-Biliary Pathology)
Assistant Clinical Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, Royal Alexandra Hospital Site

Site 4: Grey Nuns Community Hospital

Dr. Todd Chaba (Hepato-Biliary Pathology)
Residency Program Director - Anatomical Pathology
Assistant Clinical Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, Grey Nuns Community Hospital Site

Site 5: DynaLIFE Dx
Dr. Talat Nazir (Hepato-Biliary Pathology)
DynaLIFEdx Core Laboratory
Assistant Clinical Professor, Department of Laboratory Medicine & Pathology
Anatomical Pathologist, DynaLIFEdx Diagnostic Laboratory Services

Program Governance Structure

1. Program Director appointed by departmental Education Committee for a 3 year term position, renewable. Should be a Pathologist holding a faculty position at the University of Alberta.

2. Advisory: Educational Committee, Department of Laboratory Medicine and Pathology
Chair, Department of Laboratory Medicine & Pathology
Program Director, Residency Anatomical PathologyProgram Director, Residency General Pathology
Program Director, Residency Hematological Pathology
Divisional Director, Medical Laboratory Science Program
Graduate Program Coordinator
Departmental Fellowship Coordinator
Departmental UME Coordinator

CURRICULUM

During this Combined Fellowship, the Fellow:
- Participates in regular sign-out sessions and intraoperative evaluations of in-house and referral renal, liver, and transplant pathology specimens. The rotations through the different organ sub-specialties will follow the monthly diagnostic service schedule in the Division of Anatomical Pathology listing the respective preceptors.
- Attends and participates in departmental and interdepartmental clinical rounds or educational lecture series dealing with renal, liver, biliary, and transplant diseases, e.g. weekly Alberta Transplant Institute Lecture series and fellowship lectures, Nephrology grand rounds, GI rounds, weekly clinic-pathological conferences
- Assists with and initiates clinicopathologic correlative projects or basic research projects for presentation and publication
- Participates in at least one research project dealing with renal, liver, biliary, or transplant diseases, from a pathology and clinical perspective:
  - conducts research including, but not limited to, data collection, interpretation, or translational/experimental work
  - prepares the project for publication as first-author under the guidance of a project supervisor (who is also a Supervisor Member of this Fellowship Program)

Resources and Educational Materials

Fellows have access to electronic journals through the University of Alberta Library and the Cameron library on campus should they require access to printed science journals. The Department of Laboratory Medicine and Pathology library and the John Scott library are available on-site.

Textbooks:
- Diagnostic Pathology: Kidney Diseases, Lead Author: Colvin, Robert B., MD (Amirsys Publishing, 2011)
- Heptinstall's Pathology of the Kidney, J. Charles Jennette (Lippincott Williams & Wilkins, 2007)
- Atlas of Liver Pathology, By Gary Kanel and Jacob Korula (Elsevier Ltd, 2010)
- Scheuer's Liver Biopsy Interpretation, By Jay Lefkowitch (Saunders Ltd.; 8th edition, 2010)
- Transplantation Pathology, By Phillip Ruiz (Cambridge Medicine, 2009)

Websites:
- Renal Pathology Society website (guidelines and case reviews)
- Hans Popper Hepatopathology Society website (guidelines and case reviews)
- Canadian Association of Pathology website (case reviews)
- USCAP website (eAcademy and eLibrary)
- ISN website renal pathology (case series)

Departmental digital virtual slide archive
Evaluation
Fellows are evaluated every four months by the Fellowship Supervisors from the respective sub-specialties. Evaluations are completed by faculty, the renal working group, allied health staff and other education staff. Fellows also have the opportunity to evaluate the faculty and the program.

Using the PGME Evaluation form, the evaluations assess competence in:

- Manager and Health Advocate: Patient care
- Medical Expert: Medical knowledge, Systems-based practice
- Professionalism
- Scholar: Practice-based learning and improvement, development of new knowledge
- Communicator and Collaborator: Interpersonal and communication skills

The program director asks for feedback from Supervisors regarding the Fellow’s professional progress, based on their observations during clinical work and academic activities, and meets with the Fellow every four months to review the evaluations and discuss professional growth. Final written summative evaluations are completed for to the Fellow upon completion of the program.

ELIGIBILITY REQUIREMENTS

Clinical Fellows must meet the minimum eligibility requirements for licensure with the College of Physicians and Surgeons of Alberta (CPSA) to take up training at the University of Alberta. The Postgraduate Dean, Faculty of Medicine and Dentistry at the University of Alberta does not support acceptance of the MCCEE as an alternative to specialist recognition. For CPSA eligibility and licensure requirements, visit: http://www.cpsa.ab.ca/

IMPORTANT INFORMATION FOR APPLICANTS:

Specialist Status: Applicants must have completed residency training in the specialty of anatomical pathology or general/clinical pathology, prior to commencing fellowship training in LMP.

Medical Practice License: Training may involve work with patient samples and patient records. Applicants must have a valid Certificate of Registration for Postgraduate Education from the College of Physicians and Surgeons of Alberta (CPSA) or a valid CPSA Independent Practice License. Otherwise applicants are to contact the CPSA for an application package and apply directly to the CPSA at the same time as applying to the University of Alberta.
**Malpractice Insurance:** Applicants must have malpractice insurance with the Canadian Medical Protective Association (CMPA). Coverage can be obtained once the CPSA Certificate of Registration is issued. For information, contact the CMPA directly www.cmpa-acpm.ca/.

**Work Permit (VISA):** Applicants who are neither Canadian citizens nor Permanent Residents require a work permit. The Faculty of Medicine Postgraduate Medical Education Office provides the necessary document(s) as required from the Canadian government office (Canadian Embassy, Consulate, High Commission, etc.) in the applicant's country of origin. There is a non-refundable visa-processing fee at the time of application.

**Language Requirements:** International applicants whose first language and/or language of medical school and patient care was neither English nor French, are required to take the TOEFL iBT (www.ets.org). Minimum acceptable scores are an overall score of 93 with a minimum score of 24 on the Speaking section. Test results must be submitted at the time of application to the training program and must have been taken within the last two years. Applicants who completed residency in Canada are not required to submit TOEFL score.