Nephrology

Critical Care Nephrology Clinical Fellowship

Application details

Prerequisite(s):
Certification in Nephrology
Estimated % clinical workload: 65%
Number of positions annually: 1
Duration: 1 year

Start date: July 1st (excluding PEAP period if required)
Application deadline: September 15th
Contact: Contact: Lesli Ransome at lransome@toh.ca (613)738-8400 ext. 82509
Fellowship Director: Dr. Edward Clark

What we offer you

The University of Ottawa Clinical Fellowship in Critical Care Nephrology is a one-year program designed to provide advanced training in the medical management of patients with acute kidney injury (AKI) and other aspects of critical care nephrology. This includes a focus on developing clinical and technical expertise related to the various renal replacement therapy (RRT) modalities used in the intensive care unit (ICU) setting (including intermittent hemodialysis (IHD), slow low-efficiency dialysis (SLED) and continuous renal replacement therapy (CRRT). Fellows will gain experience in a large and diverse program working with faculty who have expertise in medical education, clinical research, vascular access and technical support of IHD, SLED and CRRT. In addition to clinical training, Critical Care Nephrology fellows will be expected to participate in scholarly activities, including a research project (which may involve clinical or basic science research or quality assurance/improvement), related to critical care nephrology.

The University of Ottawa Nephrology training program program offers an adult nephrology education program, affiliated to the University of Ottawa and accredited by the Royal College of Physicians and Surgeons of Canada. In addition, it offers an American Society of Transplantation (AST) approved Transplantation fellowship, American Society of Hypertension (ASH) approved Hypertension fellowship, Home Dialysis fellowship and Hemodialysis fellowship.

Training will take place within the Division of Nephrology at the Ottawa Hospital and the University of Ottawa. Ample exposure to AKI cases and other critical care nephrology issues is ensured as the Division provides critical care nephrology expertise and manages acute RRT (including IHD, SLED and CRRT) for a tertiary care hospital serving a population of over 1.4 million. The Ottawa Hospital includes: a 20 bed inpatient nephrology ward, 32 bed mixed medical-surgical ICU and 10 bed CCU at the Ottawa General Hospital (OGH) campus; an additional 28 bed mixed medical-surgical ICU and 12 bed Neurological ICU (NICU) at the Ottawa Civic Hospital (OCH) campus (the regional trauma centre for Eastern Ontario); the University of Ottawa Heart Institute (UOHI), a quaternary referral centre with a 20 bed CCU and 20 bed cardiac surgery ICU

(CSICU). IHD is provided in all critical care areas. SLED is provided in both ICUs with CRRT provided at the UOHI in CCU, CSICU and occasionally intra-operatively.

Aim of the Program:

The program will foster advanced clinical knowledge and scholarship in the field of critical care nephrology.

Specifically, the trainee will to achieve the following competences:

a) Ability to independently assess critically ill patients' need for RRT, write the initial prescription (for IHD, SLED and CRRT, as indicated), and adjust based on clinical and laboratory parameters.

b) Ability to independently monitor for, identify, investigate and treat complications related to RRT (including IHD, SLED and CRRT).

c) Ability to independently provide expert longitudinal medical follow-up for patients following an episode of AKI (including ongoing inpatient hemodialysis (outside of the critical care setting), outpatient hemodialysis and in the clinic setting.

d) Knowledge of the responsibilities of a medical director for Critical Care Nephrology including: the ability to perform ongoing quality assurance monitoring related to the provision of RRT in the ICU setting; effective collaboration with other physicians responsible for the care of critically ill patients (including intensivists, cardiologists and anaesthetists) and allied health personnel and hospital administration staff involved in the multi-disciplinary care of critically ill patients.

e) Become a medical expert in vascular access for critically ill patients with acute kidney injury or end-stage kidney disease, including choice of appropriate access, monitoring and management of access-related complications.

f) Gain an acceptable level of understanding of modern hemodialysis/SLED and CRRT machines including the ability to troubleshoot the most common equipment issues.

Training:

The Critical Care Nephrology Fellowship is to be undertaken for a period of 12 months, structured as follows:

a) Two to three months of an inpatient rotation focussed on providing care of patients presenting to the emergency room (ER) or admitted to ICU, CCU, internal medicine Acute Monitoring Area (AMA) (and various other services) at the OGH campus.

b) Two to three months of an inpatient rotation focussed on providing care of patients admitted to ICU, NICU and internal medicine AMA at the OCH campus and the CCU and CSICU of the UOHI.

c) Two months of a ICU rotations at the OGH and/or OCH campus(es).

d) Three months dedicated to the inception and completion of a research project related to critical care nephrology. This may involve clinical or basic science research or quality assurance/improvement.

e) One month dedicated to gaining technical knowledge related to the provision of RRT. This would involve 2 weeks spent with the hemodialysis/SLED technical team where the fellow would perfect their knowledge of water treatment, quality assurance of water quality and hemodialysis/SLED machine maintenance. An additional 2 weeks would be spent with the technical team and nursing staff involved in providing CRRT at the UOHI CCU and CSICU in order to gain expertise in technical issues related to the provision of CRRT.

f) One month elective rotation at another centre (requires approval of program director).

g) Longitudinal bi-weekly, half-day specialized Acute Kidney Injury Follow-up Clinic to achieve expertise in the outpatient medical management of patients after they have recovered from AKI.

Benefits:

The program is expected to raise the level of clinical knowledge in the field of AKI and critical care nephrology. Upon graduation, the fellow will be a clinical expert in medical management of patients with AKI and other aspects critical care nephrology. In addition, the fellow will have established the necessary knowledge and skills for conducting ongoing research relevant to the field of critical care nephrology.