



Division of Urology

The Schulich School of Medicine & Dentistry Western University

Resident Handbook

Revised: July 2023

Division of Urology, Schulich School of Medicine & Dentistry, Western University Resident Manual				
TABLE OF CONTENTS	Page #			
Urology at Western University	3			
Current Urology Faculty & Contact Information	4			
Residency Training Committee Membership/Competence Committee Membership	5			
Urology Education Organization Chart	6			
Program Director / Assistant Program Director Roles	7			
Objectives of Core Training in Surgery and the Principles of Surgery (POS) Exam	8			
Year Specific Objectives – Urology PGY 1-2	9			
Year Specific Objectives – Urology PGY 3-4	11			
Year Specific Objectives – Urology PGY5 (Chief)	12			
Competency Based Medical Education	14			
Rotation Specific Objectives and EPA's – General Urology	17			
Rotation Specific Objectives and EPA's – St. Joseph's Hospital	18			
Rotation Specific Objectives and EPA's – LHSC (UH and VH)	21			
Learning Objectives – Urology Community Electives	24			
Ambulatory Clinic Guidelines	25			
Study Objectives for Urology Residents	26			
Urology Resident Reading Schedule per PGY Year	28			
General Expectations of Urology Residents	32			
Resident Wellness (Learner Wellness and Equity, PGME, PARO. OMA-PHP)	38			
PGME Policies and Guidelines (appeals, safety, conduct, professionalism)	39			
Vacation Protocol	40			
Guidelines for Support of Resident Travel/Conference Expenses	41			
Division of Urology Residents' Travel Award	42			
Dr. Gerald Brock Resident Career Development Award	43			
Urology Resident Elective Policy	45			
On-Call Schedule Policy	47			
Chief Resident Expectations and Guidelines	49			
PGY4-PGY5 Resident Expectations and Guidelines: Post RC Exam	50			
PGY5 Time Away for Exams	51			
Tuesday Morning Coverage for Academic Half Days	52			
Urology Resident Wellness Representative Terms of Reference/Budget	53			
Social Media Committee Policy / Terms of Reference	54			
Robotic Training for Urology Residents	55			
Masters of Surgery Graduate Program	58			

UROLOGY AT WESTERN UNIVERSITY

The Division of Urology at Western University had its beginning in 1954, when a young Urologist, Dr. Lloyd McAninch was appointed as Chief of the newly created subdivision of General Surgery. Dr. McAninch trained in General Surgery at the Western University and Victoria Hospital and in Urology under the pioneer of Urology in Southwestern Ontario, Dr. Eldon Busby. Dr. McAninch did additional urology training in Toronto and as a traveling Fellow visited many centres in the United States.

The excitement of renal transplantation came to Western University in the late 1960's and Dr. McAninch became the leader in organizing animal research and the development of a dialysis unit at Victoria Hospital. In 1966, three human kidney transplants were performed as a team effort involving Urologists, Vascular Surgeons and Nephrologists.

From 1970 to 1972, the face of Urology was greatly altered by the construction of University Hospital campus joining the medical school which had moved there a few years earlier. The Urology Division at the University Hospital was, from the outset, constructed as a nephro-urological unit. Renal transplantation became a major player in the multi-organ transplant program and was always performed by the Urology surgeons.

Dr. McAninch retired in 1974 due to ill health. Dr. McAninch's first two residents, Dr. Jack Wyatt and Dr. Jack Sales became Chiefs of the Urology Services at Victoria Hospital and St. Joseph's Hospital. On Dr. McAninch's retirement, Dr. Wyatt became Professor and Chairman of the University Of Western Ontario Division Of Urology. During Dr. Wyatt's tenure as Program Director, the residency program expanded and training become more formalized.

Dr. Joseph Chin became Chairman and Program Director in 1990 and oversaw the consolidation of the training program to 2 sites, St. Joseph's Health Centre and London Health Sciences Centre-Westminster Campus. In 1993, Dr. John Denstedt became Program Director and in 1998 the reigns were passed to Dr. Hassan Razvi (through to 2005). Dr. Jonathan Izawa served as Program Director from 2005-2009 and Dr. Gerald Brock took on the role from 2010-2014, followed by Dr. Alp Sener as Program Director from 2014-2019 and then Dr. Sumit Dave from 2019-2022. Dr. Peter Wang is the current Residency Program Director, with Dr. Jeffrey Campbell as the Assistant Program Director.

Dr. Hassan Razvi became Chairman (after Dr. Joseph Chin) and city-wide Chief of Urology (2005-2019) at all three sites - St. Joseph's Hospital and London Health Sciences Centre sites (Victoria Hospital and University Hospital). In 2019, Dr. Alp Sener transitioned from Program Director to Chairman of Urology at the Schulich School of Medicine & Dentistry, Western University and Chief of Urology at London Health Sciences Centre (2 sites) and St. Joseph's Health Care London.

At the present time the urology residency program is five years duration, the first two years being devoted to core surgical training and the final three years to clinical and surgical Urology.

The Urology website can be found at:

https://www.schulich.uwo.ca/urology

Please visit this site for all up to date information regarding schedules, calendars, meeting notices and general information.

MEMBERS	OFFICE	SECRETARY	PHONE	EMAIL
Dr. Alp Sener Chair/Chief	LHSC-University Hospital Room C4-208	Angela Gough	x 33352	alp.sener@lhsc.on.ca angela.gough@lhsc.on.ca
Dr. Peter Wang Program Director	LHSC – Victoria Hospital Room B1-132	Victoria Gast	76584	peter.wang@lhsc.on.ca Victoria.gast@lhsc.on.ca
Dr. Jeffrey Campbell Assistant Program Director	St. Joseph's Hospital Room B4-663	Amelia Gallagher	X 66087	jeffrey.campbell@sjhc.london.on.ca amelia.gallagher@sjhc.london.on.ca
Dr. Jennifer Bjazevic	St. Joseph's Hospital Room B4-655	Stephanie Teves	x 66233	jennifer.bjazevic@sjhc.london.on.ca stephanie.teves@sjhc.london.on.ca
Dr. Sumit Dave	LHSC – Victoria Hospital Room B1-190A	Angela Gannon	x 58439	sumit.dave@lhsc.on.ca angela.gannon@lhsc.on.ca
Dr. John Denstedt	St. Joseph's Hospital Room B4-657	Janine Yule	x 66036	john.denstedt@sjhc.london.on.ca Janine.yule@sjhc.london.on.ca
Dr. Melissa Huynh	LHSC – Victoria Hospital Room E2-650	Carol Gerster	X 58451	Melissa.huynh@lhsc.on.ca Carol.gerster@lhsc.on.ca
Dr. Jonathan Izawa	LHSC – Victoria Hospital Room E2-650	Traci DevLugt	x 58550	jonathan.izawa@lhsc.on.ca traci.devlugt@lhsc.on.ca
Dr. Patrick Luke	LHSC - University Hospital Room C4-211E	Amanda Travers	x 33180	patrick.luke@lhsc.on.ca amanda.travers@lhsc.on.ca
Dr. Stephen Pautler	St. Joseph's Hospital Room B4-673	Michelle Demaiter	x 66384	stephen.pautler@sjhc.london.on.ca michelle.demaiter@sjhc.london.on.ca
Dr. Nicholas Power	LHSC – Victoria Hospital Room E2-650	Tawnya Murray	x 76787	nicholas.power@lhsc.on.ca tawnya.murray@lhsc.on.ca
Dr. Hassan Razvi	St. Joseph's Hospital Room B4-656	Melanie Van Damme	x 66259	hrazvi@uwo.ca melanie.vandamme @sjhc.london.on.ca
Dr. Blayne Welk	St. Joseph's Hospital Room B4-671	Brenda Hodgins	x 66367	blayne.welk@sjhc.london.on.ca brenda.hodgins@sjhc.london.on.ca
Kimberly Nitz Program Administrator	Office: St. Joseph's Hospital Room B4-654		x 64405	kimberly.nitz@sjhc.london.on.ca

HOSPITAL MAILING ADDRESSES:		
London Health Sciences Centre - Victoria Hospital 800 Commissioners Road London, ON N6A 4G5	London Health Sciences Centre - University Hospital 339 Windermere Road, London, ON N6A 5A5	St. Joseph's Hospital 268 Grosvenor Street London, ON N6A 4V2

Research:					
Dr. Jeremy Burton	Lawson Research Institute, St. Joseph's Hospital	x 61365	Jeremy.burton@lawsonresearch.com		
Dr. Jessica Prodger	Epidemiol & Biostats, Microbiol & Immunol	x 84743	jprodge@uwo.ca		

RESIDENCY TRAINING COMMITTEE MEMBERSHIP

Dr. Peter Wang	Urology Program Director Director, Surgical Education/Simulation
Dr. Jeffrey Campbell	Assistant Program Director Chair – Competence Committee
Dr. Alp Sener	Chair/Chief Urology LHSC-University Hospital faculty representative
Dr. Nicholas Power	Wellness Faculty Representative LHSC-Victoria Hospital faculty representative
Dr. John Denstedt	SJHC faculty representative
Kimberly Nitz	Urology Program Administrator
Leandra Stringer	Senior Resident Representative
Edem (Andy) Afenu	Resident Wellness Representative

COMPETENCY COMMITTEE MEMBERSHIP

Dr. Jeffrey Campbell (Chair) Dr. Melissa Huynh Dr. Jonathan Izawa Dr. Blayne Welk Kimberly Nitz (Program Administrator)



2022.06.28

FIRST POINTS OF CONTACT FOR RESIDENTS:

 Program Administrator: On-Call schedules (questions, changes) All education schedules Rotation schedules Vacation requests/concerns Elective proposals/questions/paperwork All administrative forms incl. reference forms Site Switches (approved by APD) 	 Program Director/Asst Program Director/Mentor Personal/wellness concerns Education advice/career help Professionalism concerns Interpersonal conflicts Peer to peer positive feedback *Please adhere to this so the PD's do not receive unnecessary emails * 	
 Program Director Roles Resource for residents and faculty Plan/Organize Research Day together with the Research Director Organize/Schedule biannual lap/surgical simulation courses Establish and maintain and update policies and procedures Prepare documentation for accreditation Create and uphold curriculum Member, Urology Finance Committee All Royal College/Department of Surgery/Division of Urology meetings Chair, Residency Training Committee Chair, Fellowship Director Committee Prep, plan and attend CaRMs Interviews Complete FITERS annually BiAnnual Resident Review meetings Ad hoc meetings with residents as issues arise Attend annual ICRE conference 	 Assistant Program Director Roles Assist with Research Day planning Assist PD in organizing and scheduling biannual lap/surgical simulation courses Plan and coordinate summer Olympics Plan and prepare for biannual OSCE's Establish rotation specific objectives Meet with all elective students BiAnnual Resident Review Meetings Chair Competence Committee Chair Residency Training Committee in absence of PD Coverage for PD if PD away Assist in planning and prepping for CARMS Interviews Assist PA with resident rotation schedule and approve resident electives Organize reading schedule Assist with aspects of accreditation process APD to attend annual ICRE conference if PD unable to attend 	
 Program Administrator Roles: Resource for residents and faculty All administrative forms incl. reference forms/letters Coordinate and prepare all education schedules and activities Rotation schedules Prepare all documentation for accreditation 	 Resident support (communication, schedules, call conversions, vacation requests, annual travel, documentation for electives, references, etc) Prepare and support all documentation for RTC, CC, orientation Assist with all aspects of CaRMS process 	

THE OBJECTIVES OF CORE TRAINING IN SURGERY AND THE PRINCIPLES OF SURGERY (POS) EXAM

You will be provided with the objectives for the Principles of Surgery (POS) exam from the Department of Surgery Education Office.

For the up to date Objectives of Surgical Foundations Training, please visit the Royal College of Physicians and Surgeons of Canada website at: <u>http://www.royalcollege.ca</u> Select the tab: *Credentials, Examinations & Accreditation* Select: *Information by Specialty* from the dropdown menu

Under the Section Information by Special Programs select Surgical Foundations from the dropdown menu

Principles of Surgery (POS) Seminars

The Royal College of Physicians and Surgeons holds the Principles of Surgery (POS) exam each May. This is a one day long multiple choice exam written by PGY 2 general surgical and most subspecialty surgical residents, including Urology. In order to be eligible to write the Royal College specialty examination at the completion of training, the <u>POS exam must be passed</u>.

A comprehensive series of lectures is organized each year by the Core Surgery Coordinator to prepare trainees for the POS. <u>All PGY 1 & 2 residents are expected to attend these lectures</u>. In conjunction with these didactic sessions, hands-on instruction of suturing and stapling techniques are given. An Advanced Trauma Life Support (ATLS) course is also offered each year for the core surgical residents.

YEAR SPECIFIC OBJECTIVES - UROLOGY

The general training objectives for Urology Residents in training across Canada have been outlined in a document formulated by the Specialty and Training Committee of the Canadian Urological Association. These objectives elaborate in detail the expected knowledge and technical acumen required to achieve a level of proficiency commensurate with successful completion of the Royal College Examinations and to be capable of competence in clinical practice.

The following objectives have been developed to assist trainees in reviewing their progress as they proceed though each rotation and year of clinical urology training at UWO. In addition, specific study objectives have been put together to help residents formulate a study schedule. The curriculum map (see appendix) details the number of EPA assessments required per year.

These specific objectives should be reviewed in conjunction with the more broad CUA training objectives.

YEAR SPECIFIC OBJECTIVES - UROLOGY PGY 1-2 (JUNIOR RESIDENT)

CLINICAL

The junior resident serves as an integral part of the hospital-based team. Residents at this level work in collaboration with the Senior/Chief residents and Consultants. Junior residents should be involved in all aspects of patient management through attendance in the outpatient clinics, Emergency Department, inpatient clinical teaching units (CTU) and operating rooms. The junior resident may be the first one called to see inpatient consultations. The resident should demonstrate the ability to manage urologic emergencies such as:

- 1. Urinary retention
- 2. Acute renal colic
- 3. The difficult catheterization
- 4. Acute scrotal pain
- 5. Priapism
- 6. Renal Failure

PGY1 and 2 residents should be able to demonstrate competent handling of uncomplicated pre-and post-operative care.

TECHNICAL SKILLS

At the completion of the PGY2 year, technical expertise in endoscopic techniques and minor open surgical procedures should be acquired. By the end of the year, a PGY2 resident will be expected to perform simple endoscopic and minor open surgical procedures with consultant supervision. The resident should also be present to observe and assist with the more complex procedures. If the resident is scheduled to be in clinic on a particular day, he/she has the permission to leave for a portion of the clinic so as to obtain exposure to various PGY-level specific cases in the OR.

The following is a list of procedures that should be mastered in the PGY2 year:

1) Endoscopic Procedures

- a) Cystoscopy and urethroscopy
- b) Urethral dilatation
- c) Vesical and urethral biopsy and fulguration

- d) Visual Internal urethrotomy
- e) Litholapaxy

2) Open Surgical Procedures

- a) Ability to open and close abdominal and flank incisions
- b) Urethral meatotomy
- c) Insertion of percutaneous suprapubic tube
- d) Suprapubic cystostomy
- e) Circumcision
- f) Excision and fulguration of veneral warts
- g) Penile biopsy
- h) Testicular biopsy
- i) Vasectomy
- j) Cystolithotomy
- k) Drainage of periurethral/perivesical abscess
- I) Scrotal or inguinal surgery
- m) Insertion of testicular prosthesis

READING

The required reading for the Royal College examination certification in Urology is based upon knowledge obtained from a variety of sources including Campbell's Urology, American Urological Association Updates and review articles form the Journal of Urology. A reading plan has been created by the Program as guide to help residents get through Campbell's Urology (please see attached Appendix). AUA updates and Journal of Urology Review articles over the past five years should be collected by the resident and reviewed. It is recommended that the resident create a steady study schedule to ensure adequate time for assimilation of the book knowledge. The goal of the reading plan is to ensure that each resident completes all reading, in preparation for the Royal College certification exam, by the beginning of their PGY5 year.

TEACHING

By the end of PGY2 year, are expected to assist in the teaching of clinical clerks that rotate through the service, and will be assigned clerks to mentor and teach. PGY1 and 2 residents are responsible for preparing and presenting several basic science or clinical topics to the other residents supervised by the one of the consultant staff. Residents are expected to confer with the consultant staff assigned to supervise the topic at least one week in advance of the seminar date to review the material to be presented.

A two-week Surgical Foundations bootcamp is scheduled annually for incoming PGY1s – this is mandatory to attend and schedules will be sent out in advance. As well, weekly Surgical Foundations sessions are scheduled (Wednesdays) throughout the year. A two-day Urology bootcamp is also mandatory for incoming PGY1s. This is coordinated in conjunction with Toronto and Hamilton and will rotate through the three cities. The Program Administrator will advise of the date/location.

RESEARCH

All residents in the clinical urology years are expected to undertake a research project each year that will be presented at the annual Residents' Research Day. It is hoped that these projects will also be submitted for presentation at national or international meetings. If a resident's paper is accepted, the resident is entitled to attend the meeting to present the work with expenses covered by the Division of Urology (\$1000 to a maximum of \$2000 per annum – see travel policy).

Page 10

YEAR SPECIFIC OBJECTIVES - UROLOGY PGY 3-4 (SENIOR RESIDENT)

CLINICAL

PGY 3 and 4 residents are given greater independence in the clinic and in-patient settings. Clinical competence in all areas of urology should be demonstrated by the completion of this year of training. The resident should be able to describe and carry out appropriate management of more complex urological conditions. Senior residents are expected to attend outpatient clinics when not scheduled to be in the OR. The senior resident will often see the inpatient consultations initially or assist the junior resident in this assessment. The PGY4 resident may, from time to time, be in charge of the CTU in the absence of the Chief Resident.

TECHNICAL SKILLS

Further consolidation of endoscopic and minor surgical skills learned in the PGY 2 year should occur this year. As well the PGY 4 resident will be expected to gain experience in more major endoscopic and open surgical techniques. The following surgical procedures should be performed by the end of this year of training with increasing competence:

1) Endoscopic Procedures

- a) Transurethral resection of bladder tumor
- b) Transurethral resection/incision of Ureterocele
- c) Transurethral resection of urethral valves
- d) Transurethral prostatectomy
- e) Ureteroscopy (flexible and rigid) (diagnostic and therapeutic)
- f) Laser lithotripsy
- g) Percutaneous nephrolithotomy
- h) Transurethral drainage of prostatic abscess
- i) ESWL

2) Open Surgical Procedures:

- a) Vasotomy and vasography
- b) Orchiopexy for testicular maldescent
- c) Drainage of cortical and perinephric abscess
- d) Pyeloplasy
- e) Ureterotomy
- f) Ureterectomy
- g) Ureterolysis
- h) Uretero-ureterostomy
- i) Uretero-neocystostomy
- j) Diverticulectomy of bladder
- k) Partial cystectomy
- I) Closure of vesico-vaginal fistula
- m) Urethrectomy
- n) Excision urethral diverticulum
- o) Surgery for stress urinary incontinence
- p) Penectomy (partial and total)
- q) Shunt for priapism
- r) Penile prosthesis insertion
- s) Correction of penile curvature
- t) Inguinal, pelvic and retroperitoneal lymphadenectomy
- u) Augmentation cystoplasty
- v) Insertion of artificial sphincter

TEACHING

The senior residents play an important role in the teaching of the more junior house staff. The senior resident should discuss all in patient and emergency room consults with more junior house staff prior to contacting faculty. Senior residents are responsible for preparation and presentation of several clinical topics for the Seminar Series.

RESEARCH

The senior residents will be expected to continue research initiated in the year before or begin a new project. Results will be presented at the annual Residents' Research Day. It is expected, as well, that these projects will be presented at national and international meetings and culminate in publication of the work.

SPONSORED MEETINGS

PGY3 residents should plan to attend the AUA-sponsored Basic Science Review Course which is held in June each year. The trainee should plan to attend either the Canadian Urological Association or the American Urological Association annual meetings. Should the resident have an abstract accepted at another meeting, the resident is entitled to attend that meeting as well to present the paper (and, if annual travel allowable has reached the maximum, they are to seek financial request from their research supervisor, or apply for the Division of Urology Travel Award, well in advance of the meeting).

READING

The required reading for the Royal College examination certification in Urology is based upon knowledge obtained from a variety of sources including Campbell's Urology, American Urological Association Updates and review articles form the Journal of Urology. A reading plan has been created by the Program as guide to help residents get through Campbell's Urology (please see attached Appendix). AUA updates and Journal of Urology Review articles over the past five years should be collected by the resident and reviewed. It is recommended that the resident create a steady study schedule to ensure adequate time for assimilation of the book knowledge. The goal of the reading plan is to ensure that each resident completes all reading, in preparation for the Royal College certification exam, by the beginning of their PGY5 year.

CAREER PLANNING

By the mid-point of their PGY3 year, the resident should have initiated plans in preparation for completion of his/her residency training so that by the end of the PGY4 year, the fellowship has been secured. Fellowship training in particular may require considerable time to organize, especially if positions in the United States are being considered.

YEAR SPECIFIC OBJECTIVES - UROLOGY PGY5 (CHIEF RESIDENT)

CLINICAL

The chief resident is in charge of the inpatient CTU. The PGY5 resident is responsible for rounding on the inpatients each morning with the more junior house staff members. The chief resident should be aware of all inpatient and emergency room consultations and should review the management plan with the senior and junior resident. The chief resident should spend the majority of his/her time in the operating room. Ambulatory care exposure, however, should also be a part of the chief resident year experience, especially in the spring of their final year as they prepare for the Royal College exam.

TECHNICAL SKILLS

The performance of all major urological procedures is mandatory. The chief resident should be competent to complete all open and endoscopic urologic procedures from start to finish listed above as well as those listed below. The chief resident is not expected to be in the OR for every case. The chief resident is not responsible for procedures in which competence has been achieved and the more minor procedures should be delegated to more junior residents.

- 1) Open Surgical Procedures:
 - a) Partial nephrectomy
 - b) Uretero-pyelo or calycostomy
 - c) Radical nephrectomy (open and laparoscopic) including thoracoabdominal
 - d) Nephroureterectomy
 - e) Uretero-sigmoidostomy
 - f) Ileal and sigmoid conduit
 - g) Open prostatectomy (Retropubic and suprapubic)
 - h) Anterior and posterior urethroplasty
 - i) Vaso-vasostomy
 - j) Epididymovasostomy
 - k) Plastic correction of hypospadias and epispadias
 - I) Adrenalectomy
 - m) Donor nephrectomy
 - n) Renal transplantation
 - o) Ileal ureter
 - p) Cystectomy
 - q) Pelvic exenteration
 - r) Radical prostatectomy
 - s) Laparoscopic and /or Robot assisted surgery (a, d, l,m, r)

TEACHING

The final year trainee will assist in the preparation and case selection for Grand Rounds, M&M Rounds, Radiology and Pathology Rounds. The chief resident should function as a role model for the more junior residents. The chief resident may be involved in the teaching of minor surgical skills to the more junior residents and Clinical Clerks.

RESEARCH

For those residents involved in ongoing projects over the course of their training it is hoped this research will culminate in acceptance of the work at a major urological meeting and subsequent publication. Chief residents are expected to prepare a research presentation for the annual Urology Residents' Research Day.

COMPETENCY BASED MEDICAL EDUCATION (CBME)

Competence by Design (CBD) breaks training down into several different stages. Each stage has its own **14ntrustable professional activities (EPAs) and milestones**. A milestone is an observable marker of an individual's ability along a developmental continuum. An EPA is a task of the discipline. It can be delegated to a resident and observed by a supervisor. Typically, each EPA integrates multiple milestones as we use multiple abilities simultaneously when performing professional activities (e.g. we use our medical expertise, but also our communication skills). EPAs and milestones can be used as a clear learning path for residents and clear teaching and assessment goals for educators.

ENTRUSTABLE PROFESSIONAL ACTIVITIES (EPAS)

EPAs are authentic tasks of a discipline. A supervisor can delegate a task to a resident and observe their performance in the workplace. Overtime, frequent observations of a trainee's performance of an EPA, will provide a comprehensive image of their competence and inform promotion decisions.

Royal College EPAs are related to each stage of training (transition to discipline, foundations of discipline, core of discipline, transition to practice). EPAs are designed to be developmental — they go from smaller tasks to bigger tasks as trainees progress through stages of training. Each EPA integrates a number of milestones from different CanMEDS roles; a bigger task may include more milestones and/or more complex milestones.

The process of defining a series of EPAs at each stage provides residents with a clear understanding of the expectations at that stage. EPAs focus the supervisor on stage appropriate expectations, which helps supervisors pinpoint a learner's achievements and areas for improvement. EPAs are also part of competence committee discussions about resident performance.

Each specialty or subspecialty carefully defines EPA's that are best suited to ensure their residents progress through training appropriately. The number of EPAs for a specialty is determined by the specialty committee.

MILESTONES

Milestones provide learners and supervisors with discrete information about the relevant skills of the discipline. Milestones that have been linked to an EPA are the individual skills that are needed to perform that task. For the purposes of learning and improvement, a resident and supervisor can focus on the EPA as a whole, or examine the milestones linked to that EPA. Over time, this detail is needed to help guide feedback and coaching for improvement. Milestones allow you as an observer to pinpoint areas that trainees need to improve, in order for them to successfully and reliably complete the EPA.

CBME – UROLOGY

The Urology program initiated Competency Based Medical Education (CBME) in July 2018. Unlike other Urology programs all residents in our program (PGY1-5) will be assessed using the Royal College designed Entrustable Professional Activities (EPA's). The EPA's for Urology are divided into four phases of training; Transition to Discipline (4), Foundation (8), Core (21) and Transition to Practice (6).

EPA assessments are scored using the relevant milestones for each EPA and an overall O- score/O-CAT score on a likert scale of 1-5. A score of 4 or 5 is deemed as 'achieved' for the assessment while a score of 1-3 is deemed as 'in progress'. Based on the number of successful assessments required (198), the Urology program expects the need for 1022 assessments spread over five years of training to allow achievement of the necessary number of assessments. The number of assessments required to be triggered for assessment when broken down by PGY year: 49 in PGY 1, 176 in PGY 2, 214 in PGY 3, 225 in PGY 4 and 358 in PGY 5. For the operating room, a minimum of 1 EPA assessment should be triggered by the resident on a case chosen in consultation with the faculty. The case chosen must be pre-decided to allow the faculty to perform a thorough and complete

evaluation and provide specific feedback. For the clinic, a minimum of 1 EPA assessment should be triggered by the resident on a case decided by the faculty in the clinic.

The Competency Committee (CC) will be chaired by the current Assistant Program Director (APD) and include a minimum of three divisional faculty from the 3 clinical sites of the Urology Program who will act as faculty reviewers. The Program Director (PD) will be a non-voting observer. Membership shall also include the Program Administrator as recording secretary. The CC will meet quarterly to review the resident files (EPA assessments, ITERS, procedure logs, etc). The flow chart on the next page details the process of review and the metrics used.

The process of review will be initiated if the resident completes the minimum required EPA assessments required for the quarter. This number is based on the yearly total required and the rotations the resident has undertaken in the time period since the last CC meeting. Failure to trigger a sufficient number of EPA assessments will lead to a designation of "Unable to Assess" or "Failure to Progress". If this is repeated, the resident will begin a process of remediation as there will be insufficient data for the CC to determine the resident's progress.



Page 15

UROLOGY CBME TIMELINES

	Transition to Discipline (TD) 4 EPAs	Foundations (F) 8 EPAs	Core of Discipline © 21 EPAs	Transition to Practice (TP)
Date to be Completed by	December 31 of 1 st year (PGY1) ^{6 months} after start of residency	December 31 of 2 nd year (PGY2) ^{18 months} after start of residency	December 31 of 5 th year (PGY5)	May 31 of 5 th year (PGY5)
# EPAs <u>required to</u> successfully achieve" (score of 4-5)	7	54	151	13

**Note:

Urology residents should be working forward with EPA's and not backward – choose EPA's that are relevant to current stage of training. For example, if you began CBME in the Core of Training stage you should not be triggering EPA's for the Foundations stage of training.

20191004

ROTATION SPECIFIC OBJECTIVES

These objectives relate to all sites as consultations and general urology clinics are found at all 3 teaching hospitals. It is expected that all PGY levels strive to achieve these objectives in a graded manner with increasing responsibilities, depth of knowledge and technical skills as years progress from PGY1 to PGY5. We encourage all residents to strive towards higher performance in these categories, despite their PGY level, so as to encourage and promote competency and excellence early on.

General Objectives for PGY 1-5:

- 1) History taking and physical examination.
- 2) Charting, with concise recording of pertinent findings and appropriate progress notes.
- 3) Clinical problem-solving, including formulation of differential and working diagnoses.
- 4) Clinical judgment and decision-making.
- 5) Choice and utilization of appropriate laboratory tests.
- 6) Management of the disease process and comprehensive care of the patient.
- 7) Anticipation of complications of disease process and therapy.
- 8) Coordination of the health care team.
- 9) Skill in communication and development of rapport with patients and their families as well as medical and nursing staff.
- 10) Communicate both verbally and in written format including a clear plan of action or recommendation
- 11) Skill in teamwork with fellow health care professionals.
- 12) An understanding of the impact of disease on patients and their families.
- 13) Knowledge of the utilization of appropriate ancillary health care resources in the community.
- 14) Create a management plan or consultations report for the requesting physician or service
- 15) Address ethical issues and issues of gender, sexual orientation, age, culture, and ethnicity in a professional manner

General EPA objectives (can be done on urology at any hospital site or off-service rotations):

- Transition to Discipline EPA #1: Assessing patients with a urological presentation
- Transition to Discipline EPA #2: Admitting patients to the urology service
- Transition to Discipline EPA #3: Discharging patients from the urology service
- Transition to Discipline EPA #4: Collaborating with other services
- Foundations EPA #1: Assessing and managing patients with a difficult catheterization in an urgent setting
- Foundations EPA #2: Recognizing and managing urosepsis in patients with urinary obstruction
- Foundations EPA #3: Assessing and managing patients with acute scrotal/perineal pain
- Foundations EPA #4: Assessing and establishing a management plan for patients with common nonemergent urological presentations
- Foundations EPA #5: Performing rigid cystoscopy with examination in an elective setting
- Foundations EPA #6: Performing flexible cystoscopy with examination in an elective setting
- Foundations EPA #7: Opening and closing an abdominal incision in low-complexity patients
- Foundations EPA #8: Managing urology specific tubes and drains on the ward
- Core EPA #1: Performing an initial consultation, and developing a plan for investigation or management, for patients presenting to the emergency department
- Core EPA #2: Performing an initial consultation, and developing a plan for investigation or management, for patients presenting in the clinic or inpatient non-urgent settings
- Core EPA #3: Performing an intraoperative consultation for a simple scenario
 - Core EPA #15: Providing care for patients with complications following urologic interventions
- Core EPA #17: Providing management for patients with benign urologic conditions in the office setting, including monitoring progress and ongoing treatment
- Core EPA #19: Supervising the urology service, including scheduling and teaching the junior learners

Page 18

- Core EPA #20 Delivering effective teaching presentations
- Core EPA #21: Advancing the discipline through scholarly work

General Objectives for PGY 5 (Chief Resident):

The chief resident will continue to consolidate their knowledge and surgical skills as outlined in the educational objectives. By the end of the final year, the resident should have acquired all of the necessary cognitive and non-cognitive skills and surgical skills that will allow him/her to be a competent independent consultant in urology.

- 1) Participation in ambulatory clinics including cystoscopies when not operating.
- 2) Assisting with cases as first or second assistant to the staff to include review of the surgical pathology and imaging of these cases.
- 3) See urology consultations with the other residents and staff.
- 4) Ensure that at least one research project, one review, or a case report for publication has been completed in the senior years.
- 5) Co-ordinate and participate in formal rounds and teaching activities that occur in the various clinical teaching units.
- 6) Co-ordinate, administrate and be responsible for all activities of the house staff including all administrative in patient responsibilities, teaching of undergraduate students, on-call coverage, OR assisting and cross coverage for house staff vacation.
- 7) Participate in coordinating, organizing and executing a day's list of core surgical and/or endoscopic procedures
- 8) Independent management of patients with common urological conditions in an out patient setting
- 9) Develop a personal learning plan that can define learning needs and career plans, including identifying ways to gain experiences, advance knowledge and commitment to enhancing competency
- 10) Supervise the urology service, including scheduling and teaching the junior learners (Core EPA 19)

EPA objectives (can be at any hospital site):

- Core EPA #19: Supervising the urology service, including scheduling and teaching the junior learners
- Transition to Practice EPA #1: Managing patients with urological conditions in the outpatient setting
- Transition to Practice EPA #2: Coordinating and executing the day's list of endoscopy (cystoscopy) procedures
- Transition to Practice EPA #3: Coordinating, organizing and executing the day's list of core surgical procedures
- Transition to Practice EPA #4: Performing an intraoperative consultation in a complex scentario
- Transition to Practice EPA #5: Contributing to administrative responsibilities
- Transition to Practice EPA #6: Developing and implementing a personal learning plan geared to setting of future practice

ST. JOSEPH'S HOSPITAL:

The Urology service at St. Joseph's Hospital (St. Joe's) provides comprehensive training for residents of all levels of urology training. Residents are exposed to the most general urologic conditions in the outpatient clinic, Emergency Department and in the operating rooms, with the exception of major trauma, complex pediatric surgery and transplantation. During the St. Joe's rotation sub-specialty expertise should be gained in the following disciplines:

ANDROLOGY

Residents will acquire and be able to demonstrate knowledge of the pathophysiology, investigation and medical/surgical management of sexual dysfunction, hypogonadism, and male infertility. This knowledge is expected to be obtained through individual study, attendance at outpatient clinics and the operating room.

The St Joseph's Hospital site has developed an academic program in the area of men's reproductive medicine with clinical areas of male infertility, sexual health, andropause, Peyronie's Disease and prosthetics.

At the end of the rotation the residents are expected to:

- 1) Understand the urological investigations for men with infertility, sexual dysfunction, hypogonadism and Peyronie's Disease.
- 2) Understand the different types of therapies available for men with infertility, sexual dysfunction, hypogonadism and Peyronie's Disease as well as the role, risks and alternatives to each of the therapies.
- 3) To understand the anatomy and physiology of erection.
- 4) To understand the etiology, pathophysiology, classification, diagnosis and treatment of erectile dysfunction.
- 5) To understand and the etiology, diagnosis and management of ED unresponsive to medical management, priapism, trauma or other traumatic causes
- 6) Understand the surgical anatomy of and the surgical approaches to the scrotum, testis, cord structures, penis and inguinal canal.
- 7) Understand the pre-operative, and post-operative management of these conditions and their potential complications.
- 8) Understand and be able to recognize benign, premalignant and malignant dermatological lesions of the male external genitalia

EPA Objectives

• Core EPA # 14 Performing genital procedures

FUNCTIONAL UROLOGY

In-depth knowledge of the pathophysiology of urinary incontinence in men and women and the appropriate investigations and treatment should be acquired. An understanding of the practical aspects of performing urodynamics should be achieved through attendance of urodynamic procedures with the urodynamic nursing staff. Awareness of common female urologic problems should be achieved through regular attendance in the outpatient clinic and operating room.

General Objectives:

- 1) To understand the anatomy, neuro-anatomy and physiology of normal voiding.
- 2) To develop an understanding of the etiology, pathophysiology, classification, diagnosis and treatment of voiding dysfunction, urinary incontinence, and female pelvic floor disorders.
- 3) To understand the etiology, pathophysiology, classification and treatment of the neurogenic bladder.
- 4) To be able to manage the urologic conditions associated with acute and chronic spinal cord injured patients.
- 5) To further develop an understanding of the technical skills and options required to treat lower urinary tract dysfunction including female and male urinary incontinence.

Specific Learning Objectives:

- 1) To learn the indications, procedure and interpretation of urodynamic studies.
- 2) To learn how to perform and interpret a retrograde and voiding cysto urethrogram.
- 3) To learn the approach in managing urethral stricture disease.
- 4) To be able to counsel a patient regarding the treatment options for urinary incontinence including pharmacological therapy and surgical treatment.
- 5) To be able to collaborate within a multidisciplinary team in investigating and managing genitourinary trauma in the multi-organ traumatized patient.
- 6) Demonstrate knowledge of the mechanism of action and physiological effects of botulinum toxin and neurostimulation for treatment of bladder pathologies

EPA Objectives:

- Core EPA #6: Performing transurethral resection of prostate
- Core EPA #7: Performing a stricture incision of the lower urinary tract

ENDOUROLOGY /UROLITHIASIS

Residents should achieve in-depth knowledge in the pathophysiology, investigation including metabolic assessment and surgical management of urinary stone disease. Residents should develop the skills of ureteroscopy, percutaneous nephrostomy insertion and percutaneous stone removal. Residents should be knowledgeable of the various techniques of both intracorporeal and extracorporeal shock wave lithotripsy including the mechanisms of action of each and potential complications associated with their use. The general goals of the rotation are as follows:

- 1) To be able to take a focused urologic history and physical examination in order to formulate an appropriate diagnostic/management plan for patients with/ at risk for urolithiasis.
- 2) To learn how to appropriately diagnose and manage common emergent urologic conditions for example renal colic, urinary retention, genital emergencies and hematuria.
- 3) To learn how to perform common urologic procedures and investigations including Foley catheter insertion and cystoscopy. Other possible procedures may include urethral dilation, retrograde pyelography, retrograde urethrography and ureteral stent insertion.
- 4) To be able to effectively communicate a patient's history and physical examination and diagnostic/treatment plan with attending faculty.

EPA Objectives:

- Core EPA #8: Performing rigid ureteroscopy and lithotripsy of the upper urinary tract
- Core EPA #9: Performing retrograde flexible ureteroscopy/nephroscopy and lithotripsy of the upper urinary tract
- Core EPA #10: Performing percutaneous nephroscopy and lithotripsy of the upper urinary tract

PROSTATE DISORDERS (BPH, PROSTATE CANCER)

Residents should acquire comprehensive knowledge of the pathophysiology, investigation and medical/surgical treatment of BPH. An understanding of the role of PSA in prostate cancer screening, the investigation of men with an abnormal PSA and/or DRE and the technique of TRUS biopsy of the prostate should be acquired. An insight into the management of prostate cancer stage for stage should be attained. This knowledge is expected to be obtained through individual study, attendance at outpatient clinics and the operating room.

General Objectives:

- 1) To develop and understanding of the etiology, natural history, histopathology (including grading), investigation, diagnosis (including staging), techniques for treatment in common use and the multidisciplinary management of patients with urologic malignancy including treatment when cure is not the primary goal.
- 2) To further develop an understanding of and the technical skills for uro-oncologic surgery.
- 3) To understand the principles of cancer management and the role of radiotherapy, chemotherapy and immunotherapy.
- 4) To develop a familiarity with the current controversies in the management of urologic malignancy and proposals to resolve them by clinical trials and other research.
- 5) To develop an appreciation for the increasing role of molecular genetics in the understanding and management of urologic malignancy.
- 6) Demonstrate knowledge of the mechanism of action and physiological effects of therapeutic technologies relevant to benign prostatic hyperplasia

Page 21

Specific Learning Objectives:

- 1) To learn the natural history, diagnosis, staging and treatment options for localized prostate cancer.
- 2) To learn the indications and complications of androgen deprivation therapy in various stages of prostate cancer.
- 3) To learn the natural history, diagnosis, staging and treatment options for bladder carcinoma.
- 4) To be able to counsel a patient with any GU malignancy with respect to diagnosis, treatment and/or preoperative consent.
- 5) To be able to correspond with other colleagues through appropriate consultative letters and/or operative notes.

EPA Objectives:

- Core EPA #6: Performing transurethral resection of prostate
- Core EPA #18: Providing management for patients with malignant urologic conditions in the office setting, including monitoring progress and ongoing treatment

LONDON HEALTH SCIENCES CENTRE (LHSC):

The Urology service at LHSC provides comprehensive training for residents of all levels of urology training. The bulk of the residents' learning experience takes place at the Victoria Hospital Campus which houses the inpatient adult service, the pediatric surgical inpatient unit and the urology operating rooms. Transplantation activities take place at the University Hospital Campus. During the LHSC rotation subspecialty expertise should be gained in the following disciplines:

UROLOGIC ONCOLOGY

It is expected that residents will acquire in-depth experience in all aspects of urologic oncology. The theories of urologic tumorigenesis, cancer biology, pertinent investigations and medical/surgical management of all urologic malignancies should be learned. An understanding of the mechanisms of action and indications for radiotherapy and chemotherapy in the treatment of urologic tumors should be obtained. These objectives will be achieved through regular attendance in the outpatient clinics and operating room.

General Objectives:

- 1) To develop an understanding of the etiology, natural history, histopathology (including grading), investigation, classification, diagnosis, staging of urological malignancies.
- 2) To understand the treatment options, including the role for multidisciplinary care for patients with urological malignancy. An appreciation of non-curative palliative therapies is also required.
- 3) To further develop the technical skills for uro-oncology surgery.
- 4) To understand the principles of cancer management as well as surgical oncology with emphasis on the role of chemotherapy, targeted therapies, radiotherapy and palliative care.
- 5) To be familiar with the role of percutaneous, angiographic and new techniques and their indications
- 6) To develop a familiarity with the controversies in the treatment of urological malignancy and to appreciate the role and need for clinical trials to help solve the aforementioned controversies.
- 7) To understand the controversies and limitations of screening for urological malignancy.

More specifically the objectives include:

- 1) To learn the natural history, diagnosis, staging and treatment outcomes for early stage prostate cancer.
- 2) To learn the indications and complications of systemic therapies for prostate cancer including androgen deprivation.
- 3) To counsel patients with early stage disease about treatment options their outcomes and complications (including active surveillance).
- 4) To learn the natural history, diagnosis, staging and treatment outcomes for urothelial cancers.

Page 22

- 5) To learn the natural history, diagnosis, staging and treatment outcomes for germ cell tumor.
- 6) To learn the natural history, diagnosis, staging and treatment outcomes for kidney cancers and small renal masses.
- 7) To be able to correspond with colleagues through consultative letters and operative notes.

EPA Objectives:

- Core EPA #5: Performing transurethral resection of bladder tumors
- Core EPA #11 Performing laparoscopic renal surgeries
- Core EPA #12: Performing the surgical skills of open abdominal/retroperitoneal procedures
- Core EPA #13: Performing the surgical skills of open pelvic procedures
- Core EPA #18: Providing management for patients with malignant urologic conditions in the office setting, including monitoring progress and ongoing treatment

TRANSPLANTATION (UNIVERSITY HOSPITAL)

The objective of this rotation is to expose residents to the medical and surgical aspects of renal transplantation. Residents should develop an appreciation of the work up of the patient being considered for a renal transplant. The procedures involved in cadaveric and living related donor selection should be understood. The principles and techniques of organ retrieval and preservation should be learned. Residents should be involved in both cadaveric and living related transplant surgical procedures. The post-operative management of renal transplant patient as well as an appreciation of the principles of immunosuppression and the mechanisms of action of the major immunosuppressive agents must be understood. These objectives will be fulfilled through individual study, attendance in the outpatient clinic, operating room and in the post-operative follow up of patients.

General Objectives:

- 1) To develop an understanding of the etiology, natural history, histopathology (including grading), investigation, classification, diagnosis, staging of renal failure and end stage renal disease (ESRD)
- 2) To understand the treatment options, including the role for multidisciplinary care for patients with ESRD.
- 3) To further develop the technical skills for renal transplantation surgery.
- 4) To understand principles of immunosuppression
- 5) To develop a familiarity with infections, malignancies, and complications in renal transplant patients
- 6) To hone skills in donor nephrectomy and renal transplantation.
- 7) To be able to correspond with colleagues through consultative letters and operative notes.

EPA Objectives

- Core EPA #11 Performing laparoscopic renal surgeries
- Core EPA #12: Performing the surgical skills of open abdominal/retroperitoneal procedures

TRAUMA

LHSC serves as the regional trauma referral centre. Residents will receive the bulk of their trauma exposure at the Victoria Hospital site. Residents should acquire in-depth knowledge of the approach to the management of the patient with multisystem trauma as well as the patient with injury isolated to the GU system. Techniques involved in stabilizing patients, appropriate investigations and the surgical management of urologic injuries will be learned. Residents will achieve these objectives through personal study, through evaluation of patients in the emergency department and attendance in the operating room.

PEDIATRIC UROLOGY (VICTORIA HOSPITAL)

The majority of Pediatric Urology is carried out at Victoria Hospital. Residents will be exposed to a large volume of Pediatric Urology through attendance at Dr. Dave's outpatient clinics and OR days. Additional ambulatory Pediatric Urology can also be obtained by participating in satellite clinics attended by Dr. Dave. Residents should acquire comprehensive knowledge of all common urologic conditions afflicting children including: enuresis, urinary tract infection, vesico-ureteral reflux, ureteropelvic junction obstruction, cryptorchidism and hypospadias. The surgical and clinical objectives of this rotation are tailored to developing precise technical and intellectual skills, which will have a general applicability to the surgical cases residents will see as they enter subsequent years in the program. Similarly, an introduction and basic grounding in clinical evaluation through history and radiologic evaluation will be stressed. Aspects of evaluation of the pediatric patient will be emphasized.

Specific learning objectives:

- 1) History and physical examination in neonates, infants, and children with emphasis on normal/abnormal growth & development.
- 2) Interviewing parents with respect to childhood urologic health and disease, antenatal maternal and fetal health.
- 3) Fluid and electrolyte issues in the pediatric urology patient, dosing of commonly used medications.
- 4) Approach to pediatric oliguria & anuria.
- 5) Approach to undescended testicle, testicular torsion and phimosis.
- 6) Rational use of antibiotics for wound, foreign body, and endocarditis prophylaxis.
- 7) Rational use & interpretation of biochemical studies in the pediatric patient.
- 8) Appropriate coordination of and interaction with multiple health providers (ambulatory care preparation, outside pediatricians and in-house consultants).
- 9) Introduction to pediatric urology consultation (telephone, outpatient, inpatient).
- 10) Communication with families with respect to post-operative plans, wound care, feeding of infants and children.
- 11) Organized interpretation of ultrasound studies (antenatal and post-natal).
- 12) Interpretation of VCUG studies.
- 13) Interpretation of nuclear renal studies, including appreciation of limitations and alternatives.
- 14) Interpretation and indications for urodynamic studies.
- 15) Understanding of urinary tract infection pathophysiology and management of simple UTI.
- 16) Management of vesicoureteral reflux.
- 17) Management of pyelonephritis.
- 18) Management of urologic aspects of myelomenigocele.
- 19) Management of enuresis/dysfunctional voiding; evaluation incontinence and neurogenic bladder; use of urodynamic studies.
- 20) Understanding of normal GU embryology as context for congenital anomalies.

EPA Objectives:

- Core EPA #4: Assessing and managing urinary tract and/or genital anomalies in children
- Core EPA #16: Providing post-operative care for children following a urologic intervention

LEARNING OBJECTIVES UROLOGY COMMUNITY ELECTIVES

During the PGY 2-5 years, residents have the opportunity to participate in community electives. Please contact the Urology Program Administrator for an updated list of locations previously attended by residents; however, the addition of new locations for electives is encouraged as long as objectives can be clearly met. This elective experience gives residents an introduction to community urologic practice with its attendant challenges and gratifications. The objectives that should be met during this rotation include:

- 1. To develop an understanding of the logistics of establishing and running a community practice.
- 2. To be able to assess patients in the office setting with common urologic problems and present the relevant findings.
- 3. To be capable of formulating a management plan on patients seen in the office, understanding potential constraints unique to community practice.
- 4. To be aware of the types of investigational and interventional procedures which can appropriately be carried out in an ambulatory care setting.
- 5. To gain surgical experience in both endoscopic and open surgical procedures through supervised attendance in the operating room.
- 6. To understand the strengths and limitations of office-based vs. hospital-based clinical practice.
- 7. To gain a sense of the support services available in the community to assist in patient care.
- 8. To participate in the multi-disciplinary pathology rounds. Residents will be expected to present an interesting case for discussion and provide an update on a relevant topic of interest to the group.

Urology EPA's are to triggered while on all community urology electives.

AMBULATORY CLINIC GUIDELINES

1. Always be on time!

- Morning clinics begin at 8:00 am sharp (except Wednesdays when clinics begin at 9:00)
- Afternoon clinics begin at 1:00 pm
- 2. Stay on time.
- 3. New patients require a complete history and physical
 - Aim to be done in 15 minutes
- 4. Follow-up patients require a history and physical directed to the identified problem(s).
 - Aim to be done in 10 minutes
- 5. When examining a female patient, a female nurse should be present.
- 6. If any information (blood work results or x-rays) from the referring physician are missing, request this information from the consultant's secretary.
- 7. Staff physicians will repeat part of the interview and physical exam. This allows the consultant the opportunity to establish rapport with the patient as well as clarify the history and confirm your findings.
- 8. Senior trainees (PGY4-5) should discuss the management plan with the patient prior to review with the consultant. The patient should be advised, however, that the consultant will review the proposal before implementation.
- 9. If asked to present the case history with the patient in attendance, consider the following:
 - keep the language simple
 - establish eye contact with the patient
 - seek clarification from the patient
- 10. If asked to dictate the consultation note, consider the following:
 - keep notes concise
 - make note of drug allergies
 - provide an assessment of the problem and treatment plan
 - indicate on the chart if dictation completed (e.g. dictation number) with your initials
 - all clinic charts must remain in the hospital and promptly returned to the consultant's office by the next day so that follow-up, procedures and OR's can be booked office charts MUST NOT be removed from hospital premises any reason.
- 11. Document the assessment and plan on the written record. Dictated reports take several weeks to be typed. Do not abuse the "stat dictation" feature unless an OR or other intervention is planned where a more timely dictation is required.
- 12. If you must leave the clinic to see a patient in ER or need to go to the OR to help with a case, notify one of the clinic nurses or the consultant.

STUDY OBJECTIVES FOR UROLOGY RESIDENTS

Studying for the Royal College Exams will be unlike any other exam preparation you have done before. The sheer volume of material to cover and the demands on your time during your surgical training should not be underestimated. Getting started on the "right foot" in the beginning is very important. It is realized that everyone studies differently and what works for one individual may not work for another. The information presented here may provide some suggestions on preparing for the Principles of Surgery and Urology Fellowship exams.

The following study objectives have been put together to serve as a periodic reminder of what material needs to be covered and whether you are on schedule with your reading. The objectives should be kept handy and referred to from time to time.

PRINCIPLES OF SURGERY EXAM

The following resources are to be used as core surgical references and will help in preparing for the POS exam:

- 1. Schwartz
- 2. Sabiston's
- 3. Scientific American
- 4. Greenfield

UROLOGY FELLOWSHIP EXAM

Although the PGY 1 year is considered the "off-service" rotation year, urology reading must be started during this time. To wait until the PGY2 year to begin urology study will ensure your final years are more stressful and difficult as there is simply too much material to cover in three years.

Develop a filing system as early as possible to keep track of important references and handouts of specific topics.

The following resources are considered **Core Urology** references:

1. Campbell's Urology 12th Edition*

- 2. AUA Updates*
- 3. CUA Guidelines
- 4. AUA Guidelines
- 5. CUAJ Review Articles
- 6. Journal of Urology Review Articles
- 7. AUA Core Curriculum

*Material for RCPSC Urology Exam

The following Urological periodicals are the most often referred to for the most current information:

- 1. Journal of Urology ("The Journal")
- 2. Urology ("Gold Journal")
- 3. Contemporary Urology
- 4. Journal of Endourology
- 5. Canadian Urological Association Journal

*In addition, up to date clinical practice guidelines published by the CUA and AUA should be part of your study material.

A FEW WORDS ABOUT CAMPBELL'S UROLOGY

1. Campbell's Urology is the most comprehensive and most important text in preparation for the Urology Fellowship Exams. The core urology knowledge does not change much over time and no single reference brings it all together like Campbell's. Campbell's is the most cited reference source in preparing questions

Page 27

for the Fellowship exam. The sooner one begins reading the text and summarizing the important points in the chapters, the sooner it can be dispensed with for review of more current information and more intensive study of areas you find difficult to remember. You can't start too soon!

- 2. Past residents have found that making study notes from the chapters allows one to review the same material quicker in future rather than having to re-read the text which is much more time-consuming. In the final year, the study notes and more updated sources are consolidated.
- 3. Early in your training, all of the material in the clinical chapters will seem important, and it won't be until you gain more knowledge that you will be able to separate the "wheat from the chaff". Therefore, start out by reviewing some of the basic chapters such as anatomy and physiology of which you likely have some familiarity with already. The basic chapters will lay the groundwork for your understanding of the more clinical sections you will read later.

**By the completion of each of the indicated training periods the following sections of Campbell's should be reviewed:

PGY 1 & 2 years:

- 1. Anatomy, Physiology and Genetics
- 2. Urologic Examination and Diagnostic Techniques
- 3. Normal Development of the Urinary Tract
- 4. Infections and Inflammation of the GU Tract
- 5. Renal Failure
- 6. GU Trauma
- 7. Cancer Biology and Principles of Oncology

These chapters will be relevant in your core surgery years as these subjects are favorite topics on the POS exam. These chapters should be read by the end of your 2nd year.

PGY 3 & 4 years:

- 1. Pediatric Urology
- 2. Tumors of the GU Tract
- **3**. BPH
- 4. Neurogenic Bladder and Incontinence
- 5. Urolithiasis
- 6. Pathophysiology of Urinary Tract Obstruction
- 7. Physiology of Erection and Pathophysiology of Impotence
- 8. Surgery of the GU Tract- The chapters in this section make up almost all of the 3rd volume.

Many of these chapters are best read prior to seeing the operative procedure the next day.

PGY 5 year:

At the beginning of the Chief Resident year, the most important chapters from Campbell's should have been read and you should begin making study/review notes. Your study notes should consolidate Campbell's material with information from Urologic Clinics of North America, AUA Updates and Journal of Urology Review Articles. At any time during your training, if you would like someone to review your study notes or discuss study techniques please don't hesitate to ask. Those of us who have recently gone through the exam process would be happy to provide guidance and share our experiences.

RESIDENT SEMINAR TOPICS - Campbell's Urology 12th Edition (2020) UROLOGY READING SCHEDULE BY PGY YEAR

				PG		
Ch	6	- ···	4	YEAR	2	
cn.	Section		1	2	3	4
1	Clinical Decision Making	Evaluation of the Urologic Patient: History and Physical Exam	1			
2		Evaluation of the Urologic Patient: Testing and Imaging	1			
3		Urinary Tract Imaging: Basic Principles of CT, MRI, and Plain Film Imaging	1			
4		Urinary Tract Imaging: Basic Principles of Urologic U/S	1			
5		Urinary Tract Imaging: Basic Principles of Nuclear Medicine	1			
6		Assessment of Urologic and Surgical Outcomes	1			
7		Ethics and Informed Consent	1			
8	Basics of Urologic Surgery	Principles of Urologic Surgery: Perioperative Care	1			
9		Principles of Urologic Surgery: Incisions and Access	1			
10		Principles of Urologic Surgery: IntraopTechnical Decisions		1		
11		Lower Urinary Tract Catheterization	1			
12		Fundamentals of Upper Urinary Tract Drainage	1			
13		Principles of Urologic Endoscopy	1			
14		Fundamentals of Laparoscopic and Rototic Urologic Surgery		1		
15		Basic Energy Modalities in Urologic Surgery	1			
16		Evaluation and Management of Hematuria	1			
17		Complications of Urologic Surgery		1		
18		Urologic Considerations in Pregnancy		1		
19		Intraoperative Consultation			1	
20	Pediatric Urology	Embryology of the GU Tract		1		
21		Urologic Aspects of Pediatric Nephrology		1		
22		Perinatal Urology		1		
23		Urologic Evaluation of the Child		1		
24		Pediatric Urogenital Imaging		1		
25		Infection & Inflammation of Pediatric GU Tract		1		
26		Core Principles of Perioperative Management in Children		1		
27		Principles of Laparoscopic & Robotic Surgery in Children		1		
28		Clinical and Urodynamic Evaluation of Lower Urinary Tract Dysfunction in Children		1		
29		Management Strategies for Vesicoureteral Reflux		1		
30		Bladder Anomalies in Children			1	
31		Exstrophy-Epispadias Complex			1	
32		Prune Belly Syndrome			1	
33		Posterior Urethral Valves		1		
34		Neuromuscular Dysfunction of LUT in Children			1	
35		Functional Dysorders of LUD in Children		1		
36		Management of Defecation Disorders		1		
37		LUT Reconstruction in Children			1	
38		Anomalies of the LUT			1	
39		Renal Dysgenesis and Cystic Disease of the Kidney			1	

Page 29

17631						- raye	23
40		Pathaphyciology and Urinany Tract Obstruction			1		
40		Estopic Lister, Listeracele, and Listeral Apamalias			1		
41		Surgery of the Ureter in Children: Ureteronelyic Junction			T		
42		Megaureter, and Vesicoureteral Reflux			1		
43		Management of Pediatric Kidney Stone Disease			1		
44		Management of Abnormalities of External Genitalia in Boys	1				
45		Hypospadias	1				
46		Etiology, Diagnosis and Management of Undescended Testis	1				
47		Management of Abnormalities of External Genitalia in Girls			1		
48		Disorders of Sexual Development: Etiology, Evaluation, and Medical Management			1		
49		Surgical Management of Differences of Sexual Differentiation and Cloacal and Anorectal Malformations			1		
50		Adolescent and Transitional Urology			1		
51		Urologic Considerations of Pediatric Renal Transplantation			1		
52		Pediatric Genitourinary Trauma		1			
53		Pediatric Urologic Oncology - Renal and Adrenal			1		
54		Pediatric Urologic Oncology - Bladder and Testis			1		
55	Infections & Inflammation	Infections of the Urinary Tract	1				
56		Inflammatory & Pain Conditions of Male Genitourinary Tract: Prostatitis Related Pain & Conditions, Orchitis, &Epididymitis	1				
57		Interstitial Cystitis/Bladder Pain Syndrome & Related Disorders		1			
58		Sexually Transmitted Diseases		1			
59		Cutaneous Diseases of the External Genitalia			1		
60		Tuberculosis & Parasitic Infections of the GU Tract			1		
61	Molecular & Cellular Biology	Basic Principles of Immunol & Immunotherapy in UroOncology		1			
62		Molecular Genetics and Cancer Biology		1			
63	Reproduction & Sexual Function	Surgical, Radiographic, and Endoscopic Anatomy of the Male Reproductive System		1			
64		Male Reproductive Physiology	1				
65		Integrated Men's Health: Androgen Deficiency, Cardiovascular Risk, and Metabolic Syndrome		1			
66		Male Infertility		1			
67		Surgical Management of Male Infertility			1		
68		Physiology of Penile Erection and Pathophysiology of Erectile Dysfunction		1			
69		Evaluation and Management of Erectile Dysfunction		1			
70		Priaprism	1				
71		Disorders of Male Orgasm and Ejaculation		1			
72		Surgery for Erectile Dysfunction			1		
73		Diagnosis and Management of Peyronie's Diseease			1		
74		Sexual Function and Dysfunction in the Female			1		
75	Male Genitalia	Surgical, Radiographic, & Endoscopic Anatomy of Retroperitoneum		1			
76		Neoplasm of the Testis		1			
77		Surgery of Testicular Tumors		1			
78		Laparoscopic and Robotic-Assisted Retroperitoneal Lymphadenectomy for Testicular Tumors			1		
79		Tumors of the Penis		1			
80		Tumors of the Urethra		1			

Page 30

1 inguinal Node Bissection 1 22 Surgery of Sarotum and Seminal Vesicies 1 83 Renal Physiology & Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 84 Renal Physiology & Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 85 Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 86 Urologic Complications of Renal Transpantation 1 1 87 Urologic Complications of Renal Transpantation 1 1 89 UUT Obstruction & Trauma Management of UUT Obstruction 1 1 91 Uthinsis & EndoUrology Uronary Lithinsis Eloiogy, Epidemiology, and Pathopysications 1 1 92 UUT Calculi 1 1 1 93 Urot Calculi 1 1 1 94 Evaluation and Medical Management of UUT Calculi 1 1 95 Structegic for Normedical Management of UUT Calculi 1 1 96 Neoplaums of UUT Being Renal Transor 1 1 97 Maligrant Renal Traumors 1 1 <t< th=""><th>_</th><th></th><th></th><th></th><th></th><th></th><th></th></t<>	_						
82 Surgery of Scrutum and Saminal Vesicles 1 1 83 Renal Physiology A Surgery of Scrutum and Saminal Vesicles 1 1 84 Renal Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 1 85 Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 1 86 Renal Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 1 87 Renal Insufficiency and Schemid Neuropathy 1 1 1 88 Urologic Complications of Renal Transplantation 1 1 1 98 UUT Obstruction & Trauma UUT Trauma 1 1 1 91 UUT Obstruction & Strauma Strategins for Normedical Management of UUT Calcui 1 1 92 Strategins for Normedical Management of UUT Calcui 1 1 1 93 Strategins for Normedical Management of UUT Calcui 1 1 1 94 Neoplasms of UUT Maignant Renal Tumors 1 1 1 95 Neoplasms of UUT Maignant Renal Tumors 1 1 1	81		Inguinal Node Dissection			1	
83 Surgery of Sordum and Seminal Vesicles 1 1 1 84 Renal Physiology and Pharmacology of the Renal Pelvis and Ureter 1 1 1 85 Physiology and Pharmacology including Renovascules 1 1 1 86 Benal Physiology and Pharbophysiology including Renovascules 1 1 1 87 Benal Physiology and Pharbophysiology including Renovascules 1 1 1 89 UUT Obstruction & Trauma Maagement of UUT Obstruction 1 1 1 90 UUT Obstruction and Medical Management of UUT Calcuil 1 1 1 1 91 Uthais & EndoUrology Urinary Lithiasis: Etology, Epidemiology, and Pathogenesis 1 1 1 92 Evaluation and Medical Management of UUT Calcuil 1 1 1 1 93 LUT Calcui 1	82		Surgery for Benign Disorders of the Penis and Urethra			1	
84 Rehat Physiology X Surgical, Radiologic, & Endoscopic Anatomy of Kidney & Ureter 1 85 Physiology and Pharmacology of the Renal Pekiologic Renovascular 1 86 Renal Physiology and Pharmacology in the Renal Pekiologic Renovascular 1 87 Renal Physiology and Pharmacology including Renovascular 1 88 UUT Obstruction & Trauma Management of UUT Obstruction 1 90 UUT Obstruction & Trauma Management of UUT Obstruction 1 91 Libhais & EndoUrology Evaluation and Medical Management of UUT Calculi 1 93 Sargical Management of UUT Calculi 1 1 94 Surgical Management of UUT Calculi 1 1 95 UUT Calcul 1 1 96 Neoplasms of UUT Besign Renal Tumors 1 1 97 Malgemart Renal Tumors 1 1 98 UUT Calcul 1 1 1 99 Local Dara of Medic Surgery of the Kidney 1 1 90 Local Dara of Medic Surgery of the Kidney 1 1 91 Local Dara of Medic Surgery of the Kidney </td <td>83</td> <td></td> <td>Surgery of Scrotum and Seminal Vesicles</td> <td></td> <td></td> <td>1</td> <td></td>	83		Surgery of Scrotum and Seminal Vesicles			1	
F5 Physiology and Pharmacology of the Renal Perkis and Ureter 1 1 F6 Renal Physiology and Pathophysiology including Renovascular hypertension 1 1 F7 Renal Insufficiency and schemic Neuropathy 1 1 F8 UUT Obstruction & Trauma Management of UUT Obstruction 1 1 F9 UUT Obstruction & Trauma Management of UUT Obstruction 1 1 F9 UUT Obstruction & Trauma Strategies for Nonmedical Management of UUT Calculi 1 1 F9 Strategies for Nonmedical Management of UUT Calculi 1 1 F9 UUT Calculi 1 1 F9 Bengin Renal Tumors 1 1 F9 UET chicali 1 1 F9 UET chicali 1 1 F1 Malgaant Renal Tumors 1 1 F1 Assignal Abobe Surgery of the Kidney 1 1 F1 La and Robot Surgery of the Kidney 1 1 F1 Assignal Abobe Surgery of the Kidney 1 1	84	Renal Physiology & Pathophysiology	Surgical, Radiologic, & Endoscopic Anatomy of Kidney & Ureter	1			
86 Read Physiology and stabaphysiology including Renovascular Hypertension 1 1 87 Renal Insufficiency and ischemid Neuropathy 1 1 88 Urdlogic Complications of Renal Transplantation 1 1 90 UUT Obstruction & Traum 1 1 91 Lithiasis & EndoUrology Urinary Lithiasis: Etiology, Epidemiology, and Pathogenesis 1 1 92 Evaluation and Medical Management of Urinary Lithiasis 1 1 92 Strategies for Nomedical Management of UT Calculi 1 1 93 Strategies for Nomedical Management of UT Calculi 1 1 94 Neoplasms of UUT Benign Renal Tumors 1 1 95 Renop Renal Tumors 1 1 1 96 Neoplasms of UUT Benign Renal Tumors 1 1 97 Malgenat Renal Tumors 1 1 98 Retroperitoreal Tumors of the UT and Ureter 1 1 99 Strategies for Advanced Renal Calculariom 1 1 101 Treatment of Advanced Renal Calculariom 1 1 102 Treatment of Advanced Renal Calculariom 1 1 103 Treatdrenals Surgical Analogenphic, & Endoscopic An	85		Physiology and Pharmacology of the Renal Pelvis and Ureter		1		
87Real insufficiency and ischemic Neuropathy1188Urdöstruction & TraumManagement of UUT Obstruction & Traum190UUT Obstruction & TraumUUT Traum191Lithiasis & EndolurologyUrinary Lithiasis: Eiology, Epidemiology, and Pathogenesis1192Evaluation and Medical Management of UUT Calculi11193Surgical Management for UUT Calculi11194Surgical Management for UUT Calculi11195Neoplasms of UUTBeing Renal Tumors11196Neoplasms of UUTMalignant Renal Tumors11197Outrelleil Tumors of the UUT and Ureter11198Urethelial Tumors of the UUT and Ureter11199Lapa and Robis Surgery of the Kidney11190Lapa and Robis Surgery of the Kidney11191The ArenalsSurgical and Radiographic Astromy of Head Parenals1192Surgical and Radiographic Astromy of the Adrenal Disorders11193Transport, Storage & EnpidyingSurgical Radiographic Astrony of Head Parenals11194Pathophysiology, Radiaficana Houthorany of Head Parenals111195Negarity & Starficana Houthorany of Head Parenals111196Pathophysiology, Radiaficana Houthorany of Head Parenals11	86		Renal Physiology and Pathophysiology Including Renovascular Hypertension		1		
88 Urologic Complications of Renal Transplantation 1 89 UUT Obstruction & Trauma Management of UUT Obstruction 1 90 UUT Trauma 1 1 91 Uthasis & EndoUrology Urinary Uthasis: Elology, Epidemiology, and Pathogenesis 1 1 92 Evaluation and Medical Management of UUT Calculi 1 1 1 93 Surgical Management of UUT Calculi 1 1 1 94 UT Calcul 1 1 1 95 UT Calculi 1 1 1 96 Neoplasms of UUT Beingin Renal Tumors 1 1 1 97 Mangaent end I UUT Catculi Tumors 1 1 1 98 Orgen Surgery of the Kidney 1 1 1 109 Management of UUT Urothelial Tumors 1 1 1 101 Open Surgery of the Kidney 1 1 1 102 Headphysiology, Evaluation, & Med Mgmt of Adrenal Dicores 1 1 103 The Adrenals Surgical Adrelographic, & Endoscopic Anatomy of Heal Versiology, A Surgical Ad	87		Renal Insufficiency and Ischemci Neuropathy		1		
88 UUT Obstruction & Trauma 1 90 UUT Trauma 1 91 UIT hauss UIT any Lithasis: Etiology, Epidemiology, and Pathogenesis 1 92 Evaluation and Medical Management of UUT Calculi 1 1 93 Strategies for Nonmedical Management of UUT Calculi 1 1 94 Surgical Management for UUT Calculi 1 1 95 UT Calculi 1 1 96 Neoplasms of UUT Bengin Renal Tumors 1 1 97 Malignant Renal Tumors 1 1 98 Ure thelial Tumors of the UUT and Ureter 1 1 99 Ure thelial Tumors of the UUT Ure thelial Tumors 1 1 101 Open Surgery of the Kidney 1 1 102 Lap and Robot Surgery of the Kidney 1 1 103 Interatment of Advanced Renal Cell Carcinoma 1 1 104 Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders 1 1 105 The Adrenals Surgical Radiographic, & Endoscopic Anatomy of Male Pelvis 1 1	88		Urologic Complications of Renal Transplantation			1	
90UUT Trauma191Lithiasis & EndoUrologyUrinary Lithiasis: Eliology, Epidemiology, and Pathogenesis192Evaluation and Medical Management of UIT Calculi193Strategies for Nonmedical Management of UIT Calculi194Surgical Management for UIT Calculi195UIT Calculi196Neoplasms of UUTBenign Renal Tumors197Malignant Renal Tumors1198UIT calculi1199Surgical Management of UUT Urethelial Tumors11100Pentoperitorical Tomors11101Open Surgery of the Kidney11102Jand Robot Surgery of the Kidney11103Nonsurgical Focal Therapy of Renal Tumors11104Nonsurgical Focal Therapy of Renal Tumors11105The AdrenalsSurgical and Radiographic Anatomy of the Adrenals11106Surgery of the Kidney111107Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11108Entrophysiology, Eusification of LUT Dysfunction: Overview11119Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11110Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11111Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11111Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1 <td>89</td> <td>UUT Obstruction & Trauma</td> <td>Management of UUT Obstruction</td> <td></td> <td></td> <td>1</td> <td></td>	89	UUT Obstruction & Trauma	Management of UUT Obstruction			1	
91Lithiasis & EndotrologyUrinary Lithiasis:1192Svaluation and Medical Management of Urinary Lithiasis1193Strategies for Nonmedical Management of UUT Calculi1194Surgical Management for UUT Calculi1195UT Calculi1196Neoplasms of UUTBenign Renal Tumors1197Malignant Renal Tumors11198Surgical Management of UUT Calculi11199Surgical Management of UUT Urebelial Tumors111100Surgical Management of UUT Urebelial Tumors111101Gene Surgery of the Kidney111102Angan Robot Surgery of the Kidney111103Nonsurgical Focial Therapy of Renal Tumors111104Nonsurgical Focial Therapy of Renal Tumors111105The AdrenalsSurgical and Radiographic Anatomy of the Adrenal Disorders11106Pathophysiology, & Endoscopic Anatomy of Adrenal Disorders111107Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis111118Pathophysiology & Classification of LUT Dysfunction: Overview111119Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1111106Pathophysiology & Classification of LUT Dysfunction: Overview11111	90		UUT Trauma			1	
92 Evaluation and Medical Management of Urinary Lithiasis 1 1 93 Strategies for Nomedical Management of UTC Calculi 1 1 94 Surgical Management for UUT Calculi 1 1 95 UTC Calculi 1 1 96 Neoplasms of UUT Benign Renal Tumors 1 1 97 Malignant Renal Tumors 1 1 1 98 Urethelial Tumors of the UUT and Ureter 1 1 1 99 Surgical Management of UUT Urethelial Tumors 1 1 1 100 Open Surgical focal Therapy of The Kidney 1 1 1 101 Open Surgical Focal Therapy of Renal Tumors 1 1 1 102 Lap and Robot Surgery of the Kidney 1 1 1 103 Nonsurgical Focal Therapy of Renal Tumors 1 1 1 104 Nosurgical Radiographic Astomy of the Adrenals 1 1 1 105 The Adrenals Surgical, Radiographic, & Endoscopic Anatomy of Female Pelvis 1 1 1 109 Surgical, Radiogra	91	Lithiasis & EndoUrology	Urinary Lithiasis: Etiology, Epidemiology, and Pathogenesis		1		
93Strategies for Nonmedical Management of UUT Calculi11194Surgical Management for UUT Calculi11195LUT Calculi11196Neoplasms of UUTBenign Renal Tumors11197Malignant Renal Tumors111198Urethelial Tumors of the UUT and Ureter1111100Retroperitoneal Tumors1111101Open Surgery of the Kidney1111102Nonsurgical Focal Therapy of Renal Tumors111103Nonsurgical Focal Therapy of Renal Tumors111104Treatment of Advanced Renal Cell Carcinoma111105The AdrenalsSurgical and Radiographic Anatomy of the Adrenal Disorders111106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders111107Surgery of the Adrenal Giands1111108ErmptyingSurgical, Radiographic, & Endoscopic Anatomy of Male Pelvis111119Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis111110Pathophysiology and Pharmacology of the Blader and Urethra111111Pathophysiology Alcassification of LUT Dysfunction: Cverview111113Fatuation and Management of Moment With Urinary Incontinence111 <td< td=""><td>92</td><td></td><td>Evaluation and Medical Management of Urinary Lithiasis</td><td></td><td>1</td><td></td><td></td></td<>	92		Evaluation and Medical Management of Urinary Lithiasis		1		
94Surgical Management for UUT Calculi11195LUT Calculi11196Neoplasms of UUTBenign Renal Tumors1197Malignant Renal Tumors11198Urtchelial Tumors of the UUT and Ureter1199Surgical Management of UUT Urethelial Tumors11100Open Surgery of the Kidney11101Open Surgery of the Kidney11102Lap and Robot Surgery of the Kidney11103Nonsurgical Focal Therapy of Renal Tumors11104Treatment of Advanced Renal Cell Carcinoma11105The AdrenalsSurgical and Radiographic Anatomy of the Adrenal Disorders11106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders11107Surgery of the Adrenal Giands111108Eransport, Storage & Eransport, Storage & Evaluation and Management of Wom With Urinary Incontinence11119Carcetice BladerIDU Urotynamic Evaluation of the UT11111Evaluation & Management of Wom With Urinary Incontinence11112Lorinary Incontinence and Pelvic Prolapse: Epidemiology & Incontinence & Relvic Prolapse: Epidemiology & Incontinence & Relvic Prolapse: Epidemiology & Incontinence & Relvic Prolapse: Epidemiology & Inc	93		Strategies for Nonmedical Management of UUT Calculi		1		
95UT CaculiIn Caculi196Neoplasms of UUTBenign Renal Tumors1197Malignant Renal Tumors1198Urethelial Tumors of the UUT and Ureter1199Surgical Management of UUT Urethelial Tumors11100Retroperitoneal Tumors11101Open Surgery of the Kidney11102Lap and Robot Surgery of the Kidney11103Nonsurgical Focal Therapy of Renal Tumors11104Treatment of Advanced Renal Cell Carcinoma11105The AdrenalsSurgical and Radiographic Astomy of the Adrenal Siorders11106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders11107Surgery of the Adrenal Gald Carcinoma11108EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11119Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11110Physiology and Pharmacology of the Bladder and Urethr11111Pathophysiology, & Classification of LUT Dysfunction: Overview11113Evaluation and Management of Momen With Urinary11114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Pathophysiology111114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Pathophysiology11 <td>94</td> <td></td> <td>Surgical Management for UUT Calculi</td> <td></td> <td>1</td> <td></td> <td></td>	94		Surgical Management for UUT Calculi		1		
96Neoplasms of UUTBenign Renal Tumors197Malignant Renal Tumors198Urethelial Tumors of the UUT and Ureter199Surgical Management of UUT Urethelial Tumors1100Retroperitoneal Tumors1101Open Surgery of the Kidney1102Lap and Robot Surgery of the Kidney1103Nonsurgical Focal Therapy of Renal Tumors1104Treatment of Advanced Renal Cell Carcinoma1105The AdrenalsSurgical and Radiographic Anatomy of the Adrenal Sicorders1106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108ErnptyingSurgical, Radiographic, As Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology, Casilitation of LUT Dysfunction: Cverview1112Evaluation and Management of Momen With Urinary1113Urinary Incontinence & Pelvic Prolapse:1114Urodynamic and Video-Urodynamic Evaluation of the UT1115Meromuscular Dysfunction of LUT1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118Neturine1119Neturine1119Neturine1111Urodynamic and Video-Urodynamic Evaluation of	95		LUT Calculi		1		
97Malignant Renal Tumors198Urethelial Tumors of the UUT and Ureter199Surgical Management of UUT Urethelial Tumors1100Retroperitoneal Tumors1101Open Surgery of the Kidney1102Lap and Robot Surgery of the Kidney1103Nonsurgical Focal Therapy of Renal Tumors1104Treatment of Advanced Renal Cell Carcinoma1105The Adrenals1106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108Fransport, Storage & Emptying1119Surgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology, Calssification of LUT Dysfunction: Overview1112Viriany Incontinence and Pelvic Prolapse: Epidemiology & Physiology and Nanagement of Wome With Urinary Incontinence and Pelvic Prolapse: Epidemiology & Physiology Accessification of LUT1119Urionary Incontinence & Pelvic Prolapse: Epidemiology & Physiology & Physiology Kanagement of UTStorage & Emptying Failure1119Overactive Bladder11110Overactive Bladder11111Conservative Management of UTStorage & Emptying Failure11112Overactive Bladder111113Conservative Management of UTStorage & Emptying Failure11119Nocturia<	96	Neoplasms of UUT	Benign Renal Tumors		1		
98Urethelial Tumors of the UUT and Ureter199Surgical Management of UUT Urethelial Tumors1100Retroperitoneal Tumors1101Open Surgery of the Kidney1102Lap and Robot Surgery of the Kidney1103Nonsurgical Focal Therapy of Renal Tumors1104Treatment of Advanced Renal Cell Carcinoma1105The AdrenalsSurgical and Radiographic Anatomy of the Adrenals1106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary1113Urodynamic and Video-Urodynamic Evaluation of the LUT1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Pathophysiology11116Overactive Bladder1117Overactive Bladder1118Neuromuscular Dysfunction of LUT1119Nocturia11110Overactive Bladder1111Overactive Bladder1112Oroserative Management of Urinary Incontinence1113Cocuria <t< td=""><td>97</td><td></td><td>Malignant Renal Tumors</td><td></td><td>1</td><td></td><td></td></t<>	97		Malignant Renal Tumors		1		
99 Surgical Management of UUT Urethelial Tumors - 100 Retroperitoneal Tumors 1 101 Open Surgery of the Kidney 1 102 Lap and Robot Surgery of the Kidney 1 103 Nonsurgical Focal Therapy of Renal Tumors 1 104 Treatment of Advanced Renal Cell Carcinoma 1 105 The Adrenals Surgical and Radiographic Anatomy of the Adrenals 1 106 Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders 1 1 107 Surgery of the Adrenal Glands 1 1 108 Transport, Storage & Emptying Surgical, Radiographic, & Endoscopic Anatomy of Hale Pelvis 1 1 110 Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis 1 1 1 111 Pathophysiology & Classification of LUT Dysfunction: Overview 1 1 112 Evaluation and Management of Momen With Urinary Incontinence 1 1 113 Evaluation and Management of Momen With Urinary Incontinence 1 1 114 Urodynamic and Video-Urodynamic Evaluation of the LUT 1 1 115 Overac	98		Urethelial Tumors of the UUT and Ureter			1	
NoteRetroperitoned TumorsImage: Construction of Lumors101Open Surgery of the Kidney1102Lap and Robot Surgery of the Kidney1103Nonsurgical Focal Therapy of Renal Tumors1104Treatment of Advanced Renal Cell Carcinoma1105The AdrenalsSurgical and Radiographic Anatomy of the Adrenals1106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108Transport, Storage & Emptying1109Surgical, Radiographic, & Endoscopic Anatomy of Fenale Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse1113Evaluation and Management of Mem With Urinary Incontinence and Pelvic Prolapse1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Overactive Bladder1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1119Nocturia1119Nocturia1119Nocturia1119Nocturia1119Nocturia1120Pharmacologic Management of UTITary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1121 <td>99</td> <td></td> <td>Surgical Management of UUT Urethelial Tumors</td> <td></td> <td></td> <td>1</td> <td></td>	99		Surgical Management of UUT Urethelial Tumors			1	
101 Open Surgery of the Kidney I 102 Lap and Robot Surgery of the Kidney 1 103 Nonsurgical Focal Therapy of Renal Tumors 1 104 Treatment of Advanced Renal Cell Carcinoma 1 105 The Adrenals Surgical and Radiographic Anatomy of the Adrenal Disorders 1 106 Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders 1 107 Surgery of the Adrenal Glands 1 108 Transport, Storage & Engles, Radiographic, & Endoscopic Anatomy of Female Pelvis 1 109 Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis 1 110 Physiology and Pharmacology of the Bladder and Urethra 1 111 Pathophysiology & Classification of LUT Dysfunction: Overview 1 112 Evaluation and Management of Women With Urinary 1 113 Evaluation and Vice-Urolapase: Epidemiology & 1 1 114 Orodynamic and Vice-Urolapase: Epidemiology & 1 1 115 Overactive Bladder 1 1 116 Neuromuscular Dysfunction of LUT 1 1 113 Evaluation and Management of Women With Urinary <td< td=""><td>100</td><td></td><td>- Retroperitoneal Tumors</td><td></td><td></td><td>1</td><td></td></td<>	100		- Retroperitoneal Tumors			1	
12Lap and Robot Surgery of the KidneyL103Nonsurgical Focal Therapy of Renal Tumors1104Treatment of Advanced Renal Cell Carcinoma1105The AdrenalsSurgical and Radiographic Anatomy of the Adrenals1106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology, Scaluation of LUT Dysfunction: Overview1112Valuation and Management of Women With Urinary Incontinence and Pelvic Prolapse1113Evaluation and Management of Momen With Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Urinary Incontinence & Pelvic Prolapse: Epidemiology & 	101		Open Surgery of the Kidney			1	
103Norsurgical Focal Therapy of Renal Tumors1104Treatment of Advanced Renal Cell Carcinoma1105The AdrenalsSurgical and Radiographic Anatomy of the Adrenals1106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108Transport, Storage & Emptying1109Surgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse1113Urodynamic and Video-Urodynamic Evaluation of the LUT1114Overactive Bladder1115Overactive Bladder1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1119Nocturia1120Pharmacologic Management of UTStorage & Emptying Failure1121Conservative Management of UTStorage & Emptying Failure1122Elevicrial Strumulation and Neuromodulation in Storage and1123Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1124Elevicrial Strumulation and Neuromodulation in Storage and Emptying Failure1	102		Lap and Robot Surgery of the Kidney			1	
104Treatment of Advanced Renal Cell CarcinomaII105The AdrenalsSurgical and Radiographic Anatomy of the Adrenals11106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders11107Surgery of the Adrenal Glands11108Transport, Storage & Emptying111109Surgical, Radiographic, & Endoscopic Anatomy of Female Pelvis11109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11110Physiology and Pharmacology of the Bladder and Urethra11111Pathophysiology & Classification of LUT Dysfunction: Overview11112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse11113Covardynamic and Video-Urodynamic Evaluation of the LUT11114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Neuromuscular Dysfunction of LUT11116Neuromuscular Dysfunction of LUT11117Overactive Bladder11118The Underactive Detrusor11119NocturiaIncolinger Admagement of Urinary Incontinence: Bradoni & Pelvic Piori Parale Pelvic Devices1119NocturiaConservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1120Pharmacologic Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices	103		Nonsurgical Focal Therapy of Renal Tumors			1	
The AdrenalsSurgical and Radiographic Anatomy of the AdrenalsI106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Glands1108Transport, Storage & EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11110Physiology and Pharmacology of the Bladder and Urethra11111Pathophysiology & Classification of LUT Dysfunction: Overview11112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse11113Evaluation & Management of Momen With Urinary Incontinence11114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Pathophysiology111116Neuromuscular Dysfunction of LUT11117Overactive Bladder11118The Underactive Detrusor11119Nocturia11120Pharmacologic Management of LUTStorage & Emptying Failure1121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1122Electrical Stimulation and Neuromodulation in Storage and Envirge Stimulation and Neuromodulation in Storage and Envirge Stimulation and Neuromodulation in Storage and Envirge Stimulation and Neuromodulation in	104		Treatment of Advanced Renal Cell Carcinoma			1	
106Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders1107Surgery of the Adrenal Giands1108Transport, Storage & EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11110Physiology and Pharmacology of the Bladder and Urethra11111Pathophysiology, & Classification of LUT Dysfunction: Overview11112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse11113Evaluation & Management of Men With Urinary Incontinence11114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Overactive Bladder11116Neuromuscular Dysfunction of LUT11117Overactive Bladder11118The Underactive Detrusor11120Pharmacologic Management of LUTStorage & Emptying Failure11121Electrical Stimulation and Neuromodulation in Storage and11122Electrical Stimulation and Neuromodulation in Storage and11	105	The Adrenals	Surgical and Radiographic Anatomy of the Adrenals			1	
107Surgery of the Adrenal Glands1108Transport, Storage & EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis11110Physiology and Pharmacology of the Bladder and Urethra11111Pathophysiology & Classification of LUT Dysfunction: Overview11112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse11113Evaluation & Management of Men With Urinary Incontinence11114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology11116Neuromuscular Dysfunction of LUT11117Overactive Bladder111118The Underactive Detrusor11120Pharmacologic Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11121Electrical Stimulation and Neuromodulation in Storage and Emptying Failure11	106		Pathophysiology, Evaluation, & Med Mgmt of Adrenal Disorders			1	
Transport, Storage & EmptyingSurgical, Radiographic, & Endoscopic Anatomy of Female Pelvis1109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse: Prolapse: Pathophysiology &1113Evaluation & Management of Men With Urinary Incontinence1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1119Nocturia1120Pathoangement of UUTstorage & Emptying Failure1121Ebetrical Stimulation and Neuromodulation in Storage and Emptying Failure1122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure1	107		Surgery of the Adrenal Glands			1	
109Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis1110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse1113Evaluation & Management of Men With Urinary Incontinence1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1119Nocturia1120Pharmacologic Management of Urinary Incontinence: Behavioral & Pelvic Prolapse, Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1121Evel Lutical Stimulation and Neuromodulation in Storage and Emptying Failure1	108	Transport, Storage & Emptying	Surgical, Radiographic, & Endoscopic Anatomy of Female Pelvis	1			
110Physiology and Pharmacology of the Bladder and Urethra1111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse1113Evaluation & Management of Momen With Urinary Incontinence1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1119Nocturia1120Pharmacologic Management of Urinary Incontinence: e Belvic Prolapse, Emptying Failure1121Electrical Stimulation and Neuromodulation in Storage and 	109		Surgical, Radiographic, & Endoscopic Anatomy of Male Pelvis	1			
111Pathophysiology & Classification of LUT Dysfunction: Overview1112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse1113Evaluation & Management of Men With Urinary Incontinence1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1120Pharmacologic Management of UTStorage & Emptying Failure1121Conservative Management of Utinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure1	110		Physiology and Pharmacology of the Bladder and Urethra		1		
112Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse11113Evaluation & Management of Men With Urinary Incontinence11114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology11116Neuromuscular Dysfunction of LUT11117Overactive Bladder11118The Underactive Detrusor11120Pharmacologic Management of LUTStorage & Emptying Failure11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure111	111		Pathophysiology & Classification of LUT Dysfunction: Overview		1		
113Evaluation & Management of Men With Urinary Incontinence1114Urodynamic and Video-Urodynamic Evaluation of the LUT1115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1120Nocturia1121Conservative Management of LUTStorage & Emptying Failure1122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure1	112		Evaluation and Management of Women With Urinary Incontinence and Pelvic Prolapse		1		
114Urodynamic and Video-Urodynamic Evaluation of the LUT11115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology11116Neuromuscular Dysfunction of LUT11117Overactive Bladder11118The Underactive Detrusor11119Nocturia111120Pharmacologic Management of LUTStorage & Emptying Failure11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure11	113		Evaluation & Management of Men With Urinary Incontinence		1		
115Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology1116Neuromuscular Dysfunction of LUT1117Overactive Bladder1118The Underactive Detrusor1119Nocturia1120Pharmacologic Management of LUTStorage & Emptying Failure1121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure1	114		Urodynamic and Video-Urodynamic Evaluation of the LUT		1		
116Neuromuscular Dysfunction of LUT11117Overactive Bladder11118The Underactive Detrusor11119Nocturia11120Pharmacologic Management of LUTStorage & Emptying Failure11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure11	115		Urinary Incontinence & Pelvic Prolapse: Epidemiology & Pathophysiology		1		
117Overactive Bladder11118The Underactive Detrusor11119Nocturia11120Pharmacologic Management of LUTStorage & Emptying Failure11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure11	116		Neuromuscular Dysfunction of LUT		1		
118The Underactive Detrusor11119Nocturia11120Pharmacologic Management of LUTStorage & Emptying Failure11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure11	117		Overactive Bladder		1		
119Nocturia11120Pharmacologic Management of LUTStorage & Emptying Failure11121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices11122Electrical Stimulation and Neuromodulation in Storage and Emptying FailureI1	118		The Underactive Detrusor		1		
120Pharmacologic Management of LUTStorage & Emptying Failure1121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure1	119		Nocturia	1			
121Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices1122Electrical Stimulation and Neuromodulation in Storage and Emptying Failure1	120		Pharmacologic Management of LUTStorage & Emptying Failure		1		
122 Electrical Stimulation and Neuromodulation in Storage and Emptying Failure	121		Conservative Management of Urinary Incontinence: Behavioral & Pelvic Floor Therapy, Urethral & Pelvic Devices		1		
	122		Electrical Stimulation and Neuromodulation in Storage and Emptying Failure			1	

Divisi Resic	on of Urology, Schulid lent Manual	ch School of Medicine & Dentistry, Western Uni	versity	/			Page 31
123		Retropubic Suspension Surgery for Incontinence in Women			1		
124		Vaginal and Abdominal Reconstructive Surgery for Pelvic Organ Prolapse			1		
125		Slings: Autologous, Biologic, Synthetic, and Mid-urethral			1		
126		Complications Related to the Use of Mesh and Their Repair			1		
127		Additional Therapies for Storage and Emptying Failure			1		
128		Aging and Geriatric Urology		1			
129		Urinary Tract Fistulae			1		
130		Bladder and Female Urethral Diverticula			1		
131		Surgical Procedures for Sphincteric Incontinence in the Male			1		
132	Benign & Malignant Bladder Disorders	Bladder Surgery for Benign Disease		1			
133		Genital and LUT Trauma		1			
134		Special Urologic Considerations of Transgender Individuals		1			
135		Tumors of the Bladder		1			
136		Management Strategies for Non–Muscle-Invasive Bladder Cancer (Ta, T1, and CIS)		1			
137		Management of Muscle-Invasive and Metastatic Bladder Cancer			1		
138		Surgical Management of Bladder Cancer: Transurethral, Open, and Robotic			1		
139		Use of Intestinal Segments in Urinary Diversion			1		
140		Cutaneous Continent Urinary Diversion			1		
141		Orthotopic Urinary Diversion			1		
142		Minimally Invasive Urinary Diversion			1		
143	Prostate	Development, Molecular Biology, & Physiology of Prostate	1				
144		Benign Prostatic Hyperplasia: Etiology, Pathophysiology, Epidemiology, and Natural History		1			
145		Evaluation * Nonsurgical Management of BPH		1			
146		Minimally Invasive & Endoscopic Management of BPH		1			
147		Simple Prostatectomy: Open and Robotic-Assisted Laparoscopic Approaches			1		
148		Epidemiology, Etiology, and Prevention of Prostate Cancer	1				
149		Prostate Cancer Biomarkers			1		
150		Prostate Biopsy - Technique and Imaging			1		
151		Pathology of Prostatic Neoplasia			1		
152		Diagnosis and Stating of Prostate Cancer	1				
153		Active Management Strategies for Localized Prostate Cancer		1			
154		Active Surveillance of Prostate Cancer		1			
155		Open Radical Prostatectomy			1		
156		Laparoscopic and Robotic-Assisted Laparoscopic Radical Prostatectomy and Pelvic Lymphadenectomy			1		
157		Radiation Therapy for Prostate Cancer			1		
158		Focal Therapy for Prostate Cancer			1		
159		Treatment of Locally Advanced Prostate Cancer			1		
160		Management Strategies for Biochemical Recurrence of Prostate Cancer			1		
161		Treatment of Castration Resistant Prostate Cancer			1		
		Total	28	65	68	0	
		TOTAL CHAPTERS				161	
			-		1		

GENERAL EXPECTATIONS OF UROLOGY RESIDENTS

1.0 <u>Clinical/Service:</u>

- 1. Assist in pre-operative assessment of patients utilizing history/physical, lab/radiology.
- 2. Determine level of operative risks in patients.
- 3. Review consultations with attending urologists.
- 4. Obtain informed operative consent and provide patient education to patients/families.
- 5. Attend, assist and perform operative interventions.
- 6. Attend to post-operative care. Continuity of care in post-op patient management is crucial.
- 7. Operative reports will be dictated by the most responsible resident/fellow in the case, unless otherwise stated by the staff surgeon.
- 8. A discharge summary is required for all LHSC and SJHC patients. All discharge documentation should be *completed within 24 hours* of the patient's discharge. Discharge summaries should be dictated on all other patients by the junior housestaff following rounds.
- 9. Morning rounds should be started at an appropriate time, depending on the number of patients on the service, in order to complete these rounds before the O.R. commences. During morning rounds the problem list for each patient should be reviewed and updated, and investigations for the day should be decided upon and assigned to members of the team to organize.
- 10. It is expected that you will round on the more sickly patients again later in the day before you leave for the day. Sign out patients of concern to the resident on call prior to leaving the institution.
- 11. Brief notes should be written each day on each active patient on the service.
- 12. Progress notes should be written on each assessment and especially when there has been a change in status.
- 13. It is recommended when writing prescriptions that you include your pager # on the script in case the pharmacy has questions regarding your orders. Your CPSO number must be written on each prescription. Pertinent information should be included in the patient's electronic medical record.
- 14. You will be expected to consult on patients in the Emergency Department (ER) with various urological problems. A note is to be dictated on all patients seen in the ER who have been discharged. Clinical clerks are allowed to dictate only after you have personally reviewed the case with them. You are then responsible for the quality of that dictated note. If it needs to be revised you will be asked to do so.
- 15. All requests for consultations are to be accommodated in a timely fashion. If you cannot attend to this duty you must inform your staff person and/or your chief resident. All consultations are to have a note written in the patients chart and a note dictated as well. You must let your staff person know about all consultations. If you are asked to "be aware" of a patient, this constitutes a request for consultation and a formal consultation is to be undertaken.
- 16. When on call the resident is responsible to communicate with the staff in an appropriate time interval. This will depend on the acuity of the problem but at the latest should be by 9:00 am, the day after an evening on call. It is not the resident's responsibility to "block" consults from the ER, wards or transferring hospitals. All consults should be seen and if the consult seems inappropriate, this should be immediately brought to the attention of the consultant on-call so that a firm decision can be made. This will keep you out of trouble when dealing with multiple services on nights and weekends.
- 17. You are expected to attend a minimum of one outpatient clinic per week. Attendance is **MANDATED** both by the program and by the Royal College. It is essential to your understanding of the assessment of new patients and to review patients who are having post-operative problems. Given the number of same day admit procedures, this is your opportunity to assess patients in the elective situation and become experienced in peri-operative decision-making. You are expected to be on time for assigned clinics. Attending clinics, seeing consultations and managing to ward issues that arise does not constitute "service" but is, in fact, considered an integral part of your education and training.

- 18. We expect you to become comfortable in collaborating with other members of the health care team. It is expected that you will meet with members of the nursing staff, psychologists, nutritionists, social workers, and physiotherapists and so forth to plan patient care and expedite discharge.
- 19. Keep a log of all morbidity and mortality issues and present these at M&M Rounds, which are held four times a year.
- 20. Bed management is not your responsibility. If there are problems, contact the consultant or the oncall bed manager.
- 21. The decision to allocate residents to various clinics and OR's is the responsibility of the Chief resident; however, it is understood that junior residents will travel between the clinic and OR as needed.
- 22. Be sure to make use of the various simulation training facilities at CSTAR as well as at the Kelman Centre (both are located at University Hospital).

23. OR etiquette:

- a) On the night before a case, read about the pathology as well as about the procedure and bout how the particular surgeon performs the case.
- b) Review the patient chart prior to coming to the OR so that you are knowledgeable about the details around the case, as well as about any medical issues that can be expected intra- and postoperatively.
- c) Arrive early, introduce yourself to the patient, and mark the patient's side in the pre-op area.
- d) Make sure that you introduce yourself to the anesthesiologist as well as the nursing staff in the room. Pull up all relevant images and blood work so that it can be reviewed with the surgeon.
- e) Discuss with the fellow or other resident in the room, ahead of time, who will be the first assist.
- f) Do not be discouraged if you are not allowed to complete the entire case from the start. Take each case as an opportunity to learn a new step or maneuver so that you can amalgamate them after a few cases. Trust that you will be able to perform all of the cases independently by the end of your training; however, it will take hard work, dedication and repetition on your part. We will make sure that you have the opportunities to learn the cases, but it is ultimately up to you to ensure that you put the effort in.

2.0 Education:

- Prepare, attend, and <u>arrive on time</u> for weekly Grand Rounds and Royal College Exam Prep (RCEP) sessions. Attendance at rounds is <u>mandatory</u> if you are on the Urology service and strongly recommended if you are on an off-service rotation.
- 2. Preparation of Grand Rounds cases are the responsibility of the junior resident on-service. Each junior should keep a running list of cases that can be presented. The cases can be divided up amongst the residents for presentation; however, the junior resident should have the responsibility of preparing and presenting most of the cases. You should always give the consultant ample opportunity to review your case to ensure that pertinent facts are listed, and that appropriate pauses and teaching points are included in the presentation.
- 3. Present cases & attend Morbidity & Mortality Rounds.
- 4. Attend Tuesday morning academic half-day day sessions. You are expected to arrive promptly at 6:45 am and, again, attendance is <u>mandatory</u>.
- 5. Residents in 1st year are required to attend all Surgical Foundations courses and will be excused from the resident seminar series during this time.
- 6. Each resident is expected to conduct the seminar series at least twice during the year. It is your responsibility to contact the staff person that has been assigned to supervise your presentation and review the presentation. All seminar presentations must be reviewed by the staff person <u>at least one</u> week prior to presenting to the group.
- 7. Attend and participate in monthly Journal Club.
- 8. It is expected that you will "read around your cases". This means that you should familiarize yourself with the issues involved in a certain operative procedure as well as indications, complications and the relative anatomy and embryology. Remember the right to operate on a staff person's patient is earned by knowledge of the case, operative indications, as well as the pathology that you are dealing with.

- 9. It is expected that you will also read outside of your cases (have a set reading schedule for Campbell's Urology).
- 10. It is expected that you attend scheduled simulation sessions. These will be supervised by faculty. Schedules will be provided to residents (PGY1-5) at the beginning of the year (July 1). Attendance is mandatory, both attendance and performance will be assessed as part of competency committee meeting.

3.0 Evaluation:

1996, the RCPSC adopted a new framework of core competencies for all specialists, called the "CanMEDS Roles". CanMEDS is an abbreviation of "Canadian Medical Education Directives for Specialists". This framework of core competencies includes the different roles that physicians fulfill in their daily practice (Medical Expert, Communicator, Collaborator, Health Advocate, Manager, Scholar and Professional). A revised version of the CanMEDS framework was adopted in 2005. This framework is now the basis for accreditation, evaluation and examinations, as well as objectives of training and standards for continuing professional development.

By 2017, the RCPSC will move towards competency-based education and the evaluation process for the changes has not yet been defined.

Medical Expert

This is the central role that integrates all of the CanMEDS roles: applying medical knowledge, clinical skills, and professional attitudes in the provision of patient-centered care.

Communicator

Effectively facilitating the doctor-patient relationship and the dynamic exchanges that occur before, during, and after the medical encounter.

Collaborator

Working effectively as a member of a health care team to achieve optimal patient care.

Manager

Be an integral participant in health care organizations, organizing sustainable practices, making decisions about allocating resources, and contributing to the effectiveness of the health care system.

Health Advocate

Responsibly using expertise and influence to advance the health and well-being of individual patients, communities, and populations.

Scholar

Demonstrating lifelong commitment to reflective learning, as well as the creation, dissemination, application, and translation of medical knowledge.

Professional

Being committed to the health and well-being of individuals and society through ethical practice, profession-led regulation, and high personal standards of behavior.

Evaluations are completed by member of the Residency Training Committee member at each site: Dr. Alp Sener (Program Director) for rotations at University Hospital, Dr. Nicholas Power for rotations at Victoria Hospital, and Dr. Blayne Welk for rotations at St. Joseph's Hospital.

1) You will be evaluated at the end of each rotation (sometimes mid-rotation if 4 months or greater in length). Your final evaluation on any service must be completed before you leave the service

and you are responsible for setting up a time with your supervisor to have this completed. Daily feedback will be provided regarding your performance as well. Evaluations are done on-line and it is imperative that these be completed in a timely fashion. Evaluations are strictly confidential and are a very useful tool in improving the quality of our service. Evaluations will be communicated to the resident in a timely manner. All evaluations are done electronically and available for review after completion.

- 2) In addition to your end of rotation evaluations, you are responsible for ensuring that the following intra-operative and clinic evaluations are completed:
 - (a) PGY1: minimum of 2 clinic per week and 2 intra-op evaluation (this may include procedure clinics) per urology block
 - (b) PGY2: 2 clinics, 1 OR per week
 - (c) PGY 3-4: minimum of 1 clinic per week and 2 intra-op evaluations per week
 - (d) PGY5: minimum of 1 clinic per block and 3 intra-op evaluations per week
- 3) You are expected to complete an on-line evaluation of each consultant prior to leaving the service. Staff evaluations are strictly confidential and, until such time that you complete the evaluation, you will not have access to your own rotation evaluation.
- 4) Procedure logging is a <u>MANDATORY</u> part of your training. At each residency training committee meeting you will be asked to produce a list of all procedures that you have encountered. Failure to keep an up-to-date procedure log can result in failure of a rotation.
- 5) Two OSCE's will be held per year and attendance is **compulsory.**
- 6) You are expected to present a research project four (4) out of your five (5) years (mandatory in years 2-5) at the annual Resident Research Day and, whether presenting or not, attendance at such research is <u>MANDATORY.</u>
- 7) To progress in the program and ultimately be successful in completing the program, a resident must demonstrate his or her ability to assume increased responsibility for patient care. Advancement to higher levels of responsibility will be on the basis of evaluation of his/her readiness for advancement. This determination is the responsibility of the Resident Training Committee with input from members of the teaching staff.

4.0 <u>On-Call:</u>

1. Call will not exceed the numbers as per the PARO agreement. Post-call junior residents are able to go home by noon, per PARO guideline:

Each resident is entitled to 2 complete weekends off (which includes Friday night) for each 28-day time period. In addition, for home call services, residents cannot be scheduled for two weekends in a row. If residents are required to round on some weekends, they still need to have 2 complete weekends off per month, where they will not be oncall or come in to round on patients. Unless otherwise agreed to by the affected resident, PARO and the Program Director, residents should not be scheduled for consecutive periods of call.

Call maximums are based on total days ON service (vacation and other time away are deducted from total days on service before calculating maximum call).

MAXIMUM HOME CALL IS 1 IN 3

Number of Days Maximum		Number of Home Calls
17-19	6	
20-22	7	
23-25	8	
26-28	9	

A resident cannot be on home call on 2 consecutive weekends. Home call cannot be averaged over multiple months. While on some services, residents do a blend of in-house call (e.g., CTU call) and

home call (e.g., for their primary service). In that case, the formula to calculate call maximums is as follows:

Blended home and in-house call formula: (Number of Home Call Assignments) x 3 + (Number of In-House Assignments) x 4 = maximum of 30 over a 28-day period.

NIGHT FLOAT CALL

Night float call is scheduled as home call covered by PGY1-3 residents on-service and supported by backup home call with a more senior resident (PGY3-5).

Night float format: Day of Week: Monday (work the day) to Thursday Times: 17:00 – 08:00

Residents scheduled on night float will not be expected to have flanking weekend call shifts.

Residents are to leave the hospital after 08:00. They may round with their respective teams, but are not to be given any tasks that will delay this.

Urology residents on research blocks, radiology or medical/radiation oncology blocks will also be expected to participate in call coverage in a reduced fashion as backup home call for more junior residents.

ON-CALL CONVERSIONS/POST-CALL DAYS

Calls can be converted if a resident is called into the hospital to perform duties between the hours of midnight but before 6:00 am, or if the resident is called into the hospital to perform duties for at least four consecutive hours with at least one hour of which extends past midnight.

Junior Urology residents who convert call per the above PARO guidelines will be excused from all duties the following day. It is the responsibility of the Chief resident at that site to ensure that the program administrator and all faculty at that site are made aware that the junior resident is not available.

Senior Urology residents who convert call per the above PARO guidelines can opt out of clinical duties the following day. If the Senior Resident opts for a post-call day, the Chief resident at that site must to ensure clinical coverage and notify the program administrator and all faculty at that site that the resident is not available.

- 2. When leaving post-call it is important that you hand over and sign out your patients to a fellow resident.
- 3. It is expected that you will respond to your pages in a timely manner.
- 4. If, while on-call you are having difficulty with staff member or resident from another service, notify the Urology attending on-call (for advice and/or to intervene).
- 5. It is expected that if you are unable to report for clinical duties that you contact your staff person, senior/chief resident and call the Program Administrator.

5.0 General:

1. As a resident, you will be a role model for those working with you, particularly the medical students working on the service. Keep in mind that you have a responsibility to your patients, their proper management, and their continuity of care. The students working with you will closely watch your behavior and attitudes. Remember your CanMEDS roles - you will be evaluated on each of them.

Page 37

- 2. It is important that you develop a sense of self-confidence and responsibility along the way, but never be afraid to ask questions, especially when you are unsure as to what should be done. This is an important part of your training and demonstrates self-awareness and insight into one's own limitations.
- 3. We expect you to develop basic skills in advocating what is right for patients who can't speak for themselves, and also to become involved in difficult ethical decision-making such as withdrawal of care, in organ donation, etc.
- 4. You should demonstrate the appropriate attitude and behavior expected of a competent physician. You must effectively interact and communicate with other members of the health care team and with patients and their families.
- 5. You are expected to abide by the Western & LHSC code of conduct:
 - respect and consider the opinions and contributions of others
 - embrace compassion and show genuine concern for patients and their families
 - share your suggestions and concerns with discretion and tact
 - protect privileged information
 - engage in honest, open and truthful communication
 - create and foster a collaborative and caring work environment
 - treat everyone with dignity and respect

RESIDENT WELLNESS

2022-2023 William Luke, Urology Resident Wellness Representative/Champion Dr. Nicholas Power, Urology Faculty Wellness Representative

Visit the Urology website: (http://www.schulich.uwo.ca/urology/education/postgraduate/residents_in_distress.html)

Take Care of Yourself!

If at any time you are experiencing difficulty during your Residency training and do not feel comfortable speaking to the Residency Program Director, you may contact the Assistant Dean for Resident Well Being (Office of Learner Equity and Wellness):

Dr. Sandra Northcott sandra.northcott@sjhc.london.on.ca_or SJHC extension 48408

Or, arrange an appointment with a counselor in the Wellness Office: equity.wellness@schulich.uwo.ca 519.661.4234 (London) 519.253.3000 ext. 4302 (Windsor) https://www.schulich.uwo.ca/learner-equity-wellness

Ontario Medical Association: Physician Health Program php.oma.org 1-800-851-6606 joy.albuquerque@oma.org

Help is Only a Phone Call Away!

Postgraduate Medical Education Office: **519.661.2019**, <u>postgraduate.medicine@schulich.uwo.ca</u> LHSC Employee Assistance Program: **Homewood Human Solutions** <u>www.homewoodhumansolutions.com</u> **1.800.265.8310** The Western University Ombudsperson: 519.661.3573, <u>ombuds@uwo.ca</u>

Protect Yourself and Take Time Off!

The PARO 24 Hour Helpline is available for any resident, partner or medical student needing help. It is separately administered by the Distress Centre of Toronto and is totally confidential. Phone: 1.866.435.7362 (1-866-HELP-DOC)

PGME POLICIES AND GUIDELINES

Visit the Academic Resources page of the PGME Website:

https://www.schulich.uwo.ca/medicine/postgraduate/academic_resources/policies.html

Resources available on this page:

Resident Evaluation and Appeals

- Resident Evaluation and Appeals Policy
- Schulich Postgraduate Appeals Committee Terms of Reference
- Assessment Verification Period Policy

Leaves of Absence and Training Waivers

Resident Supervision/Health and Safety

- Supervision of Postgraduate Medical Trainees on Clinical Rotations
- Resident Health and Safety
- Council of Ontario Faculties of Medicine (COFM) Immunization Policy

Transfers

- Transfers Policy
- National Transfer Guidelines

Conduct, Ethics and Professionalism

- Charter of Professionalism for the Schulich School of Medicine & Dentistry
- Code of Conduct for Teacher-Learner or Clinician-Trainee Relationships in the Schulich School of Medicine & Dentistry
- Reporting an Issue
- The Four Pillars of Professionalism
- Western's Non-Discrimination Harassment Policy
- Internet Policy
- Personal Information
- Treating Self and Family Members

Rotations Related

- Clinical Clerkship On-Call Policy
- Off-Service Rotations
- Orders Policy (LHSC) for Senior Medical Students
- Orders Policy (SJHC) for Senior Medical Students
- Principles for Elective Rotations
- Religious Holidays
- Restricted Registration
- Rotation Length Policy
- Vacation Guidelines for Off-Cycle Residents





Division of Urology

Vacation Protocol

(Applies to On-Service Urology Residents)

- 1. The resident must submit to the Urology Program Administrator (PA), via email, the vacation/academic leave request *at minimum* 4 weeks prior to proposed start date of the leave.
- 2. The PA will forward the request via email to the chief resident for review. The chief resident will review the request and determine whether this request can be accommodated, given the number of residents on rotation at that particular site at that time, and respond back to the PA within one week of receipt of request.
- 3. If the request is denied by the chief resident, then alternate dates will be proposed to the requesting resident for review and the Program Director (PD) will be notified.
- 4. Once steps 1-3 have been completed and approval acquired, the PA will document the time away and notify the requesting resident that the time has been approved.

Requests are approved resident on a first-come basis. Please allow two weeks for the process and approval notification.

Verbal vacation, education/conference requests will not be granted. All requests must be submitted as above.

Vacation: Residents are entitled to 4 (four) weeks paid vacation per year (a week consists of 7 days which includes 5 working days and 2 weekend days) of paid vacation per year. Book-ending weekends will not be approved. If a resident is scheduled to work on a recognized holiday, he/she shall be entitled to a paid day off in lieu of the holiday to be taken at a time mutually convenient within ninety (90) days of the holiday worked.

Professional Leave: In addition to vacation entitlement, residents shall be granted additional paid leave for educational purposes - such educational leave, up to a maximum of seven (7) working days per year. Such leave may be taken by housestaff at any time, provided only that professional and patient responsibilities are met to the satisfaction of the hospital department head and pre-approved per the same process as vacation requests.

Exam Time: Each resident shall be entitled to paid leave for the purpose of taking any Canadian or American professional certification examination; for example, Royal College examinations, LMCC, etc. This leave shall include the exam date(s) and reasonable travelling time to and from the site of the examination. This leave shall be in addition to other vacation or leave.

RC Exams for Chiefs: Each Chief resident will be granted two extra weeks of study time – one week prior to each exam. This is non-transferable (ie. cannot be used as vacation time or re-allocated).

2014.05.22 20191106 Reviewed by RTC, no changes

Western



GUIDELINES FOR DIVISION OF UROLOGY SUPPORT OF RESIDENTS' CONFERENCE EXPENSES

1. The Division of Urology will provide funding per annum (July 1-June 30) for travel as follows:

PG yr	Amount	Meeting	Details
1	\$1,400		- abstracts to be provided to the program in advance of
2	\$1,400	AUA, CUA	the meeting
3	\$1,400	or other urology meeting	- all residents must request permission from the
4	\$1,400		program prior to attending as priority is given to those
5	\$1,400		presenting and to PGY4s

- 2. On occasion, a resident may wish to attend additional meetings to present research work. The resident must speak with the research supervisor prior to submitting an abstract, who may be able to provide financial aid. Confirmation should be secured, in writing and well in advance of the meeting, from the supervisor of the ability to provide support. If more than one resident is involved in a research project, the resident most responsible for the work to be presented will be the only resident provided with financial assistance. By definition, a "presentation" refers to a podium talk or a moderated poster session where a verbal report is given. An un-moderated poster session would not be subject to financial support. Funding requests to research supervisors after the meeting will not be approved.
- 3. The maximum allowable claim for expenses will be \$1,400 per annum as noted above. Claims for reimbursement of expenses will require receipts to be provided to Program Administrator, as well as the abstract if applicable.
 - If a room is shared, both/all names must be on the receipt, and only that share of the room expenses can be claimed
 - Each resident must submit their own receipts (residents submitting receipts/costs to be attributed to another residents annual allowable is not allowed)
- 4. Personal costs such as entertainment and alcohol expenses will not be reimbursed.
- 5. Travel, accommodation and meal expenses should be claimed for the resident only. If family members attend the conference, their expenses will not be covered by the Division.
- 6. Airfare re-imbursement will be for **Advanced Purchase Economy Class rates (lowest fares).** Flights should be booked as early as possible to take advantage of the lowest available fares.
- 7. Accommodation reimbursement will be for a standard, single room rate.
- 8. When meeting expenses were incurred in the US or foreign currency, currency conversion should be performed using rates obtained at: <u>http://www.uwo.ca/finance/finexch/</u>.
- 9. If a cash advance is needed to cover certain expenses prior to the meeting, please contact the Program Director to discuss.
- 10. There will be no carry forward of unused funding in a given year to a future year.
- 11. Time off for meetings is at the discretion of the Chief Resident to ensure adequate coverage of clinical activities. Preference will be given to PGY4s and residents **orally** presenting at meetings.
- 12. To claim reimbursement, email receipts to the Program Administrator, together with a summary.





GUIDELINES FOR THE DIVISION OF UROLOGY RESIDENT TRAVEL AWARD

- 1. The Division of Urology will provide up to 2 travel awards per academic year for urology residents presenting at national or international conferences. If these grants are not utilized by urology residents, applications from medical students working with Urology Faculty (Clinical and Basic Science) may be considered.
- 2. The award amount will be for \$1,250 Canadian. This award is in addition to the annual \$1,400 travel allowable the Division provides, but will <u>not</u> be awarded for travel to the same conference attended using the \$1,400 annual travel allowable.
- 3. Deadline for application will be the second Friday in March and results will be available to the applicants by the end of March. The award will be adjudicated by members of the Residency Training Committee.
- 4. Eligibility criteria:
 - a. All urology residents, regardless of PGY level, are eligible to receive this award.
 - b. The research must have been carried out by the resident and accepted for presentation as a podium or a moderated poster at a national or international meeting. An un-moderated poster session would <u>not</u> be subject to support.
 - c. The application must be made to the Division Office prior to the <u>second Friday of March.</u> Applications submitted after the meeting has finished will not be considered.
 - d. Priority will be given to residents who have not previously received a travel award in the past two years. Award will not be considered for residents presenting the same research at multiple conferences.
 - e. Once all awards have been granted, no further awards will be available until the next academic year.
 - f. There will be no carry forward of unused funding in a given year to a future year.
- 5. Application requirements:
 - a. Accepted abstract for the research, including the acceptance letter detailing the nature of the presentation format
 - b. Details regarding the name, date and location of the meeting
 - c. A one-page outline of the proposed manuscript including the following sections: introduction, materials and methods, results, discussion and a brief list of references
 - d. Letter of support from the supervisor. If the applicant is a medical student working with a Faculty member, the Faculty member must provide justification as to why there are no other funds to support the student to attend the conference.
 - e. Upon 30 days of returning from the conference, resident must submit the following:
 - i. a 250 word description of what they learned from the meeting
 - ii. Travel expense form with original receipts flights/mileage, accommodation and meals
 - iii. Personal costs such as entertainment expenses will not be reimbursed
 - iv. When meeting expenses were incurred in the US or foreign currency, currency conversion should be performed using rates obtained at: http://www.uwo.ca/finance/finexch/.
- 6. If a cash advance is needed to cover certain expenses before the meeting, please contact the Program Director to discuss.





Guidelines for

THE DR. GERALD BROCK RESIDENT CAREER DEVELOPMENT AWARD

- 1. One award will be provided per academic year for urology residents primarily presenting at specialty international conferences (excluding the AUA, CUA or NSAUA), for short-term international electives, or educational courses (example POCUS, robotics, etc.) that align with individual career plans/goals.
- 2. <u>Up to</u> \$5,000 Canadian per year will be awarded to one resident. Unused funds will be carried forward to the following year.
- 3. For residents presenting at an international conference, this award may be used in addition to the annual travel allowable by the Division of Urology.
- 4. Deadline for applications is December 31 (for the academic year July 1 to June 30) each year and adjudicated by members of the Residency Training Committee.
- 5. Eligibility criteria:
 - a. All urology residents, regardless of PGY level, are eligible to receive this award.
 - b. For specialty international conferences, research must have been carried out by the resident and accepted for presentation as a podium or a moderated poster. An un-moderated poster session would <u>not</u> be subject to support.
 - c. For courses or international electives, the resident must confirm acceptance by receiving institution, as well as <u>prior approval</u> from their home institution in order to be eligible for this award. Retrospective support will <u>not</u> be supported by this award.
 - d. Priority will be given to residents who have not previously received a travel award in the past two years. This award will not be considered for residents presenting the same research at multiple conferences.
- 6. Application requirements:
 - a. An essay (1000 words maximum) describing why attending this course, specialty conference, elective will be beneficial for the academic career of the resident.
 - b. For specialty international research conferences:
 - i. Accepted abstract including the acceptance letter detailing the nature of the presentation format.
 - ii. Details regarding the topic, name, date and location of the conference/course.
 - iii. If involving research, a one-page outline of the proposed manuscript including the following sections: introduction, materials and methods, results, discussion and a brief list of references.
 - iv. Letter of support from research supervisor.
 - c. For international electives
 - i. Acceptance letter detailing the institution, date, duration and supervisor of elective.
 - 1. Supervisor at receiving institute agrees to submit formal evaluation of elective rotation.
 - ii. Letter of support from Program Director.
 - d. Upon 30 days of returning from the conference or elective, resident must submit the following:
 - i. a 250-word description of what they learned from the conference/elective/course.
 - ii. Travel expense form with original receipts flights/mileage, accommodation and meals.

- iii. Personal costs such as entertainment expenses will <u>not</u> be reimbursed.
- iv. When meeting expenses were incurred in the US or foreign currency, currency conversion should be performed using rates obtained at: <u>http://www.uwo.ca/finance/finexch/.</u>
- 7. The Program Director and/or Divisional Chair, in consultation with the Residency Training Committee, may approve the use of the award under unprecedented circumstances to support residents presenting at ALL research conferences (with the same requirements listed above).
- 8. If a cash advance is needed to cover certain expenses before the meeting, please contact the Program Director to discuss.

2021.07.08





Division of Urology

UROLOGY RESIDENT ELECTIVE POLICY – Clinical/Research

(Applies to On-Service Urology Residents)

- 1. Research and Clinical Electives will be granted only to residents in good standing within the program. Elective time will be reviewed 2-3 months in advance of the scheduled elective and may be cancelled if the resident is not in good standing. The resident would then be placed back onto the rotation schedule at one of the Urology hospital sites.
- Proposed electives must be submitted, <u>in writing</u>, to the Assistant Program Director (APD) and the Program Administrator for approval <u>a minimum of eight (8) weeks prior</u> to the start of the elective. Each proposal must be accompanied by the following:
 - a. A defined set of objectives for the elective
 - b. The name and email address of the elective supervisor
 - c. Proof of agreement from the elective supervisor
 - i. Proof of agreement by elective supervisor to accept your request of the elective must include a statement that "they agree to accept your elective request, and that they agree to complete and return an evaluation upon completion of the elective
- 3. Elective requests that are not one full block (example: concurrent clinical electives, split time research/clinical) must be pre-approved a minimum of 8 weeks in advance of the elective by the Program Director and Assistant Program Director, as well as the elective supervisor.
- 4. For research electives, a **mid-elective progress report is required** to be provided to the elective supervisor and the PD for review, as well as an end-elective report of work accomplished.
- 5. A four (4) week reading/study block is NOT an acceptable substitute for a true research rotation.
- 6. Any vacations during this research or clinical elective must be approved and requested as per the vacation policy. Preceptor approval of this vacation time is also required.
- 7. For research electives, the resident must be in the city and available to attend all education events, participate in call and must check-in with their preceptor on a regular basis.

See next page for form to be submitted

2014.05.22 Updated: 2019.09.03 Revised: 2020.11.13, 2023.04.26

Page 46





Division of Urology

UROLOGY RESIDENT ELECTIVE (Clinical or Research) REQUEST FORM

Resident Name	
PG Year	
Dates of Requested Elective	
Location of Requested Elective	
Submission Date of Elective Request to Program	

List Objectives for this Elective:

Name of Preceptor for this Elective	
Email Address of Preceptor	
Date of Signature	
Signature of Preceptor	
As Preceptor of this elective, I agree to complete (and return) an evaluation form for this rotation	Yes or No

	Date	Signature
Resident		
Program Director/ Assistant Program Director		





DIVISION OF UROLOGY

ON-CALL SCHEDULE POLICY

The creation of the resident on-call schedule is the responsibility of the acting Chief Resident – the Chief Resident is expected to approve, along with the Program Administrator, all vacation and educational/professional leave in accordance with the PARO guidelines.

Once finalized, there will be NO changes to the call schedule <u>without the input and approval of the</u> <u>Chief Resident.</u> If there is dispute or conflict regarding the schedule, the Chief Resident will assess the concern and make a decision. If continued dispute, the Program Director/Assistant Program Director will intervene and make the final decision.

Draft weekend and holiday call schedules should be created by the Chief Resident quarterly and will ensure equitable distribution of weekends and holiday coverage throughout the year.

Monthly on-call schedules should be created well in advance of the start of each month (for example, the June call schedule should be finalized by May 1). It is expected that the schedules will be equitable and fair – this may not be possible on a monthly basis, but tally will be even by year end.

It is also the responsibility of the Chief resident to guarantee coverage (per PARO guidelines) for annual Urology meetings (American Urological Association and Canadian Urological Association meetings) and make decisions to ensure enough residents remain in the city for call coverage. The Chief Resident will make decisions regarding whether or not a more junior resident can be away from service in order to attend/present at meeting.

The duty of the Chief Resident is to review requests surrounding annual meetings, find out what is being presented and when, and then approve (or deny) education time or vacation for the meetings, and then report the approvals (or denials) to the Program Administrator for documentation. The Program Administrator will maintain an up to date tracking of vacation days, education days, lieu and float days, as well as number of on-call days to be distributed regularly to the Chief Residents.

CURRENT PARO CONTRACT MAXIMUMS OF CALL COVERAGE

Each resident is entitled to 2 complete weekends off (which includes Friday night) for each 28-day time period. In addition, for home call services, residents cannot be scheduled for two weekends in a row. If residents are required to round on some weekends, they still need to have 2 complete weekends off per month, where they will not be oncall or come in to round on patients. Unless otherwise agreed to by the affected resident, PARO and the Program Director, residents should not be scheduled for consecutive periods of call.

Call maximums are based on total days ON service (vacation and other time away are deducted from total days on service before calculating maximum call).

Continued over...

MAXIMUM HOME CALL IS 1 IN 3

Number of Home Calls

17-19	6
20-22	7
23-25	8
26-28	9

A resident cannot be on home call on 2 consecutive weekends. Home call cannot be averaged over multiple months. While on some services, residents do a blend of in-house call (e.g., CTU call) and home call (e.g., for their primary service). In that case, the formula to calculate call maximums is as follows:

Blended home and in-house call formula: (Number of Home Call Assignments) x 3 + (Number of In-House Assignments) x 4 = maximum of 30 over a 28-day period.

NIGHTLFOAT CALL

Night float call is scheduled as home call covered by PGY1-3 residents on-service and supported by backup home call with a more senior resident (PGY3-5).

Night float format: Day of Week: Monday (work the day) to Thursday Times: 17:00 – 08:00

Residents scheduled on night float will not be expected to have flanking weekend call shifts.

Residents are to leave the hospital at 08:00 am at the latest. They may round with their respective teams, but are not to be given any tasks that will delay this.

Urology residents on research blocks, radiology or medical/radiation oncology blocks will also be expected to participate in call coverage in a reduced fashion as backup home call for more junior residents.

ON-CALL CONVERSIONS/POST-CALL DAYS

Calls can be converted if a resident is called into the hospital to perform duties between the hours of midnight but before 6:00 am, or if the resident is called into the hospital to perform duties for at least four consecutive hours with at least one hour of which extends past midnight.

Junior Urology residents who convert call per the above PARO guidelines will be excused from all duties the following day. It is the responsibility of the Chief resident at that site to ensure that the program administrator and all faculty at that site are made aware that the junior resident is not available.

Senior Urology residents who convert call per the above PARO guidelines can opt out of clinical duties the following day. If the Senior Resident opts for a post-call day, the Chief resident at that site must to ensure clinical coverage and notify the program administrator and all faculty at that site that the resident is not available.

Revised: 2023.02.16 RTC





UROLOGY CHIEF RESIDENT EXPECTATIONS AND GUIDELINES

- 1. Call schedule is to be sent out month in advance.
- 2. Master rotation schedule should be done as early as possible (sent to us by the Department of Surgery by mid-May). Try to give PGY4s electives staring in September for interviews and site visits. PGY5s to be assigned to St. Joseph's (or UH if necessary) while Acting Chief.
- 2. Vacations should be approved ASAP (general rule of no more than two off at a time). PARO rules residents are to submit vacation requests 4 weeks before the proposed commencement of the vacation.
- 3. Rules for conferences:
 - Need to maintain a minimum of 4 residents in the city
 - Priority to attend conferences:
 - 1. Interviews
 - 2. Podium presentation (if issues, program may ask for copy of acceptance letter)
 - 3. Then posters
 - 4. First come first serve (PGY5s lowest priority)
- 4. Controversies with Junior residents regarding scheduling changes can occur (decisions to move juniors from site to site re: coverage) PGY5s are to discuss and agree, and Chief is to relay results to Junior Resident.
- 5. Disagreement among Chiefs may occur which should be handled professionally and respectfully -- it is never appropriate to use aggressive or derogatory language against another PGY5.
- 6. Grand rounds schedules to be done in advance with at least 4 assigned for day chief to assign/schedule a "back-up" each week. Resident seminar topics to be provided to the Program Administrator in a timely fashion to ensure consultant scheduling.
- 7. Keep track of radiology rounds and ensure years at the site to compile cases and send to radiologist one week in advance.
- 8. Per PARO guidelines, residents may take post-call days (if they meet call conversion criteria). If a resident wishes to take a post-call day, the site Chief is to notify the Program Administrator via email.

2017.04.25





PGY4-PGY5 RESIDENT EXPECTATIONS AND GUIDELINES: POST RC EXAM

PGY4 and PGY5 Urology residents post-RC exam are:

- a. Fully expected to attend clinic as much as possible post RC exam
- b. Attend educational activities as much as possible (especially in a supervisory role) and ensure other residents do as well
- c. Post-RC exam, PGY4/5 are expected to take an active role in teaching during academic half days, OSCEs and labs

Other Responsibilities/Expectations:

- a) Team Supervision:
 - Supervising the team should remain the responsibility of a PGY4/5 if at a site
 - These responsibilities include review consults, email staff/update staff, ensure closed loop communication between residents and staff)
 - Assign residents to clinics/OR's per the weekly schedule
- b) On-Call:
 - PGY4 and PGY5 residents post-RC exam are expected to participate in call (including first call) over Christmas/New Year call and AUA/CUA coverage if not attending/presenting
 - Take One-Number calls
 - Assisting in on-call cases with more junior residents (if needed)
- c) Teaching:
 - Plan M&M Rounds (PGY5s)
 - Participate in weekly grand rounds cases as much as possible including presenting round cases
 - Supervise/teach CSTAR/simulation labs
 - To be assigned teaching RCEP sessions
- d) Research Day:
 - PGY4 and/or PGY5 Urology residents post-RC exam are fully expected to continue research and have a presentation at the annual JK Wyatt Urology Residents Research Day
 - Coordinating round table discussion with guest speaker
 - Purchasing a gift for the guest speaker (and presenting it them at the dinner)
 - Coordinating resident and staff awards
- e) Education:
 - Complete all EPA's, including Transition to Practice in advance of year end





EXPECTATIONS FOR PGY4 TIME AWAY FOR EXAMS/EXPECTATIONS

1. <u>Clinical duties:</u>

PGY4 absence from clinical duties is not acceptable during the entire year, unless on vacation or pre-exam prep off.

- The program will provide 2 weeks off for exams (one week prior to each portion of the Royal College exam) this is compatible with PARO and other Canadian programs
- Reading days should only be taken if there are no clinical activities scheduled that day PGY4s are to participate in all day to day clinical activities. Chiefs are encouraged to attend 1-2 clinics per week, when there is no available OR where they can be primary assistants or surgeon.
- Chiefs are responsible for all rounds and communications about patients and consults unless away on research elective block or on vacation
- Chiefs must remain available to senior and junior residents on the teams for communication regarding patients and administrative issues

2. <u>PGY4 Electives:</u>

Electives during PGY4 may be Clinical or Research. Electives are not considered to be free study time. Objectives for each elective type are to be sent to PD and PA one month prior (minimum - see research elective policy).

<u>Research</u>

PGY4 Research objectives are to be approved by the supervisor and the program well in advance of the elective time. Failure to do so will result in cancellation of the research elective block and the PGY4 placed back on service. Supervisors will be contacted directly at the end of rotation and if objectives are not met will result in a rotation failure on the ITER.

<u>Clinical</u>

PGY4 Clinical objectives are to be approved by PD/APD in advance of the elective time. This elective includes a personal learning plan, which includes PGY4 identified deficiencies in operative and clinical skills. A minimum of 3 clinical days. PGY5 are not responsible for rounding, consults and other daily clinical activities during their elective.

3. Call schedule:

Chiefs are allowed to front load their calls earlier in the year. However, calls can only stop one month prior to the written exam date. Calls may be reduced in number up to two months before the written exam date, provided adequate coverage is available. However, the program reserves the right to schedule call (first and second) for PGY4 depending on clinical, wellness and educational needs. This is irrespective of call tally. Prior call in the year cannot be used as a reason for no call during this period. The exception to this is the one week prior to the exam, where PGY4s are relieved of all clinical duties.





TUESDAY MORNING COVERAGE FOR ACADEMIC HALF DAYS Division of Urology

Implementation Date:July 1, 2017Time of Coverage:06:45 am - 12:00 noon, every Tuesday

- 1. Coverage will be site specific
- 2. Fellows at each site will cover all calls/consults during the above noted hours, and may round with the residents prior to 6:45 am. There will be a consultant assigned to each site on a weekly basis to back up the fellow and to provide coverage if no fellow is available.
- 3. Site specific fellow/consultant coverage details will be added to the monthly on-call schedule.
- 4. Tuesday morning call coverage will consist of:
 - a) Being available prior to 645am to receive handover from the residents (either by phone or in person at Grand Rounds at SJH).
 - b) Answering pages and creating a list of consults/to do's for the residents which will be handed over at 12:00 noon. Non-urgent ward consults may be deferred and handed over to the on call day resident at Noon.
 - c) Performing urgent Emergency Room, ward and intraoperative consultations that cannot wait until 12:00 noon.
 - d) If issues arise with a patient at UH or SJHC, the person covering Tuesday am is expected to review with the on-call staff (for new patients without a London urologist), or with the patients existing London urologist as necessary.
- 5. Resident responsibilities:
 - a) Ensure all orders are placed and nursing questions answered during morning rounds (prior to 6:45 am)

b) One member of the urology team at the specific site will provide handover to the person covering 1st call at the end of ward rounds. Critical issues with inpatients or consult patients must be clearly communicated.

- c) Notify switchboard at completion of academic half-day to switch over pagers to the on-call resident at each site (no later than 12:00 noon)
- 6. If no academic activities are scheduled due to meetings, vacations or shut downs, residents will use the time for study or research and are NOT be expected to cover clinical activities. Residents will be expected to cover clinical activities during recognized holidays that fall on a Tuesday (ie. Remembrance Day, Canada Day, Christmas and New Year's).

2017.06.01





UROLOGY RESIDENT WELLNESS REPRESENTATIVE

"Wellness: to enrich the experience of medical education as trainees, teachers, and clinicians to inspire a redefined work environment for resident physicians, promote a culture of respect, and to champion the good health of Canadian resident physicians in mind, body, and spirit."

Role Description

Description of Wellness Representative:

The Urology Resident Wellness Representative is the resident who will help guide fellow residents/colleagues in fostering a culture of respect and wellness, as well as collaborate with the Residency Training Committee to maintain focus on overall resident well-being.

Qualifications:

The Urology Resident Wellness Representative must be a resident currently enrolled at Western University and have an interest in resident wellness and education.

Appointment and Review Process:

The Urology Resident Wellness Representative is an annual voluntary position, with agreement from the resident body and approved by the Program Director/Assistant Program Director (PD/APD). If no volunteer, the PD/APD will assign a resident. If more than one volunteer, an anonymous resident vote will occur. The term of this appointment will be one year (July-June).

Duties of the Role:

- 1. Create and maintain the annual resident wellness budget, reporting to the Faculty Wellness Representative and Residency Training Committee.
- 2. Help to identify factors contributing to resident burnout and provide resources and support to residents (example: Learner Equity and Wellness office, PARO helpline).
- 3. Liaise with the Residency Training Committee to identify solutions in order to diminish resident burnout.
- 4. Act as a liaison between the resident body and program administration by attending Residency Training Committee meetings with the goal of maintaining focus on overall residents wellness.
- 5. Organize non-academic activities for the Urology residents (example: annual dinner) funded by the Division.
- 6. Coordinate non-academic non-funded social events/activities for the Urology residents (examples: game day, backyard potluck, ice cream day)
- 7. Plan and implement program-related social activities (examples: Urology Olympics, games for summer party) and liaise with residents regarding attendance/participation including scheduling, games, create teams, run the games at the event, etc.
- 8. Mentor and support residents, while maintaining confidentiality, and guide them to resources
- 9. Coordinate with the CBME Resident Lead to champion CBME and help to provide support and feedback

Wellness Budget:

The program will provide a maximum of \$2,500 per year for resident wellness. The Wellness Representative will provide an annual projected budget, proposing how the monies will be spent for the year, to the RTC for approval each July.





DIVISION OF UROLOGY SOCIAL MEDIA COMMITTEE TERMS OF REFERENCE

Committee members:

Staff supervisor Senior Resident Junior Resident

Term:

2 year with opportunity for renewal

Role:

- Maintenance of Division of Urology Instagram account (social)
- Contributor to Division of Urology twitter account (academic)

Goals:

- Enhance social media presence for our program to engage medical students, residents, and other health care professionals
- Highlight and enhance distribution of academic achievements
- Promote resident wellness
- Dissemination of social programs, events, etc.
- Attract future applicants to our program

Responsibility:

- Divisional social media passwords should be protected and maintained by the social media committee only and not to be shared outside of the committee
 - Passwords will change with the change of committee members
 - o Passwords to be provided the Program Administrator
- Only members of the committee may post; however, photos/posts/text can be provided by other residents/staff as desired, but ultimately approved by a member of the social media committee
- At minimum a weekly Instagram post
 - Including, but not necessarily limited to: stories, reels, educational posts, features, giveaways, program updates, events, Instagram live, day in the life etc.

Terms:

- Any posted photos must be approved by those that appear in them
 - This can be by verbal, written text, or implied by providing the photo to the social media team for public use
- No posts of patients, discussion of cases, or any patient identifying information, this includes intraoperative photos that might include patients
- No photos of genitalia
- Photos and posts must be sensitive to EDID issues
- Cannot post sexual innuendos
- No derogatory posts about any person or group of persons. There will also be no post that suggestion discrimination against any group of people.
- Cannot post either direct or indirect slander or suggestion of malpractice against a colleague, co-resident, or any other professional
- These posts are not personal opinions and should not include feelings about public issues, which include but are not limited to politics, policies, public health issues, etc.

ROBOTIC TRAINING FOR UROLOGY RESIDENTS

The purpose is to set out an organized approach to teaching complex urologic robot assisted laparoscopic surgery to residents.

<u>Goals</u>

- 1. To train residents in the safe operation of the Da Vinci Robot.
- 2. To improve resident comfort and knowledge of the Da Vinci Robot.
- 3. To train residents in the steps of robot assisted laparoscopic pyeloplasty.
- 4. To train residents in the steps of robot assisted laparoscopic radical prostatectomy (RARP).

Background

There are currently 11 Da Vinci robots in Canada. These are all located at training centres. Currently at UWO, urology residents gain exposure to cases by attending cases being performed. Initial involvement has included first assisting in cases as the bed side surgeon. Dr. Pautler has run a urologic laparoscopy course with live porcine laparoscopic surgery at CSTAR (2008) and prior to that at SJHC (2004). Dr. Sener has run a laparoscopy and Single-port access course at CSTAR (2009).

The use of the Da Vinci robot has increased in Canada with >1000 RARP having been performed. This surgery is very complicated and is difficult to teach within the current constraints of the health care system. Major issues include:

- 1. The increased operative time required for trainees to become proficient in the use of the robot for the procedure.
- 2. The long waiting lists for prostate cancer surgery and provincial reporting that necessitate proficiency in the operating room.
- 3. The relatively low number of robot assisted pyeloplasties, limits the ability of residents to get experience with a relatively safe operation.
- 4. The lack of available jobs at centres with surgical robots limits the interest of trainees in becoming proficient.
- 5. The patient safety concerns with the increased risks of complications observed in the learning curve for RARP.
- 6. The current Da Vinci robots at the two London hospitals do not support a teaching console. The newest version of the robot has a teaching console and should be considered a priority from a teaching perspective.
- 7. The commercially available simulator for robotic urologic surgery is not compatible with the models in London.

Robotics Training Curriculum in Urology at Western

To overcome these issues, we have developed a step-wise approach to teaching surgical robotics to the UWO urology residents.

This approach includes 3 phases:

1. Didactic teaching, hands-on dry lab experience.

During this time the residents will come familiar with the robot and it's components.

a. Read the AUA Handbook of Laparoscopic and Robotic Fundamentals by going to <u>www.auanet.org</u> and clicking on Residency in the tool bar at the top. Under 'Resident Education' residents will see the bullet Basic Laparoscopy Training Guideline. By clicking on this the resident will open the AUA Handbook of

Page 56

Laparoscopic and Robotic Fundamentals.

- b. Read the attached documents on the steps of the procedure for the Laparoscopic Nephrectomy and Laparoscopic Suturing and Knot Tying.
- c. Complete the online training model provided by Intuitive Surgical.

daVinci Standard System Online Material:

daVinci Standard Online Module:

http://www.intuitivesurgical.com/assets/training_materials/dV_Standard/Fundamentals_Standard/Fundamentals_Standard.htm

daVinci Standard Module Exam:

http://www.intuitivesurgical.com/assets/training_materials/dV_Standard/Fundamentals_Exam_Standard/Fundamentals_Exam_Standard.htm

A passing mark of 80% must be obtained from the online exam. The certificate of completion must be printed off and copies given to the program director for your training file.

- d. The resident will demonstrate proficiency in robot set, handling, instrument changes, suturing, and troubleshooting. The residents will be required to attend the didactic experience (ideally, the Intuitive surgery course at an approved training centre). Thereafter, the residents will work in pairs. Two hours per session (ideally weekly), for a total of 10 hours of dry lab experience. The residents will need to be proficient with tasks including suturing (continuous and interrupted, knot tying, passing rings, pattern cutting, and vesico-urethral anastamosis on a model as assessed by one of the attending surgeons and the program director.
- 2. Animal lab component.

During this phase, the residents will operate on live pigs. As an animal model for prostatectomy is not available, porcine pyeloplasty and partial nephrectomy will be used for training purposes. The residents will be required to perform the surgery and be judged as proficient by the evaluators (a robotic surgeon and the program director).

3. Transfer to the operating room phase.

During this time the residents will be required to be first assistant on 10 cases of RARP. If they are deemed proficient, they will then begin console surgery. The console surgery may be either RARP or RA pyeloplasty. For RA pyeloplasty, the residents will sequentially complete the following steps:

- a. Mobilization of the lower pole and pelvis
- b. Dissection of the UPJ
- c. Pyelotomy
- d. Spatulation
- e. Reanastamosis

For RARP, there are 9 steps that will be mastered sequentially starting with the easiest steps of the procedure. In order of ease:

- a. Dropping of the bladder
- b. Opening endopelvic fascia
- c. Control of the dorsal venous complex
- d. Node dissection
- e. Dividing the bladder neck
- f. Apical dissection
- g. Dissection of the seminal vesicles
- h. Pedicle and nerve sparing

i. Anastamosis

During the RARP cases, the ideal situation is to have a resident or fellow who has prior experience with robotic surgery (at a higher level of training) at the bedside as well during the case. The novice resident will start with second assisting, then progress to first assist. With a second resident/fellow present, this will allow transition to the console for the novice resident.

The Residents will track the number of cases they are involved in and the capacity (ie: bedside assist, console including which steps). The case log should be initialed by the attending robotic surgeon at the completion of the day. This will aid in potential future credentialing scenarios.

Future Plans

As new procedures and/or robots become available, this curriculum for teaching robotic surgery will be reevaluated. In the future, the robotic surgeons will advocate for the purchase of a DaVinci Si robot with a teaching console. This will greatly enhance teaching of surgical procedures in urology.





MASTERS OF SURGERY GRADUATE PROGRAM

Introduction

The MSc in Surgery at Western has been designed to afford trainees an intensive research experience which will lead graduates to successful careers as clinician researchers at Academic Health Sciences Centers. All students will conduct novel research resulting in the completion of a Master's thesis which must be successfully defended by the student to accomplish the degree requirements. Students entering the program will consist of medical school graduates who have completed at least 2 years of surgical training or are near completion of surgical subspecialty training.

Goals

The goals of this program are to help students meet the demand and interest for medical research within Academic Health Sciences Centers. This program will uniquely provide a solid basis of research training to complement student's clinical training. Students in this program will have the opportunity to participate in a wide variety of research projects that will span the entire spectrum of research from basic science to translational research and clinical research. The projects will involve research questions that will advance our understanding and treatment of disease processes and ultimately advance clinical practice.

Program Information

Full-time Program

Normal completion of the MSc in Surgery will be 12 months (3 terms) while enrolled full-time. However each student's progress will be closely monitored by his/her supervisory committee and the final duration of the MSc program for each student will be at the discretion of the student's supervisory committee and the Graduate Program Committee. Partial program funding is usually available for students enrolled full-time who have no other funding support.

Part-time Program

The MSc in Surgery is available for part-time studies only with the permission of the student's supervisor and the Graduate Program Committee. The MSc must be completed within four years and no funding is available to part-time students. This is often the choice made by residents in a Royal College training program, where the research can often be accomplished through a minimum of 4 blocks of dedicated research time in addition to the eight months of weekly, three hour mandatory teaching sessions. Most programs have been able to accommodate this for their residents. If you are interested in pursuing this, please let your Program Director know.

Timeline

Students may start their MSc degree in May or September although most students will begin in September. Note the courses for the MSc in Surgery will run from September to April. The courses are on every Monday afternoon from 3 to 6 PM and take place in Room E2-128 (McLachlin Teaching Room), Victoria Hospital.

Application Deadline

The deadline to apply to the MSc in Surgery program for a May 1 start is January 15 and the deadline for a September 1 start is April 15. Please contact the Department of Surgery Education Office for further information.