Title of Clerkship: Introduction to Laparoscopy and Surgical Robotics: Principles and Skills Training

Elective Type: Clinical Elective
Department: Urology

Clerkship Site: Laparoscopy, Simulation and Robotics (LaSR) Training Center at StVMCC
Course Number: UROL704

Blocks available: Block 20, Block 22
Number of students per block: 8
Faculty: Mirza Baig, M.D. (faculty), Saleem Zafar, M.D. (resident), Joseph Sferra, M.D., Bernardo Martinez, (guest lecturers)

Elective Description/Requirements:
This course will review fundamentals of laparoscopic surgery including indications, complications, physiology, and basic techniques as well as other didactic information that will set the stage for skills training in a specialized laboratory setting. Basic skills will precede eventual training in complex tasks such as laparoscopic suturing. Individualized training from advanced laparoscopic surgeons will be offered with the expectation that students will practice tasks of progressive difficulty independently between group training sessions. Students demonstrating satisfactory acquisition of skills necessary for operation of the surgical robot may be allowed the opportunity to train in the basic controls of the robot, but all students will be introduced to the robot with demonstrations and videos regardless.

Length of Clerkship: 4 weeks
Educational Course Objectives:
By the end of the course:
1. Student will demonstrate knowledge of basic principles of laparoscopic surgery.
2. Student will be able to discuss physiologic effects of pneumoperitoneum, indications and contraindications to laparoscopy, patient positioning and port placement, laparoscopic instruments and their use, and basic laparoscopic surgical techniques.
3. Student will demonstrate independent learning as a means of gaining surgical skill.
4. Student will demonstrate acquisition of surgical skills in the laparoscopic environment through laboratory training and simulations
5. Student will be able to complete defined tasks including ultimately laparoscopic suturing

Linkage to UT/COM Educational Program Objectives (see attached EPOs):
This elective clerkship is designed to assist students in meeting the following EPOs of The University of Toledo College of Medicine.
1. K1 Anatomy in the laparoscopic environment, physiology of pneumoperitoneum
2. K4, S9 Indications and contraindications to laparoscopic surgery
3. K15 Economic impact of laparoscopy (costs of equipment, return to work/disability, reimbursement issues, etc)
4. S6 Laparoscopic skills, including suturing
5. P3 Independence and motivation to improve skills for future safe application of laparoscopy in patients

Professionalism:
UT/COM students will meet or exceed the institutional standards for professionalism as stated in the current Educational Program Objectives and the current Educational Course Objectives for the Sponsoring Department.

Instructional Methods:
Lectures
Assigned readings
Individualized tutelage on pelvic trainers
Video recording and review of task training

Evaluation methods employed:
1. Mastery of didactic information will be measured with a written quiz testing the students' assimilation of lecture and reading material.
2. Data for all skills acquisition will be measured by time to perform certain tasks and ability to complete complex tasks; successful course completion will not require a certain score, but will require effort as evidenced by improvement in objective performance.

Prerequisites:
Successful completion of Surgery Clerkship(SURG703)

Clerkship Director: Mirza Baig, M.D.

Clerkship Coordinator: Cathy Weigand, RN, MSN - 419.251.4079
Phone Number: Mirza Baig – 419.725.6850
Email: RoMIUS Institute
2000 Regency Court, # 201
Toledo, Ohio

Special Requirements:
None. Especially valuable for students applying for or matched in a surgical residency (Gen Surg, Urology, Gynecology, etc.). No night call.

AAMC Hot Topics Addressed in this Elective Clerkship:
None