

<b>FOURTH YEAR ELECTIVE TITLE</b> <b>ELECTIVE IN EMERGENCY DEPARTMENT BEDSIDE ULTRASOUND</b>		<b>COURSE NUMBER</b> EMED 9010	<b>LOCATION</b> ROBERT WOOD JOHNSON UNIVERSITY HOSPITAL
<b>ELECTIVE DIRECTOR</b> CHRISTOPHER BRYCZKOWSKI, MD Michael Mirza, MD	<b>ELECTIVE FACULTY</b> FACULTY, DEPARTMENT OF EMERGENCY MEDICINE	<b>ELECTIVE CONTACT</b> Michelle Bardsley EMERGENCY MEDICINE MEB 388 NEW BRUNSWICK	<b>CONTACT PHONE/FAX/EMAIL</b> PH. 732-235-8783 OR 8717 Fax 732-235-7379 <a href="mailto:holswomi@rwjms.rutgers.edu">holswomi@rwjms.rutgers.edu</a>
<b>BLOCKS AVAILABLE</b> 7,8,9,10,11	<b>DURATION/WEEKS</b> 2-4 Weeks	<b>HOURS PER WEEK</b> 40	<b>STUDENTS</b> MS III MS IV Max 1
<b>LECTURES/SEMINARS</b> Yes	<b>OUTPATIENT</b> Yes	<b>INPATIENT</b> No	<b>HOUSESTAFF</b> No
<b>NIGHT CALL</b> No	<b>WEEKENDS</b> No	<b>LAB</b> No	<b>EXAM REQUIRED</b> No

#### **OVERALL EDUCATIONAL GOAL OF CLERKSHIP**

The overall goal of this elective is for the student to develop skills needed to perform and interpret bedside ultrasound in the Emergency Department

#### **OBJECTIVES**

*Letters in parenthesis refer to which of the six core competencies this objective addresses: Medical Knowledge (MK), Patient Care (PC), Professionalism (P), Communication and Interpersonal Skills (C), Practice Based Learning and improvement (PBL), and Systems Based Practice (SBP)*

1. Demonstrate a basic understanding of the role of Emergency Department Ultrasound in patient care as defined by the American College of Emergency Physicians Section of Emergency Ultrasound. (PC, MK, SBP)
2. Demonstrate skill in performing the following basic Emergency Department Ultrasound applications in the emergency department clinical setting: Aorta, Cardiac, E-FAST, Vascular access, Renal, Gallbladder, Pelvic. (PC, MK)
3. Demonstrate basic understanding of image acquisition protocols of all basic Emergency Department Ultrasound applications. (PC, MK)
4. Demonstrate basic understanding of Emergency Department Ultrasound departmental QA process (i.e. logging in and recording scans, entering patient data into machine, following up on confirmatory studies, grading scans done by faculty). (SBP)
5. Use patient care experiences where Emergency Department Ultrasound was performed and influenced management to improve their understanding of why this skills set is critical to the practice of Emergency Medicine. (PBL)

**BRIEF DESCRIPTION OF ACTIVITIES**

1. Students will receive didactic instruction via online lectures at the beginning of the elective
2. Students will receive bedside teaching and perform ultrasound in the Emergency Department (scan shift) under the oversight of the Director of Emergency Department Ultrasound program (1 shift/week, approximately 5 hours).
4. Students will independently scan in Emergency Department from 9am – 5pm, Monday-Friday. The student will do this under the supervision of other faculty members in the department on patients that need ultrasounds. These scans will be reviewed by Director of Emergency Department Ultrasound program during tape review sessions (see below).
5. Students will participate in image review sessions with Director of Emergency Department Ultrasound program as part of the departmental QA process. During this time the individual student scans from prior week will be reviewed (2 hours / week).
6. Students will perform pelvic scanning on a phantom model prior to being allowed to scan real patients.
7. Students will perform ultrasound-guided intravenous lines on phantom models prior to being allowed to perform on real patients.
8. Students will be given resources for independent study.

**METHOD OF STUDENT EVALUATION**

Students will be evaluated by attending faculty in each of the below activities. To receive a passing grade in this course, the student must:

*The numbers in parenthesis at the end of each requirement refer to the course objectives being evaluated.*

1. Work all scheduled ER scan shifts. (2, 3)
2. Watch all ultrasound based online lectures. (1-6)
2. Attend all didactic sessions with Director of Emergency Department Ultrasound (1-6)
3. Attend image review sessions with Director of Emergency Department Ultrasound (3, 6)
4. Complete scan worksheets using qpath web-based image archival system. (2)

**ARE THERE ANY PREREQUISITES FOR THIS ELECTIVE?** Yes, Medicine and Surgery are required; Ob/Gyn is recommended

**IS THIS ELECTIVE AVAILABLE TO THIRD YEAR MEDICAL STUDENTS AS WELL?** Yes