RADI 7011 PRACTICE OF VASCULAR SONOGRAPHY 1

Credit Points 10

Legacy Code 401293

Coordinator Donna Oomens (https://directory.westernsydney.edu.au/search/name/Donna Oomens/)

Description This subject introduces students to the practice of vascular sonography. Students will learn how to acquire and optimise ultrasound images and to make basic measurements. In addition, they will learn to draw conclusions about vascular anatomy and function based on the images and measurements; and they will develop their professional and ethical skills through learning how to plan for and implement a vascular ultrasound examination in a safe and ethical manner. The skills learnt in this unit, which includes a work-integrated component, provide well-rounded, foundation skills in vascular sonography.

School Medicine

Discipline Radiography

Student Contribution Band HECS Band 2 10cp

Check your fees via the Fees (https://www.westernsydney.edu.au/currentstudents/current_students/fees/) page.

Level Postgraduate Coursework Level 7 subject

Co-requisite(s) RADI 5001

Restrictions

Students must be enrolled in 4765 Graduate Diploma in Vascular Sonography

Assumed Knowledge

Basic human anatomy & physiology and mathematics.

Learning Outcomes

On successful completion of this subject, students should be able to:

- 1. Acquire and appraise standardised ultrasound images using machine optimisation and transducer manipulation.
- 2. Implement appropriately selected anatomical and physiological measurement techniques in clinical practice.
- Plan examinations and structure workflow to ensure best patient outcomes.
- 4. Apply a legal, ethical and safe framework in professional practice.
- 5. Document initial clinical experiences and professional learning activities.

Subject Content

Module 1: Sonographic practice 1

I. Anatomical planes and sonographic nomenclature

II. Ultrasound machine operation

Module 2: Professional & Ethical practice 1

I. Planning and implementing an ultrasound examination

II. Legal and ethical practice

III. Work Health and Safety & ergonomics

Module 3: Speciality knowledge and imaging skills 1

- I. Vascular anatomy overview
- II. Cardiovascular system

III. Electrophysiology

IV. Non-imaging physiological testing 1

V. Image acquisition & measurement 1

VI. Image acquisition & measurement 2

VII. Fundamental machine operation 1

VIII. Fundamental machine operation 2

Special Requirements

Legislative pre-requisites

Special Requirements - NSW Health Legislative Prerequisites Pre-requisites

Student Compliance Information for all Health-Related Placements

Prior to enrolling in this subject, students must have submitted a Student Undertaking Form and undertake to apply for a National Police Check, which is required to be submitted before placement, and a Working with Children Check Student Declaration. Use the link to the Special Requirements webpage below for more information.

To be eligible to enrol in this subject and complete any required healthrelated placements or experiences, students must meet Western Sydney University program requirements as well as any special, legislated, or policy-mandated requirements.

Western Program Requirements

Visit the Special Requirements webpage for details about your program.

Special Requirements (https://www.westernsydney.edu.au/currentstudents/current_students/enrolment/special_requirements/)

Mandatory NSW Health student placement policy requirements

To be able to undertake placement in any NSW Health facility you must be assessed as compliant with NSW Health student placement policy in the first year of your program, regardless of when you expect to go on your first placement. Access and read the NSW Student Compliance Information Booklet.

NSW Student Compliance Information Booklet (https://www.westernsydney.edu.au/placements_hub/placements_hub/student_compliance/)

Please ensure that you

- 1. Find your existing National Police Check or apply for one
- 2. Gather documentary evidence of your vaccination history
- 3. Print and compete all relevant NSW Health forms relevant to the campus you are enrolled at or online enrolment requirements
- Follow booklet instructions on how to have your compliance documents assessed by NSW health staff.

International students have additional requirements; the link to the booklet will inform you of these requirements.

School Requirements

Contact your School for further details regarding your School's requirements, if any, such as

- If you live outside of NSW or Australia and need to meet your state, territory or country's compliance requirements
- If you need to meet different state, territory or country compliance requirements.
- NSW Working with Children Check (WWCC) or other state equivalent, valid for your entire program.

- Current approved first aid certificate valid for your entire program

 approved program providers can be found at the Government
 Training website
- http://training.gov.au (http://training.gov.au/)
- Other non-health related requirements.

Student Compliance Resources are also available on the Placements Hub web page (NSW students only)

https://www.westernsydney.edu.au/learning_futures/home/ placements_hub/placements_hub/student_compliance (https:// www.westernsydney.edu.au/learning_futures/home/placements_hub/ placements_hub/student_compliance/)

Legislative requirements (such as a criminal record check) are not deemed necessary for students in the vascular ultrasonography course. For students who complete their clinical training in a NSW public hospital, the necessary legislative requirements will be part of their employment conditions. Clinical training for many of the students will be in a private setting, where the necessary requirements (which are likely to differ from public institutions) will be addressed as needed. Training for some students will occur in locations other than NSW (where legislative requirements can be competed if, and when required).

Assessment

The following table summarises the standard assessment tasks for this subject. Please note this is a guide only. Assessment tasks are regularly updated, where there is a difference your Learning Guide takes precedence.

Туре	Length	Percent	Threshold	Individual/ Group Task	Mandatory
Applied Project	20 ultrasound & anatomical images with 750 word reflective writing	20	N	Individual	N
Quiz	90 minutes	30	N	Individual	N
Practical Exam	2 hours	50	Υ	Individual	Υ
Portfolio	200 studies with reflective	S/U	Υ	Individual	Υ

Prescribed Texts

 Schaberle W. Ultrasonography in vascular diagnosis: a therapyorientated textbook and atlas. [internet] 2nd Ed. Berlin: Springer; 2016 Available from: http://ebookcentral.proquest.com

Teaching Periods

Autumn (2025)

Campbelltown

Hybrid

Subject Contact Donna Oomens (https://directory.westernsydney.edu.au/search/name/Donna Oomens/)

View timetable (https://classregistration.westernsydney.edu.au/odd/timetable/?subject_code=RADI7011_25-AUT_CA_3#subjects)