



**Karolinska
Institutet**

Course syllabus for

Radiography - clinical education 3, 7.5 credits

Radiografi - verksamhetsförlagd utbildning 3, 7.5 hp

This course syllabus is valid from autumn 2012.

Please note that the course syllabus is available in the following versions:

[Autumn2007](#) , [Spring2009](#) , [Autumn2009](#) , [Autumn2012](#) , [Autumn2016](#) , [Autumn2018](#) , [Autumn2024](#) , [Spring2025](#)

Course code	1RS014
Course name	Radiography - clinical education 3
Credits	7.5 credits
Form of Education	Higher Education, study regulation 2007
Main field of study	Radiography
Level	G1 - First cycle 1
Grading scale	Pass, Fail
Department	Department of Clinical Science, Intervention and Technology
Decided by	Programnämnden för röntgensjuksköterskeprogrammet
Decision date	2007-06-20
Revised by	Programnämnd 6 (Biomedicinsk analytiker- och Röntgensjuksköterskeprogrammen)
Last revision	2012-05-09
Course syllabus valid from	Autumn 2012

Specific entry requirements

To be qualified to a higher semester, it is required that the student has taken at least 15 credits from last semester, and all credits from previous semesters. For admission to the course, passed from the course Radiography - clinical rotation 2, 7.5 HE credits, is required. Students who have failed in the clinical rotation or the equivalent as a consequence of demonstrating serious deficiencies in knowledge, skills or attitude, that the patient's safety or confidence in healthcare have been at risk is qualified for new placement only when the individual action plan has been completed.

Objectives

On completion of the course, the student should be able to:

- Show professional attitude in contact with patients, observe the patient's needs of care and take measures for the patient's safety and convenience in connection with examinations and give adequate information to patient and relative.
- Carry out commonly occurring computed tomography examinations and administrate intravenous

contrast agents.

- Apply positionings and methodology at computed tomography examinations based on the patient's anatomy and physiology and contents in the referral.
- Identify risk patients in connection with administration of drugs and be able to account for readiness to act at contrast media reactions.
- Account for diagnostic methods within breast diagnostics on a mammography section.
- Explain and demonstrate standard projections of mammography and explain different diagnostic methods which are included in breast diagnostics.
- Document adequate information in connection with examinations.
- Show ability to cooperate with different professional representatives.
- Identify the own strengths and limits and to express needs for development within the subject of this course.

Content

The main part of the course implies practical skills training at computed tomography and a smaller part at mammography. The clinical rotation focuses on parts that concerns skills in connection with examination as well as communicative aspects and patient care.

The student will train to perform commonly occurring computed tomography examinations in the whole. In addition to performing examinations, it includes also communication with patients, giving instructions and information about examination, patient preparations, other preparations and intravenous injections of contrast media by hand and/or with power injector, basic reconstructions of skull and abdomen examinations, and documentation. In this part, a study assignment about readiness to act at acute reactions in connection with injection of iodine contrast agents, is included.

On mammography section, the student will train the implementation of mammography with support of a tutor. Study assignment is included in breast diagnostics.

The student deepens his knowledge of patient care by identifying the patient's needs of care at various types of examinations and take actions for care of the patient's well-being and convenience at radiographic examinations.

Teaching methods

Clinical training when the student trains communication skills and patient care, and planning, preparing and performing radiographic examinations as a whole with support of a tutor.

Study assignments and seminars.

The student is expected to take responsibility for his/her own learning through active knowledge acquisition and participation in examinations.

To write a personal portfolio in order to support the own professional development.

Examination

In the final assessment, an overall assessment, presentation of study assignment and clinical examination at computed tomography, and a study assignment at mammography, are included. Assessments during the placement are carried out by means of evaluation forms about which the student is informed at the beginning of the course. At the clinical examination, the student performs examinations on patient based on referral and method book. The student should even orally account for examination method concerning technology, projections and anatomic structures in the illustrative material, using correct terminology.

The clinical rotation is compulsory and constitutes 32 hours per 1.5 credits. Compensation due to absence will be planned in consultation with appointed clinical teacher.

The student has the right to undergo the clinical rotation within a course at most two times.

The examiner may with immediate effect interrupt a student's clinical rotation (VFU), or the equivalent, if the student demonstrates such serious deficiencies in knowledge, skills or attitudes that patient safety or patient confidence in healthcare is at risk. When clinical rotation is interrupted according to this, it implies that the student fails in the current part, and that one clinical rotation opportunity is used up.

In such cases, an individual action plan should be set up for required activities and exams, before the student is given a possibility for a new clinical rotation in the course.

Transitional provisions

The student may be examined under a previous syllabus within a year after the date when a close-down or major changes of the course was decided.

Other directives

Course evaluation will be carried out in accordance with the guidelines established by the Board of Education at Karolinska Institutet.

Literature and other teaching aids

Björkman, Eva; Karlsson, Karin

Medicinsk teknik för sjuksköterskor : material, metod, ansvar

2., [rev. och utök.] uppl. : Lund : Studentlitteratur, 2001 - 206 s.

ISBN:91-44-01669-7 LIBRIS-ID:8353030

[Library search](#)

Ehrlich, Ruth Ann; McCloskey, Ellen Doble; Daly, Joan A.

Patient care in radiography : with an introduction to medical imaging

6. ed. : St. Louis, Mo. : Mosby, cop. 2004 - xv, 447 s.

ISBN:0-323-01937-4 LIBRIS-ID:9649937

[Library search](#)

Författningshandbok för personal inom hälso- och sjukvården.n 2007 = 38. uppl.

Raadu, Gunnel

Stockholm : Liber, 2007 - 727 s.

ISBN:978-91-47-08420-3 LIBRIS-ID:10324013

[Library search](#)

Isaksson, Mats

Grundläggande strålningsfysik

Lund, Annika

Lund : Studentlitteratur, 2002 - 310 s.

ISBN:91-44-01528-3 LIBRIS-ID:8427844

[Library search](#)

Möller, Torsten B.0 77501

Pocket atlas of radiographic positioning

Reif, Emil

Stuttgart : Thieme, 1997 - ix, 286 s.

ISBN:3-13-107441-8 (Stuttgart) LIBRIS-ID:4668759

[Library search](#)

Möller, Torsten B.0 77501; Reif, Emil

Pocket atlas of radiographic anatomy

2. ed. rev. and enlarged : New York ;a Stuttgart : Thieme, 2000 - 374 s.

ISBN:3-13-784202-6 LIBRIS-ID:8279031

[Library search](#)

Möller, Torsten B.; Reif, Emil

Pocket atlas of sectional anatomy : computed tomography and magnetic resonance imaging. n Vol. 1, p Head and neck

3. ed., rev. and updated /b Torsten B.Moeller, Emil Reif : Stuttgart : Thieme, 2007 - ix, 264 s.

ISBN:3-13-125503-X (GTV) LIBRIS-ID:10257344

[Library search](#)

Möller, Torsten B.; Reif, Emil

Pocket atlas of sectional anatomy : computed tomography and magnetic resonance imaging. n Vol. 2, p Thorax, heart, abdomen and pelvis

3. ed., rev. and updated : Stuttgart : Thieme, cop. 2007 - viii, 247 s.

ISBN:3-13-125603-6 (GTV) LIBRIS-ID:10322889

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