North Central State College

MASTER SYLLABUS	2025-2026

A. Academic Division: Health Sciences

B. Discipline: Radiological Science

C. Course Number and Title: RADS 1221 Clinical Practicum/Seminar 2

D. Assistant Dean: Heidi Kreglow, PT

E. Credit Hours: 2
Practicum: 1
Seminar: 1

F. Prerequisites: RADS 1121
Co-requisite: RADS 1251m, RADS 1270m, RADS 1275m;

G. Last Course/Curriculum Revision Date: Spring 2024 Origin date: Fall 2025

H. Textbook(s) Title: None

I. Workbook(s) and/or Lab Manual:

Radiologic Sciences Policy and Procedure Manual (provided to the student in the first semester of the program)

J. Course Description: Clinical Practicum is designed to provide students with a practical application of material learned in didactic courses. In this course students will apply their expanding knowledge of radiographic procedures to the field by positioning patients for exams, practicing radiation protection and providing patient care under the appropriate level of supervision by qualified radiographers. The students will begin to log their cumulative radiation exposure to their radiation log. Equipment manipulation skills will be extended to mobile imaging exams and surgical radiography. Students will continue to complete clinical objectives and perform clinical competencies. Seminar time will be provided on campus and students will learn a fundamental process of image evaluation and apply the technique to completed images at clinical. In addition, patient care and communication with the pediatric population will be discussed and students will rotate to pediatric site-specific clinical departments. The students will have a brief overview of special radiography modalities and the Capstone case study will be introduced so students can review cases at clinical and choose a case study to present the final semester.

K. College-Wide Learning Outcomes:

College-Wide Learning Outcome	Assessments - - How it is met & When it is met
Communication – Written	
Communication – Speech	
Intercultural Knowledge and Competence	
Critical Thinking	
Information Literacy	
Quantitative Literacy	

L. Course Outcomes and Assessment Methods:

Upon successful completion of this course, the student shall:

Outcomes	Assessments – How it is met & When it is met
1. Use effective oral, written and nonverbal communications skills when interacting within the health care field.	Image evaluation rubrics weeks 4 and 9; Clinical reflection video week in seminar week 15; Clinical Preceptor evaluation rubric week 15; Patient Care rubric in clinical week 15 Imaging modality presentation rubric in seminar week 11
2. Perform medical imaging procedures under the appropriate level of supervision	Clinical Preceptor evaluation week 15; review of competencies and radiation logs week 15
3. Provide patient-centered, clinically effective care for all patients regardless of age, gender, disability, special needs, ethnicity or culture.	Pediatric patient quiz in seminar week 2; review of technologist evaluations and clinical competencies week 15; Clinical Preceptor evaluation rubric week 15; Patient Care rubric in clinical week 15; Final exam week 16
4. Demonstrate competency in the principles of radiation protection standards	Review of technologist evaluations, clinical competency rubrics and procedures logs week 15; Clinical Preceptor evaluation rubric week 15; radiation log rubric week 5
5. Position patients for exams using correct positioning skills	Review of technologist evaluations, clinical competency rubrics and procedures logs week 15, Clinical Preceptor evaluation rubric week 15; clinical final exam week 16
6. Operate medical imaging equipment correctly	Review of technologist evaluations, clinical competency rubrics and completed clinical objectives week 15; Clinical Preceptor evaluation rubric week 15
7. Input and retrieve data correctly while using the clinical facility's HIS/RIS system	Review of technologist evaluations, clinical competency rubrics and completed clinical objectives week 15; Clinical Preceptor evaluation week 15; Image evaluation rubrics in seminar week 4 and 9
8. Select technical factors to produce quality diagnostic images with the lowest radiation exposure possible	Review of technologist evaluations, clinical competency rubrics and completed procedures logs week 15; Clinical Preceptor evaluation week 15
9. Evaluate images for appropriate anatomy, image quality and patient identification	Image evaluation presentation rubric weeks 4 and 9 in seminar; Review of technologist evaluations, clinical competency rubrics and procedures logs week 15, Clinical Preceptor evaluation rubric week 15; clinical final exam week 16
10. Integrate the appropriate personal and professional values into clinical practice.	HIPAA policy review and final exam week 16; Image evaluation rubric in seminar weeks 4 and 9; Clinical Preceptor evaluation week 15; Patient Care rubric in clinical week 15

M. Recommended Grading Scale:

This class is graded as Pass or No Pass. Students must obtain and 85% or higher in the course to receive a Pass. Students who do not pass will not be able to remain in the Radiological Sciences program.

N. College Procedures/Policies:

North Central State College believes that every student is a valued and equal member of the community.* Every student brings different experiences to the College, and all are important in enriching academic life and developing greater understanding and appreciation of one another. Therefore, NC State College creates an inclusive culture in which students feel comfortable sharing their experiences. Discrimination and prejudice have no place on the campus, and the College takes any complaint in this regard seriously. Students encountering aspects of the instruction that result in barriers to their sense of being included and respected should contact the instructor, assistant dean, or dean without fear of reprisal.

* *Inclusive of race, color, religion, gender, gender identity or expression, national origin (ancestry), military status (past, present or future), disability, age (40 years or older), status as a parent during pregnancy and immediately after the birth of a child, status as a parent of a young child, status as a foster parent, genetic information, or sexual orientation*

Important information regarding College Procedures and Policies can be found on the syllabus supplement located at
https://ncstatecollege.edu/documents/President/PoliciesProcedures/PolicyManual/Final%20PDFs/14-081b.pdf

North Central State College

SYLLABUS ADDENDUM

Academic Division:	Health Science	**Discipline:**	Radiological Sciences
Course Coordinator:	Heidi Chambers		
Course Number:	RADS 1221	**Course Title:**	Clinical Practicum 2
Semester / Session:	Spring 2026 / 16-Week Session	**Start / End Date:**	1/12/2026 thru 5/9/2026

Instructor Information

Name:	Heidi Chambers	**Credentials:**	BRST, R.T. (R)
Phone Number:	419-755-4809	**E-Mail Address:**	hchambers@ncstatecollege.edu
Office Location:	152 Health Sciences Building	**Office Hours:**	

I. Topical Timeline / Course Calendar (Subject to Change):

Weeks	Topics	Assignment	Date
1	Pelvis and Hip	Clinical Practice, Objectives and Competency	
2	Pelvis and Hip	Clinical Practice, Objectives and Competency	
3	Shoulder Joint	Clinical Practice, Objectives and Competency	
4	Shoulder Girdle (Clavicle, Scapula, and AC Joints)	Clinical Practice, Objectives and Competency	
5	Bony Thorax	Clinical Practice, Objectives and Competency	
6	Vertebral Column	Clinical Practice, Objectives and Competency	
7	Thoracic Spine	Clinical Practice, Objectives and Competency	
8	Cervical Spine	Clinical Practice, Objectives and Competency	
9	Lumbar Spine	Clinical Practice, Objectives and Competency	
10	Sacrum, Coccyx, and SI joints	Clinical Practice, Objectives and Competency	
11	Skeletal Pathology	Clinical Practice and Objectives	
12	Skeletal Pathology	Clinical Practice and Objectives	
13	Fractures	Clinical Practice and Objectives	
14	Respiratory Pathology	Clinical Practice and Objectives	
15	Respiratory Pathology	Clinical Practice and Objectives	
16	Clinical Final	Comprehensive Image Analysis and Evaluation RADS 1121 and 1150 Material (Fall 2025)	

II. Grading and Testing Guidelines:

Final Grade Calculation

Activity	Qty	Total Points Possible for Semester	Percentage
1. Clinical Competencies	10 x 100 pts	1000	25%
2. Daily Technologist Evaluations	15 x 27 pts	405	10%
3. Clinical Instructor Evaluations	2 x 100 pts	200	30%
4. Clinical Seminar (once a week, 1 hour-via Zoom)		150*	10%
5. Clinical Final	1	75*	25%
	Total	1830	100%

* Total points possible are subject to change for clinical seminar and clinical final

2. The students designated clinical preceptors and technologists will complete an evaluation of Activities 1-3 of the final grade calculation.
3. Program faculty will proctor Activities 4 and 5 of the final grade calculations.
4. **NOTE:** The overall clinical course grade is weighted. If a student does not pass clinical course with an 85% or higher, they will receive a no pass. The student will not be permitted to continue clinical courses and therefore cannot continue in the radiology program.

III. Clinical Competency Policy:

1. Students will be expected to perform clinical competencies throughout the semester
   a. The student must pass a clinical simulation at NCSC before attempting any competency exam.
   b. The student must receive a score of two in all applicable starred areas of the competency AND
   c. The student must receive an 85% or higher to pass.

2. A student who does not receive a score of two in all applicable starred areas and/or receives less than 85% total will be required to retake the competency.
   a. All repeat competencies must be completed with the designated clinical preceptor.
   b. On repeat, 10% will automatically be deducted from the final score.
   c. A student must receive an 85% or higher to pass repeat competency.

3. Ten clinical competencies are required for this semester.
   a. Competencies can be from:
      - The current semester's topical timeline listed with clinical practice and competency OR
      - The previous semester's clinical topical timeline (RADS-1121) listed with clinical practice and competency that has not been previously been performed for a competency.
   b. On completion of ten successful competencies, a student may perform 3 additional competencies in the "Free Zone." Free zone competencies will be applied to next semester requirements.
   c. All competencies should be completed with the designated clinical preceptor. If the designated clinical preceptor is not available, the clinical preceptor may assign an approved staff technologist to evaluate your performance for competency.
   d. All free zone exams are to be completed with the students designated clinical preceptor from their primary clinical site.

IV. Clinical Attendance and Make-Up Policy:

1. Clinical attendance is necessary in obtaining a high level of competency.

2. Students are responsible for attending all clinical rotation days.
   a. The student will clock 15 clinical days/105 hours.
   b. The student will clock time (in and out) through Trajecsys.
   c. The student will be on time and not clock out before the end of the clinical day.

3. Clinical absences, unverified clock times, early clock outs are documented as an occurrence.
   a. The student will refer to the NCSC Radiological Sciences Policy and Procedure Manual for Clinical Education for a complete list of occurrences.
   b. All missed time from occurrences require make up time.

4. If a student misses clinical time for any reason, a Clinical Make-Up plan will be coordinated and approved with the designated clinical preceptor.
   a. The make up plan must reflect the same or similar hours missed and be the same or similar clinical rotation missed.
   b. All make up time must be completed before the end of semester date to avoid a No Pass for a clinical grade.
   c. Make up time cannot occur during weekend or holiday hours.
   d. Program faculty and clinical preceptors reserve the right to schedule or deny make-up plan requests.

V. Clinical Expectations:

1. **The NCSC Student Radiographer is expected to:**
   a. Complete:
      - 10 clinical competencies
      - All clinical days in their assigned clinical rotation areas
      - Pediatric rotation (Akron-Trimble Road location)
      - Required objectives
      - Surgery rotation paper
      - Daily technologist evaluations by an approved staff technologist

   b. Be engaged in all clinical activities throughout the day
   c. Adhere to all policies and procedures written in the student policy and procedure manual for clinical education.
   d. Adhere to all policies of NCSC in the student handbook
   e. Adhere to all policies and procedures required by the sponsoring clinical facility.
   f. Demonstrate professionalism required in the hospital setting and in the health care field:
      - Dress professionally
      - Act professionally
      - Speak and write in a professional manner using terminology essential to the profession
      - Treat patients with dignity and respect according to the Patient's Bill of Rights
      - Display excellent attendance
      - File and/or complete all required clinical documentation in a timely manner

   g. Practice radiation protection according to the **ALARA (as low as reasonably achievable)** principle

      For Patients:
      - Minimal repeat exposures
      - Provide shielding for all patients and staff
      - Use smallest collimation size without interfering with the completed image
      - Chose correct technical factors appropriate for the patient's size and age

      For Worker/Students:
      - Employ Cardinal Principles: Minimize time, maximize distance and shielding
      - Limit amount of time near radiation source
      - Maintain minimum of 6ft distance from radiation source
      - Wear lead aprons and thyroid shields when standing close to radiation source, during fluoroscopy, surgical c-arm procedures and portable exams
      - Record exposure values from radiation monitoring reports promptly

   h. Use lead markers (right and left) correctly and place them on the image **prior** to exposure.
   i. Minimize annotations of laterality (right and left) on all images after the image has been exposed.
   j. Perform exams following the guidelines of the Joint Review Committee on Education in Radiologic Technology (JRCERT):
      - Perform repeat exposures under direct supervision with the technologist in the room checking the image prior to exposure
      - Record repeat exposures on the student tally sheet and have the R.T. initial the exposure indicating direct supervision

   k. Have all images approved by a technologist before releasing the patient from the department and submitting images to the Radiologist for a reading
   l. Maintain patient safety in accordance with the patient safety policy in the (PPM)
   m. Maintain patient confidentiality standards and meet HIPAA requirements