

# Washtenaw Community College Comprehensive Report

## RAD 215 Radiography of the Skull Effective Term: Fall 2022

### Course Cover

**College:** Health Sciences

**Division:** Health Sciences

**Department:** Allied Health

**Discipline:** Radiography

**Course Number:** 215

**Org Number:** 15600

**Full Course Title:** Radiography of the Skull

**Transcript Title:** Radiography of the Skull

**Is Consultation with other department(s) required:** No

**Publish in the Following:** College Catalog , Time Schedule , Web Page

**Reason for Submission:**

**Change Information:**

**Consultation with all departments affected by this course is required.**

**Course description**

**Outcomes/Assessment**

**Objectives/Evaluation**

**Rationale:** Updating master syllabus for course.

**Proposed Start Semester:** Fall 2022

**Course Description:** In this course, students learn how to obtain quality radiographic images of the skull, temporal bones, facial bones, and paranasal sinuses. Students will also analyze radiographic images of these areas to identify pertinent anatomy and appropriate positioning. Laboratory sessions are included to provide the student with experience in skull positioning.

### Course Credit Hours

**Variable hours:** Yes

**Credits:** 0 – 2

**Lecture Hours: Instructor:** 15 **Student:** 15

**Lab: Instructor:** 30 **Student:** 30

**Clinical: Instructor:** 0 **Student:** 0

**Total Contact Hours: Instructor:** 0 to 45 **Student:** 0 to 45

**Repeatable for Credit:** NO

**Grading Methods:** Letter Grades

Audit

**Are lectures, labs, or clinicals offered as separate sections?:** NO (same sections)

### College-Level Reading and Writing

College-level Reading & Writing

### College-Level Math

### Requisites

**Prerequisite**

RAD 110 minimum grade "C-"

and

**Prerequisite**

RAD 120 minimum grade "C-"; may enroll concurrently

**General Education**

**Request Course Transfer**

**Proposed For:**

**Student Learning Outcomes**

1. Identify positioning lines and topographic/facial landmarks associated with radiographic positioning.

**Assessment 1**

Assessment Tool: Radiographic Anatomy and Positioning - Positioning Landmarks assignment

Assessment Date: Winter 2023

Assessment Cycle: Every Three Years

Course section(s)/other population: All

Number students to be assessed: All

How the assessment will be scored: Departmentally-developed rubric

Standard of success to be used for this assessment: 100% of the students will score 80% or higher on the assignment.

Who will score and analyze the data: Radiography program faculty

2. Demonstrate the ability to obtain quality radiographic images and identify pertinent anatomy of the skull series.

**Assessment 1**

Assessment Tool: Outcome-related image evaluations

Assessment Date: Winter 2023

Assessment Cycle: Every Three Years

Course section(s)/other population: All

Number students to be assessed: All

How the assessment will be scored: Departmentally-developed rubric

Standard of success to be used for this assessment: 100% of students will score an overall average score of 90% or higher on the image evaluation.

Who will score and analyze the data: Radiography program faculty

3. Demonstrate the ability to obtain quality radiographic images and identify pertinent anatomy of the facial bones series.

**Assessment 1**

Assessment Tool: Outcome-related image evaluations

Assessment Date: Winter 2023

Assessment Cycle: Every Three Years

Course section(s)/other population: All

Number students to be assessed: All

How the assessment will be scored: Departmentally-developed rubric

Standard of success to be used for this assessment: 100% of students will score an overall average score of 90% or higher on the image evaluation.

Who will score and analyze the data: Radiography program faculty

4. Demonstrate the ability to obtain quality radiographic images and identify pertinent anatomy of the mandible and temporomandibular joints (TMJ).

**Assessment 1**

Assessment Tool: Outcome-related image evaluation

Assessment Date: Winter 2023

Assessment Cycle: Every Three Years

Course section(s)/other population: All

Number students to be assessed: All

How the assessment will be scored: Departmentally-developed rubric

Standard of success to be used for this assessment: 100% of students will score an overall average score of 90% or higher on the image evaluation.

Who will score and analyze the data: Radiography program faculty

### **Course Objectives**

1. Produce diagnostic radiographic images of the skull in the laboratory using the skull phantom, image receptors, and processing equipment.
2. Identify and use the appropriate exposure factors to produce diagnostic radiographic images of the skull.
3. Define specific terminology, reference points, positioning lines, and topographic landmarks as they relate to positioning for the basic skull series.
4. Produce quality radiographs of the following projections for a skull series:
  - a. PA Projection
  - b. PA Axial 15 (Caldwell method)
  - c. AP Axial (Towne method)
  - d. Lateral
  - e. Submentovertex (SMV)
5. Identify and label specific anatomical structures on radiographs of a skull series.
6. Identify facial and surface landmarks associated with radiographic positioning.
7. Produce diagnostic radiographic images of the facial bones in the laboratory using the skull phantom, image receptors, and processing equipment.
8. Identify and use the appropriate exposure factors to produce diagnostic radiographic images for the facial bones.
9. Define specific terminology, reference points, positioning lines, and topographic landmarks as they relate to positioning for the facial bones.
10. Produce quality radiographic images of the following projections for the series:
  - a. Parietoacanthial (Waters method)
  - b. Modified Parietoacanthial (Modified Waters method)
  - c. PACaldwell Method
  - d. Lateral
11. Identify and label specific anatomical structures on radiographs of the facial bones.
12. Produce diagnostic radiographic images of the mandible and TMJ in the laboratory using the skull phantom, image receptors, and processing equipment.
13. Identify and use the appropriate exposure factors to produce diagnostic radiographic images of the mandible and TMJs.
14. Define specific terminology, reference points, positioning lines, and topographic landmarks as they relate to positioning for the mandible and TMJ.
15. Produce quality radiographic images of the following projections for the mandible and TMJ:
 

**Mandible**

  - a. PA Projection
  - b. Axiolateral Projection
  - c. AP Axial Projection (Towne method)
  - d. Submentovertex (SMV) Projection

**Temporomandibular Joints**

  - a. Axiolateral Oblique (Law method)
  - b. Axiolateral Oblique (Schuller method)
  - c. AP Axial Projection (Towne method)
16. Identify and label specific anatomical structures on radiographs of the mandible and TMJ.

### **New Resources for Course**

**Course Textbooks/Resources**

## Textbooks

Kendrick, L., Lampignano, J.. *Bontrager's Textbook of Radiographic Positioning and Related Anatomy*, 10 ed. St. Louis: Elsevier, 2021

## Manuals

## Periodicals

## Software

**Equipment/Facilities**

Level III classroom

Testing Center

Other: OE 121 - Radiography Lab

<b><u>Reviewer</u></b>	<b><u>Action</u></b>	<b><u>Date</u></b>
<b>Faculty Preparer:</b> <i>William Nelson</i>	<i>Faculty Preparer</i>	<i>Apr 05, 2022</i>
<b>Department Chair/Area Director:</b> <i>Kristina Sprague</i>	<i>Recommend Approval</i>	<i>Apr 06, 2022</i>
<b>Dean:</b> <i>Shari Lambert</i>	<i>Recommend Approval</i>	<i>Apr 07, 2022</i>
<b>Curriculum Committee Chair:</b> <i>Randy Van Wagnen</i>	<i>Recommend Approval</i>	<i>Jun 16, 2022</i>
<b>Assessment Committee Chair:</b> <i>Shawn Deron</i>	<i>Recommend Approval</i>	<i>Jun 21, 2022</i>
<b>Vice President for Instruction:</b> <i>Victor Vega</i>	<i>Approve</i>	<i>Jul 08, 2022</i>

# Washtenaw Community College Comprehensive Report

## RAD 215 Radiography of the Skull Effective Term: Spring/Summer 2014

### Course Cover

**Division:** Math, Science and Health

**Department:** Allied Health

**Discipline:** Radiography

**Course Number:** 215

**Org Number:** 15600

**Full Course Title:** Radiography of the Skull

**Transcript Title:** Radiography of the Skull

**Is Consultation with other department(s) required:** No

**Publish in the Following:** College Catalog , Time Schedule , Web Page

**Reason for Submission:** Course Change

**Change Information:**

**Consultation with all departments affected by this course is required.**

**Rationale:** Conditionally approved course, seeking full approval. Course prerequisite changed from RAD 150 and RAD 217 to RAD 110 and RAD 120 due to sequence change.

**Proposed Start Semester:** Spring/Summer 2014

**Course Description:** In this course, students learn how to obtain quality radiographic images of the skull. Students will also be able to critically analyze the radiographic images of the skull and identify the pertinent anatomy. Laboratory sessions are included to provide the student with experience in skull positioning.

### Course Credit Hours

**Variable hours:** No

**Credits:** 2

**Lecture Hours: Instructor:** 15 **Student:** 15

**Lab: Instructor:** 30 **Student:** 30

**Clinical: Instructor:** 0 **Student:** 0

**Total Contact Hours: Instructor:** 45 **Student:** 45

**Repeatable for Credit:** NO

**Grading Methods:** Letter Grades

Audit

**Are lectures, labs, or clinicals offered as separate sections?:** NO (same sections)

### College-Level Reading and Writing

College-level Reading & Writing

### College-Level Math

#### Requisites

**Prerequisite**

RAD 110 minimum grade "C-"

and

**Prerequisite**

RAD 120 minimum grade "C-"; may enroll concurrently

### General Education

### Request Course Transfer

**Proposed For:**

## **Student Learning Outcomes**

1. Identify the pertinent anatomy and external landmarks on radiographic images of the skull.

### **Assessment 1**

**Assessment Tool:** Departmental final examination on Blackboard

**Assessment Date:** Winter

**Assessment Cycle:**

**Course section(s)/other population:** Three sections of this course is offered per year

**Number students to be assessed:** Number of students to be assessed is approximately 12 students per section

**How the assessment will be scored:**

**Standard of success to be used for this assessment:**

**Who will score and analyze the data:**

2. Demonstrate the ability to obtain quality radiographs of the skull.

### **Assessment 1**

**Assessment Tool:** Checklist from laboratory performance

**Assessment Date:** Winter

**Assessment Cycle:**

**Course section(s)/other population:** Three sections of this course is offered per year

**Number students to be assessed:** Number of students to be assessed is approximately 12 students per section

**How the assessment will be scored:**

**Standard of success to be used for this assessment:**

**Who will score and analyze the data:**

## **Course Objectives**

1. Identify anatomy and external landmarks of the cranium.

### **Matched Outcomes**

1. Identify the pertinent anatomy and external landmarks on radiographic images of the skull.

2. Analyze the quality of radiographs of the cranium.

### **Matched Outcomes**

2. Demonstrate the ability to obtain quality radiographs of the skull.

3. Produce quality radiographs of the cranium.

### **Matched Outcomes**

2. Demonstrate the ability to obtain quality radiographs of the skull.

## **New Resources for Course**

### **Course Textbooks/Resources**

Textbooks

Manuals

Periodicals

Software

### **Equipment/Facilities**

### **Reviewer**

**Faculty Preparer:**

*Connie Foster*

**Department Chair/Area Director:**

*Connie Foster*

### **Action**

*Faculty Preparer*

*Recommend Approval*

### **Date**

*Nov 11, 2013*

*Nov 11, 2013*

**Dean:**

*Martha Showalter*

*Recommend Approval*

*Nov 12, 2013*

**Vice President for Instruction:**

*Bill Abernethy*

*Approve*

*Dec 05, 2013*