

MEDICAL DOSIMETRY  
**STUDENT HANDBOOK**  
**2023-24**

College of Science and Health  
Department of Health Professions

## Table of Contents

Section A INFORMATION REGARDING MEDICAL DOSIMETRY .....	4
A-1: DESCRIPTION OF THE PROFESSION .....	4
A-2: ESSENTIAL FUNCTIONS OF A MEDICAL DOSIMETRIST .....	5
A-3: CODE OF ETHICS FOR MEDICAL DOSIMETRISTS .....	5
A-4: TECHNICAL STANDARDS FOR MEDICAL DOSIMETRISTS .....	6
A-5: DEVELOPING PROFESSIONAL BEHAVIORS.....	6
A-6: EDUCATION IN THE FIELD OF MEDICAL DOSIMETRY .....	6
A-7: ACCREDITATION .....	7
A-8: CERTIFICATION .....	7
A-9: JOB MARKET .....	7
Section B PROGRAM INFORMATION.....	8
B-1: MISSION AND GOALS .....	8
B-2: EXPENSES AND FINANCIAL AID .....	10
B-3: TEXTBOOK AND SUPPLIES.....	10
B-4: MEDICAL DOSIMETRY CURRICULUM.....	10
B-5: CLINICAL INTERNSHIP COMPLIANCE .....	10
B-6: CURRENT STUDENTS WEBSITE .....	10
B-7: CLINICAL PRECEPTORS WEBSITE.....	10
B-8: PROGRAM OFFICIALS AND THEIR ROLES.....	11
Section C PROGRAM POLICIES .....	13
C-1: ACADEMIC AND GRADUATION POLICIES .....	13
C-2: RETENTION AND PROBATION .....	14
C-3: DISMISSAL.....	16
C-4: STUDENT APPEAL PROCESSES .....	17
C-5: FAIRNESS POLICIES.....	21
C-6: GRADING POLICY .....	21
C-7: OFF CAMPUS COURSE ATTENDANCE POLICY .....	22
C-8: ACADEMIC HONESTY POLICY .....	22
C-9: ASSIGNMENT POLICY.....	22
C-10: RECORDS AND RELEASE OF INFORMATION .....	22
C-11: PERSONAL STUDENT USE OF SOCIAL NETWORKING SITES .....	23
C-12: HEALTH AND SAFETY POLICIES .....	24
C-13: STUDENT PREGNANCY POLICY .....	26
C-14: RADIATION SAFETY POLICIES .....	27
C-15: MRI SAFETY POLICY .....	28

Section D CLINICAL INTERNSHIP ..... 29

    D-1: INTRODUCTION TO CLINICAL INTERNSHIP ..... 29

    D-2: ATTENDANCE POLICIES..... 29

    D-3: INCLEMENT WEATHER POLICY ..... 32

    D-4: EMPLOYMENT OF MEDICAL DOSIMETRY STUDENTS ..... 32

    D-5: RESPONSIBILITIES OF A STUDENT MEDICAL DOSIMETRIST ..... 32

    D-6: CLINICAL ASSIGNMENTS..... 34

    D-7: COMPETENCIES ..... 34

    D-8: OBSERVATIONS AND CRITICAL PROCEDURES ..... 34

    D-9: STUDENT SUPERVISION POLICY ..... 35

    D-10: DRESS AND APPEARANCE STANDARDS ..... 35

Section E INFORMATION ABOUT EVALUATION AND ASSESSMENT ..... 36

Section F APPENDICES ..... 37

    F-1: APPENDIX A ..... 37

    F-2: APPENDIX B ..... 38

    F-3: APPENDIX C ..... 46

    F-4: APPENDIX D ..... 47

## SECTION A

# INFORMATION REGARDING MEDICAL DOSIMETRY

### A-1: DESCRIPTION OF THE PROFESSION

According to the American Association of Medical Dosimetrists (AAMD):

The Medical Dosimetrist is a member of the radiation oncology team who has knowledge of the overall characteristics and clinical relevance of radiation oncology treatment machines and equipment, is cognizant of procedures commonly used in brachytherapy and has the education and expertise necessary to generate radiation dose distributions and dose calculations in collaboration with the medical physicist and radiation oncologist.

#### The Profession

After the Radiation Oncologist has consulted with the patient on their plan of treatment, he/she will write a prescription of radiation dose to a defined tumor volume. The medical dosimetrist will then design a treatment plan by means of computer and/or manual computation to determine a treatment field technique that will deliver that prescribed radiation dose. When designing that plan, also taken into consideration are the dose-limiting structures. These structures could include the eye when treating the brain, the heart when treating the lung, or the spinal cord when it is included in the area of treatment.

The medical dosimetrist maintains a delicate balance between delivering the prescription the physician has written while ensuring the patient will not lose important healthy organ function. In many institutions, the medical dosimetrist also has the ability to execute planning for intracavitary and interstitial brachytherapy procedures.

Following the initial consultation, the patient will have a simulation for tumor localization to ensure reproducibility of treatment set up and plan delivery. Here, it may be necessary to produce molds, casts, and other immobilization devices for accurate treatment delivery. A medical dosimetrist may supervise, perform, or assist in this process. Using imaging modalities such as CT scans, alone or in combination with MRI or PET scans, medical

dosimetrists plan with 3-D computers to achieve higher doses of radiation to a tumor while lowering the doses to the sensitive structures around it. The medical dosimetrist may work with the radiation therapists in the implementation of the patient treatment plans including: the correct application of immobilization devices, beam modification devices, approved field arrangements, and other treatment variables. The advancements in computer technology place dosimetrists at the forefront of many new processes. In some environments medical dosimetrists play a part in cutting edge clinical research for the development and implementation of new techniques in cancer treatment. It is an exciting and amazing profession to work in. Medical Dosimetrists are members of a team that contributes toward cancer survivorship on a daily basis.

In summation, the medical dosimetrist performs calculations for the accurate delivery of the Radiation Oncologist's prescribed dose, documents pertinent information in the patient record, and verifies the mathematical accuracy of all calculations. Medical Dosimetrists perform, or assist in, the application of specific methods of radiation measurement including ion chamber, thermoluminescent dosimeters (TLDs), or film measurement as directed by the Medical Physicist. Another area of contribution is giving technical and physics support to the Medical Physicist (e.g., radiation protection, qualitative machine calibrations, and QA of the radiation oncology equipment). Also, medical dosimetrists may participate in educating radiation oncology residents, radiation therapy students or medical dosimetry students.

## A-2: ESSENTIAL FUNCTIONS OF A MEDICAL DOSIMETRIST

“The Medical Dosimetrist is a member of the radiation oncology team who has knowledge of overall characteristics and clinical relevance of radiation oncology treatment and planning equipment, is cognizant of procedures commonly used in brachytherapy and has the education and expertise necessary to generate radiation dose distributions and dose calculations.” (From the AAMD Guidelines for a Recognized Educational Program in Medical Dosimetry).

Persons contemplating education preparation to enter this profession should be aware of the essential functions of the medical dosimetrist in order to guide their career decision making and estimate their success in the field.

The *Scope of Practice of a Medical Dosimetrist* is designed to assist the Qualified Medical Dosimetrist (QMD) in defining their role in the technical services they provide in patient care. In addition, the *Practice Standards for the Medical Dosimetrist* is designed to assist the QMD in defining their roles in the technical services they provide in radiation oncology.

The *Scope of Practice for Medical Dosimetrists & Practice Standards for the Medical Dosimetrist* documents can be found on the AAMD website at [medicaldosimetry.org/about/scope-of-practice](http://medicaldosimetry.org/about/scope-of-practice).

Each medical dosimetrist must exercise professional and prudent judgement in determining whether the performance of a given act is within the scope of practice for which the medical dosimetrist is clinically competent to perform.

## A-3: CODE OF ETHICS FOR MEDICAL DOSIMETRISTS

The purpose of the American Association of Medical Dosimetrists (AAMD) Code of Ethics is to establish an ideal of professional conduct to which members of the Medical Dosimetry profession should aspire. The Code of Ethics expresses the moral values of the AAMD. While, by itself, the AAMD cannot create or reform moral character, it may at least inform a conscience. Such a code also signals the organization’s moral commitment to those who depend upon its members for services. In any

profession, the test of moral seriousness depends upon personal compliance with ethical standards.

As Medical Dosimetrists, our primary objective is to use our training, experience, skills, and talents for the benefit of society. To this end, we recognize our professional relationships with and obligations to the:

1. Patient.  
Although never directly responsible for prescribing medical procedures, the health and welfare (even life) of many patients may directly depend upon the skill and dedication with which Medical Dosimetrists carry out their work.
2. Employer or Client.  
As professionals, Medical Dosimetrists have the obligation to act as faithful agents for their employers or clients and to devote their skills and talents to further the legitimate aims of their employers. In turn, they have the right to expect due professional consideration from their employers or clients.
3. Fellow Medical Dosimetrists.  
Medical Dosimetrists should contribute to the advancement of their profession and should avoid all practices which detract from the stature of Medical Dosimetry.

In furtherance of the principles stated in this preamble, the AAMD has adopted this Code of Ethics.

[medicaldosimetry.org/about/aamd-mission-statement](http://medicaldosimetry.org/about/aamd-mission-statement)

## Principles of Ethics

The following principles represent goals to which all Medical Dosimetrists should aspire:

1. Medical Dosimetrists are obliged to uphold the honor and dignity of their profession by exhibiting sound moral character and the highest degree of competence in their work.
2. Medical Dosimetrists must be honest and forthright at all times in their dealings with employers, clients, and patients. Remuneration expected should be consistent with the type and quality of service provided.
3. Patient privacy must be respected and confidentiality of patient information must be maintained.
4. Medical Dosimetrists should strive continually to improve their knowledge and skills and participate in programs that lead to the improvement of the Medical

Dosimetry profession and the health of the community.

5. Collegiality, openness, and mutual respect shall characterize the relationships among Medical Dosimetrists.
6. Medical Dosimetrists should conduct their affairs in a manner consistent with standards of excellence.

## **A-4: TECHNICAL STANDARDS FOR MEDICAL DOSIMETRISTS**

- Demonstrate oral and written proficiency in the English language, including the ability to read, interpret and apply written instructions (treatment charts, notes, records, technical publications, equipment manuals, etc.).
- Communicate effectively with faculty, fellow students, physicians, and all members of the health care team.
- Maintain intellectual and emotional stability and maturity under stress while also maintaining appropriate performance standards.
- Lift 30 pounds of weight (treatment cones, blocks for treatment, ancillary aids), including the ability to lift such heavy items overhead up to 6 feet.
- Push a standard wheelchair from the waiting room to the treatment room and move immobile patients from a stretcher to a treatment or diagnostic table.
- Possess sufficient audio acuity to perceive and interpret audio signals from equipment during treatment or treatment planning.
- Possess sufficient visual acuity--corrected to 20/20--to observe patients and equipment operation during treatment or treatment planning; have adequate perception of depth and color; and be able to view computer monitors for extended periods.
- Grasp complex three-dimensional spatial relationships.
- Have sufficient manual dexterity to carry out all aspects of medical dosimetry procedures.

## **A-5: DEVELOPING PROFESSIONAL BEHAVIORS**

The mission of the Medical Dosimetry Program at University of Wisconsin-La Crosse is a commitment to the education of medical dosimetrists who are knowledgeable, competent, and dedicated to their profession and their patients.

To effectively meet the mission and goals of the program, students must be taught in all three learning domains: cognitive, psychomotor, and affective. Professional development of students fits within the affective domain and is required in order for students to be successful in their educational program and for graduates to be effective practitioners. This development must be progressive throughout the medical dosimetry curriculum. In order to facilitate such development, it is necessary to define what the word "professional" means in regard to Medical Dosimetrists and what professional behavior consists of.

Appendix A demonstrates the *Characteristics and Abilities Essential to the Development of the Professional Medical Dosimetrist*, compiled based on the original work of the UWL Radiation Therapy program to guide its approach to professional development of its students.

## **A-6: EDUCATION IN THE FIELD OF MEDICAL DOSIMETRY**

The University of Wisconsin-La Crosse (UWL) medical dosimetry program is a degree program that provides students with an educational foundation in medical dosimetry as well as clinical experience in a radiation oncology department. The curriculum requires distance online courses taken synchronously with a clinical internship at an affiliated site. Admission to the program is on a competitive basis. Students who successfully complete program requirements graduate with a Master of Science Degree in Medical Dosimetry. Education continues after graduation by individual research, reading and recognized continuing education opportunities offered by employers and professional societies, and is required for maintaining professional credentials.

## A-7: ACCREDITATION

The University is accredited by North Central Association. The program is accredited by the Joint Review Committee on Education in Radiologic Technology (JRCERT). The UWL medical dosimetry program was the fourth program in the nation to receive accreditation. Contact information for the JRCERT is listed below.

JRCERT  
20 N. Wacker Drive, Suite 2850  
Chicago, IL 60606-3182  
(312) 704-5300  
[www.jrcert.org](http://www.jrcert.org)

## A-8: CERTIFICATION

A national certification exam is offered by the Medical Dosimetrist Certification Board. Students may apply to take the board exam after meeting all requirements for graduation. The graduate will individually apply to take the exam. Beginning in 2006, there is a three-attempt rule for passing the examination. A failure on the third attempt requires the applicant to wait for two years and meet current eligibility requirements before applying for the exam again. Applicants and students are advised of the "Ethical Standards" established by the MDCB. These are the standards of minimally acceptable professional conduct for all Certified Medical Dosimetrists. They are intended to promote the provision of safe, competent medical care for all patients requiring medical dosimetry services. Violation of the Ethical Standards carries sanctions, including, among others, not permitting the violator to take the exam or forfeiting certification. All violations must be investigated by the MDCB in order to determine eligibility on a case-by-case basis.

See also [mdcb.org](http://mdcb.org).

## A-9: JOB MARKET

Medical Dosimetrists may work in hospital departments or free-standing facilities. Options for diversification present in performing special procedures, assisting in medical physics tasks, or management, and education positions. Medical Dosimetrists may also work in sales and technical support. The number of job openings varies with time and location. The graduate can enhance his/her success in securing a position by being open to relocation.



## SECTION B

### PROGRAM INFORMATION

#### B-1: MISSION AND GOALS

##### U.W. System Mission:

The University of Wisconsin-La Crosse shares in the mission of the University of Wisconsin System which is to develop human resources; to discover and disseminate knowledge; to extend knowledge and its application beyond the boundaries of its campuses; and to serve and stimulate society by developing in students heightened intellectual, cultural, and human sensitivities as well as scientific, professional, and technological expertise and a sense of purpose. Inherent in this broad mission are methods of instruction, research, extended education and public service designed to educate people and improve the human condition. Basic to every purpose of the system is the search for truth.

##### The Core Mission:

Within the approved differentiation stated in their select missions, each university in the cluster shall:

- a. Offer associate and baccalaureate degree level and selected graduate programs within the context of its approved mission statement.
- b. Offer an environment that emphasizes teaching excellence and meets the educational and personal needs of students through effective teaching, academic advising, counseling, and through university-sponsored cultural, recreational, and extracurricular programs.
- c. Offer a core of liberal studies that supports university degrees in the arts, letters, and sciences, as well as specialized professional/technical degrees at the associate and baccalaureate level.
- d. Offer a program of pre-professional curricular offerings consistent with the university's mission.
- e. Expect scholarly activity, including research, scholarship and creative endeavor, that supports its programs at the associate and baccalaureate degree level, its selected graduate programs, and its approved mission statement.
- f. Promote the integration of the extension function, assist the University of Wisconsin – Extension in meeting its responsibility for statewide coordination, and encourage faculty and staff participation in outreach activity.
- g. Participate in inter-institutional relationships in order to maximize educational opportunity for the people of the state effectively and efficiently through the sharing of resources.
- h. Serve the needs of women, minority, disadvantaged, disabled, and non-traditional students and seek racial and ethnic diversification of the student body and the professional faculty and staff.
- i. Support activities designed to promote the economic development of the state.



## UW-La Crosse Select Mission:

The primary purpose of the University of Wisconsin-La Crosse is to provide education leading to baccalaureate and selected graduate degrees supplemented by appropriate research and public service activities as further detailed in the following set of goals:

- a. The university shall emphasize excellence in educational programs and teaching.
- b. The university shall provide a broad base of liberal education as a foundation for the intellectual, cultural, and professional development of the students.
- c. The university shall offer undergraduate programs and degrees in the arts, letters and sciences; health and human services; education; health, physical education, and recreation; and business administration.
- d. The university shall offer graduate programs and degrees related to areas of emphasis and strength within the institution.
- e. The university expects scholarly activity, including research, scholarship and creative endeavor, that supports its programs at the baccalaureate degree level, its selected graduate programs, and its special mission.
- f. The university shall support studies related to the environment, culture, heritage, institutions, and economy of La Crosse and the surrounding Upper Mississippi Valley Region.
- g. The university shall serve as an academic and cultural center, providing service and professional expertise, and meeting the broader educational needs of the region.

## Medical Dosimetry Program Mission and Goals:

### Mission:

The Medical Dosimetry Program at the University of Wisconsin-La Crosse is committed to the education of medical dosimetrists who are knowledgeable, competent, and dedicated to their profession and their patients.

### Goals:

1. Students will demonstrate competence in medical dosimetry.
2. Students will use critical thinking and problem-solving skills necessary to practice in current and emerging technology.
3. Students will demonstrate effective communication skills.
4. Students will develop and exhibit professional practices.
5. Students will demonstrate research skills needed to approach medical dosimetry with scholarly rigor.
6. The program will successfully meet the needs of its students and communities of interest.

Refer to the program website ([uwlax.edu/grad/medical-dosimetry/#tab-mission-goals-and-outcomes](http://uwlax.edu/grad/medical-dosimetry/#tab-mission-goals-and-outcomes)) for the current student learning outcomes aligned with the program mission and goals.

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## **B-2: EXPENSES AND FINANCIAL AID**

Tuition and fees are established by the University for each academic year and are published on the Cashiers Office website for each semester

(<https://www.uwlax.edu/cashiers/tuition-and-billing/tuition-and-fee-information/>) via the students/parents section. Questions about tuition and fees may be directed to the Cashier's Office.

Financial Aid information is posted on our program website (<https://www.uwlax.edu/grad/medical-dosimetry/financial-aid/>).

The tuition and fees are also posted on the medical dosimetry program website (<https://www.uwlax.edu/grad/medical-dosimetry/tuition-and-fees/>).

## **B-3: TEXTBOOK AND SUPPLIES**

Textbook costs will fluctuate based on the required textbooks each year, whether you already own some of these textbooks, and/or whether you purchase new or used textbooks. Students are advised to purchase textbooks online.

Information about textbook and supplies information is posted on the medical dosimetry program website (<https://www.uwlax.edu/grad/medical-dosimetry/tuition-and-fees/>).

## **B-4: MEDICAL DOSIMETRY CURRICULUM**

The 46 credit Master of Science Degree curriculum is scheduled over 4 semesters for full-time and 7 semesters for part-time students.

To view the curriculum schedule and/or course descriptions, visit <https://www.uwlax.edu/grad/medical-dosimetry/curriculum/>

## **B-5: CLINICAL INTERNSHIP COMPLIANCE**

Students must adhere to policies and requirements of the assigned clinical internship site. This may include policies specific to immunizations, drug screening, background checks, fingerprint screening, on-site search/inspection, COVID testing and quarantine, etc.

## **B-6: CURRENT STUDENTS WEBSITE**

The program has developed a web-based student resource site for the students. This website provides a single place to find those important resources needed while enrolled in the program.

Here you will find information such as class schedules, clinical paperwork, writing resources, e-portfolio information, days off, and much more. Please visit this site routinely and bookmark this site in your favorite search engines.

[uwlax.edu/Medical-Dosimetry-MS/Current-students](https://www.uwlax.edu/Medical-Dosimetry-MS/Current-students)

## **B-7: CLINICAL PRECEPTORS WEBSITE**

The program has developed a web-based clinical preceptor resource site for the clinical preceptors of our program. This website provides a single place to find the policies and procedures of the program and any additional resources they may need.

The site includes administrative documents, clinical paperwork, curriculum information, outcomes assessment plan, and various other important information.

[uwlax.edu/Medical-Dosimetry-MS/Clinical-preceptors](https://www.uwlax.edu/Medical-Dosimetry-MS/Clinical-preceptors)

## B-8: PROGRAM OFFICIALS AND THEIR ROLES



Program Director: Nishele Lenards, PhD, CMD, R.T. (R)(T), FAAMD	
Campus Office: UW-La Crosse Medical Dosimetry Program 1725 State Street – 4054 HSC La Crosse, WI 54601	Home Office: Minneapolis, MN
Phone: 608-785-5460 Fax: 608-785-8460	
Email: <a href="mailto:nlenards@uwlax.edu">nlenards@uwlax.edu</a>	
Program website: <a href="http://www.uwlax.edu/medical-dosimetry-ms">www.uwlax.edu/medical-dosimetry-ms</a>	

Clinical Coordinator: Anne Marie Vann, MEd, CMD, R.T. (R)(T), FAAMD	
Campus Office: UW-La Crosse Medical Dosimetry Program 1725 State Street – 4054 HSC La Crosse, WI 54601	Home Office: Augusta, GA
Phone: 608-785-8470 Fax: 608-785-8460	
Email: <a href="mailto:avann@uwlax.edu">avann@uwlax.edu</a>	
Program website: <a href="http://www.uwlax.edu/medical-dosimetry-ms">www.uwlax.edu/medical-dosimetry-ms</a>	

Responsibilities are as follows:

1. Organization, administration, review and development of program.
2. Assurance of program effectiveness through outcome assessment plan.
3. Participation in budget planning.
4. Evaluation and assurance of effectiveness of students' didactic and clinical education.
5. Course development, review, and scheduling.
6. Coordination of student application and selection process.
7. Student counseling and advisement.
8. Representation of student and program needs to department, college, university and community.
9. Instruction and evaluation of students in clinical internship as appropriate.
10. Chair of Advisory Committee: duties include scheduling, notification of meeting, preparation of agenda and management of meeting.
11. Maintaining knowledge of Medical Dosimetry and educational methodologies through continuing professional development and pursuit of scholarly activities.

Responsibilities are as follows:

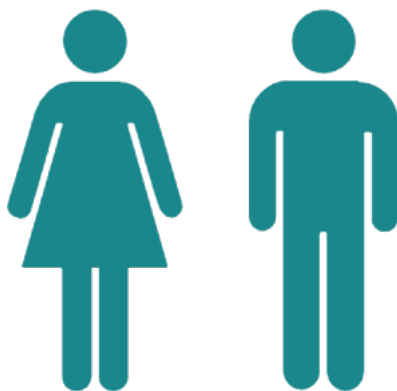
1. Correlation of clinical education with didactic education.
2. Coordination of clinical education.
3. Participation in selection of students and assignment to clinical internship sites.
4. Course development and review.
5. Student counseling and advisement.
6. Maintenance & knowledge of program policies and procedures.
7. Member of the Advisory Committee and Governing Board for the major.
8. Maintaining knowledge of medical dosimetry and educational methodologies through continuing professional development and pursuit of scholarly activities.
9. Assurance of program effectiveness through outcomes assessment plan.
10. Evaluation and assurance of effectiveness of students' didactic and clinical education.
11. Evaluation and assurance of effectiveness of students' clinical education through on-site visits and communications with preceptors.

The role of the advisory committee is to:

1. Develop, revise and approve Mission and Goals of program
2. Review, revise and approve program printed materials
3. Discuss, adjust and approve program curriculum, policy and procedures
4. Provide guidance to program officials as requested
5. Assists in the process of student discipline and grievance when concerns are brought to it
6. Plan for and assist in preparation of documents for accreditation purposes
7. Review selection and admission practices
8. Participate in program outcome assessment
9. Promote the medical dosimetry program within the college, university and community
10. Advocate for program officials and students as necessary

The advisory committee members can be found on the program website:

[uwlax.edu/grad/medical-dosimetry/graduate-faculty](http://uwlax.edu/grad/medical-dosimetry/graduate-faculty)



Responsibilities of Clinical Preceptors:

1. Manage the educational program at the assigned clinical internship site.
2. Provide clinical instruction in medical dosimetry courses.
3. Evaluate students' competence and progress on an ongoing basis, providing feedback on a periodic basis.
4. Counsel and coach students as required.
5. Coordinate clinical and instruction.
6. Assure direct supervision of the student by a qualified practitioner (e.g., certified medical dosimetrist, credentialed medical physicist, licensed radiation oncologist) during all direct patient care procedures.
7. Assure that all clinical procedures/tasks (e.g. dose calculations, treatment plans, etc.) performed by the students are approved by a qualified practitioner prior to implementation.
8. Maintain student records.
9. Report to the Clinical Coordinator regularly, as needed.
10. Maintain knowledge of program policies and procedures.
11. A Clinical Preceptor is eligible to serve as a member of the Advisory Committee if requested.
12. Maintain knowledge of the profession of Medical Dosimetry and educational and evaluative methodologies through continuing professional development and pursuit of scholarly activities.

Current clinical internship sites can be found on the program website: [uwlax.edu/grad/medical-dosimetry/clinical-internship/](http://uwlax.edu/grad/medical-dosimetry/clinical-internship/)

University of Wisconsin-La Crosse  
4054 Health Science Center  
1725 State Street  
La Crosse, WI 54601

Telephone: 608-785-8470  
Fax: 608-785-8460

## SECTION C PROGRAM POLICIES

### C-1: ACADEMIC AND GRADUATION POLICIES

The medical dosimetry program follows all academic and graduation policies of the UWL graduate school. As noted in the graduate school catalog, programs may have more prescriptive policies including requirements for appropriate professional or clinical conduct, for sufficiency in professional skills, or other requirements that must be clearly documented in their program guidelines and provided to students upon admission. Therefore, all medical dosimetry students must follow the graduate school policies while also adhering to program specific requirements. Section C of the handbook outlines program specific policies.

Graduate School Catalog: [catalog.uwlax.edu/graduate](http://catalog.uwlax.edu/graduate)

1. **Grades:**  
Grades are assigned according to the program's grading system on a 4-point scale (see section C-6). Refer to the Graduate School Catalog for policies on incomplete or withdrawal grades.
2. **Graduation Requirements:**  
Candidates for the Master of Science degree in Medical Dosimetry must accomplish the following prior to graduation:
  - a. Complete all program courses and deficiencies.
  - b. Be a student in good standing ("not in good standing" or "probation" status must be cleared)
  - c. Complete the courses prescribed by the Graduate Curriculum Committee for the degree in medical dosimetry with at least a 3.0 cumulative grade point average. Grades below "C" in individual required courses require clearance of deficiency as judged by the Program Officials.
  - d. Meet the requirements for clinical competency as described in the clinical internship course syllabi.
  - e. Satisfy the graduate research project.
  - f. File a completed "Intent to Graduate" form online via the WINGS student center immediately after you have registered for your final semester.
  - g. Pay the graduation fee.
3. **Student Withdrawal and Reentry:**
  - a. Withdrawal from a course is usually not possible without affecting status in the program or major. The curriculum is rigorous and strictly sequenced. If a student would withdraw from a course, he/she would be unable to proceed into the next semester and would have to appeal to the Student Progress Committee to be allowed to retake the course at a later time as members of future classes would be affected.
  - b. Withdrawal from the program or major should be considered carefully prior to any action being taken. The student is strongly urged to talk with a campus advisor as well as the Program Director. Program personnel will make every attempt to deal with the student's concerns and facilitate continuance. If the student determines that withdrawal is the best course of action after these discussions, he/she is asked to submit a statement in writing of that decision to the Program Director.
  - c. Reentry and Readmission: Students who feel they must withdraw from the medical dosimetry program or major once accepted, are encouraged to speak to medical dosimetry program officials prior to withdrawal. Students are not guaranteed placement should they wish to reenter. They must reapply to the major and be considered for placement by the Program Selection Committee.
4. A **leave of absence** approval is required of any student who will miss more than two consecutive weeks while enrolled in the professional program. A student must submit a request in writing for such a leave and speak with the Program Officials. Together, the student and the Program Director will develop a plan for a return after leave of absence. If the leave is during the clinical internship, the Clinical Preceptor will also be involved in developing the plan. Approval of the plan must be granted by the Program Officials.

## C-2: RETENTION AND PROBATION

In order to remain as a student in good standing in the Medical Dosimetry program students must meet program requirements as per the following:

1. Grades of "C" or better must be earned in all required courses. The overall GPA must remain at or above 3.0 for graduate students.
2. Students must comply with program and University policies.
3. Students must make satisfactory progress in development of clinical skills and professional behavior.



### Academic Deficiencies

1. A student who does not meet program requirements for graduation will be notified by the Program Director of the concern at the earliest possible time.
2. Following such notification, the Medical Dosimetry program officials will meet within 10 working days to discuss the deficiency and make a determination of the action to be taken. It is preferred that the meeting be held with the student being given the opportunity to represent him/herself or to submit a written statement for review.
3. A decision as to the student's status in the program will be communicated in writing to the student within 5 working days of the meeting. The decision may involve remedial work, probation or suspension from the program.
4. If the decision involves remediation or probation, an explanation of the "plan to regain good standing" in the program (including time frames) will be included in the letter to the student.
5. If the student successfully follows the plan and meets program requirements within the timeframe specified, he/she will regain good standing in the program.
6. If the student is not successful in following the plan and meeting program requirements within the specified timeframe, the Medical Dosimetry Advisory Committee will meet to determine the appropriate action. This meeting will be held within 10 working days of the deadline specified in the "plan for regaining good standing". The meeting will be held as described above. The Committee may recommend dismissal from the program.
7. A student may be classified as on probation or dismissed in regard to the program, even if not on probation, suspended, or expelled from the University.

**Academic Misconduct***Failure to comply with program and University policies*

1. Academic misconduct, and procedures to deal with it, has been defined by the Board of Regents of the University of Wisconsin System in UWS 14.03. The entire document can be found at: [uwlax.edu/student-life/student-resources/student-handbook](http://uwlax.edu/student-life/student-resources/student-handbook). Portions of that policy are included below.
2. Academic misconduct is an act in which a student:
  - a. Seeks to claim credit for the work or efforts of another without authorization or citation;
  - b. Uses unauthorized materials or fabricated data in any academic exercise;
  - c. Forges or falsifies academic documents or records;
  - d. Intentionally impedes or damages the academic work of others;
  - e. Engages in conduct aimed at making false representation of a student's academic performance; or
  - f. Assists other students in any of these acts.
3. The following are the disciplinary sanctions that may be imposed for academic misconduct in accordance with the procedures of ss. UWS 14.05, 14.06 or 14.07: (One or more of the disciplinary sanctions may be imposed for an incident of academic misconduct.)
  - a. An oral reprimand;
  - b. A written reprimand presented only to the student;
  - c. An assignment to repeat the work, to be graded on its merits;
  - d. A lower or failing grade on the particular assignment or test;
  - e. A lower grade in the course;
  - f. A failing grade in the course;
  - g. Removal of the student from the course in progress;
  - h. A written reprimand to be included in the student's disciplinary file;
  - i. Disciplinary probation; or
  - j. Suspension or expulsion from the university

Procedures are detailed in the document referenced above.

**Non-Academic Misconduct***Failure to comply with program and University policies*

1. Non-Academic misconduct, and procedures to deal with it, has been defined by the Board of Regents of the University of Wisconsin System in UWS 17.03. The entire document can be found at: [uwlax.edu/student-life/student-resources/student-handbook/](http://uwlax.edu/student-life/student-resources/student-handbook/). Portions of that policy are included below.
2. The university may discipline a student in nonacademic matters in the following situations:
  - a. For conduct which constitutes a serious danger to the personal safety of a member of the university (*or clinical internship site*) community or guest.
  - b. For stalking or harassment.
  - c. For conduct that seriously damages or destroys university property or attempts to damage or destroy university (*or clinical internship site*) property, or the property of a member of such.
  - d. For unauthorized possession of university (*or clinical internship site*) property or property of another member of such.
  - e. For acts which violate the provisions of Ch. UWS 18, Conduct on University Lands.
  - f. For knowingly making a false statement to any university (*or clinical internship site*) employee or agent on a university-related matter, or for refusing to identify oneself to such employee or agent.
  - g. For violating a standard of conduct, or other requirement or restriction imposed in connection with disciplinary action.
3. The following are the disciplinary sanctions that may be imposed for nonacademic misconduct, in accordance with the procedures of ss. UWS 17.05 through 17.07:
  - a. A reprimand;
  - b. Denial of specified university privileges;
  - c. Imposition of reasonable terms and conditions on continued student status;
  - d. Restitution;
  - e. Removal of the student from the course in progress;
  - f. Disciplinary probation;
  - g. Suspension; or
  - h. Expulsion.

Process to be followed is covered in the document referenced above.

**Failure to comply with program policies or to make satisfactory progress in clinical skill and professional development**

1. A student who does not comply with program policies or is deficient in development of clinical skills or professional behavior will be notified of the concern by the Clinical Coordinator at the earliest possible time after the non-compliance or deficiency is recognized and reported.
2. Following such notification, the Medical Dosimetry Advisory Committee will meet within 10 working days to discuss the issue and make a determination of the action to be taken. It is preferred that the meeting be held in person with the student being given the opportunity to represent him/herself or to submit a written statement for the Committee’s review. Under certain circumstances a telephone or video conference call may be held instead of a face-to-face meeting.
3. A decision as to the student’s status in the program will be communicated in writing to the student within 5 working days of the Medical Dosimetry Advisory Committee meeting. The decision may involve remedial work, probation or suspension from the program.
4. If the decision involves remediation or probation, an explanation of the “plan to regain good standing” in the program (including time frames) will be included in the letter to the student.
5. If the student successfully follows the plan and meets program requirements within the timeframe specified, he/she will regain good standing in the program.
6. If the student is not successful in following the plan and meeting program requirements within the specified timeframe, the Medical Dosimetry Advisory Committee will meet to determine the appropriate action. This meeting will be held within 10 working days of the end of the deadline specified in the “plan for regaining good standing”. The meeting will be held as described in number 2 above. The Committee may dismiss the student from the program.
7. A student may be classified as on probation or dismissed in regard to the program, even if not on probation, suspended, or expelled from the University.

- Students will be automatically dismissed from the program if:
  - they obtain a grade of less than “C” (i.e. D or F) in any course in the curriculum;
  - the student’s cumulative GPA is not raised to 3.0 after one semester on probation;
  - Clinical deficiencies exist; or
  - Academic misconduct is identified.
- These actions may be appealed. See the “Student Appeal Process” in this manual for more information on the Appeals process.

Once a student has been dismissed from the Medical Dosimetry Program, the student is no longer permitted to attend any courses within the program and is automatically dismissed from graduate studies. The Program Director and the Graduate Studies office will notify the student about the dismissal status with a written letter citing the reasons and academic policies not met. *Academic dismissal for any reason may be appealed.*

**Program Dismissal: Non-academic**

A student may be dismissed from the Medical Dosimetry Program for the following non-academic violations:

- Failure to attend three class sessions in a semester (in a single course) without prior discussion with the course instructor or advisor.
- Failure or refusal to participate in classroom activities (verbal and non-verbal participation), evaluations (including practical and competency), classroom experiences, or internship placements.
- Failure to demonstrate safety protocols during competency and internship coursework, or internship experiences. This includes preventable injury to classmates or patients.
- Failure to follow policies and procedures, protect confidentiality and patient’s rights in patient experiences or on internship experiences. This includes failure to follow policies in this manual.
- Violation of these behaviors will be brought to the student’s attention and an individualized plan of correction developed with the advisor. Student failure to adhere to the plan of correction in the established time frames will result in automatic dismissal from the program.

*[These actions of the program may be appealed. See the “Student Appeal Process” in this manual for more information on the Appeals process].*

**C-3: DISMISSAL**

**Program Dismissal: Academic**



## C-4: STUDENT APPEAL PROCESSES

### Grade Appeal Process

The process for appealing a grade in the Medical Dosimetry program is consistent with the Bylaws and process maintained by the Health Professions Department.

1. If a student questions or disputes a final grade he/she must begin with an informal discussion with the **course instructor**. This initial discussion must take place within 4 weeks of the posting of the grade. If the student does not accept the decision, he/she may begin a formal grade appeal process with the following steps and time frames.
2. The request to appeal the grade must be put **in writing** and addressed to the individual **course instructor** within 6 weeks of posting of the grade.
  - a. The appeal must contain the reason for the grade appeal and supporting materials.
  - b. Acceptable reasons for appeal are limited to the following:
    - The instructor used different grading standards for this student's work than for other students in the class.
    - Grading of the student was biased, arbitrary, or capricious.
  - c. The instructor will contact the student within 5 working days of receipt of the appeal and **schedule a formal meeting** with the student. This meeting will be attended by the **course instructor, another faculty member or Program Director**, the student, and anyone else the student wishes to bring (if desired). If the course instructor is the Program Director, another faculty member or department chair will be asked to attend the meeting. The meeting will be recorded by notes and audiotape.
  - d. The possible outcomes of this appeal hearing are:
    - Instructor accepts student's appeal and changes the grade
    - Student acknowledges instructor's rationale for grade and accepts the grade
    - Instructor does not change the grade; student does not accept the decision and decides to appeal to the next level.
3. The next level of appeal is to the **Program Director** unless he or she has been involved in the initial appeal hearing with the individual faculty member or is the instructor.
  - a. The request to appeal the grade will be put in writing and addressed to the Program Director within 5 working days of the receipt of the instructor's decision. The appeal will contain the reason for the grade appeal and supporting materials. Acceptable reasons for appeal are the same as listed in 2.b. above.
  - b. The Program Director will contact the student within 5 working days of receipt of the appeal and schedule a formal meeting with the student.
  - c. This meeting will be attended by the Program Director, the student, and anyone else the student wishes to bring (if desired). The meeting will be recorded by notes and audiotape.
  - d. The Program Director may seek additional information from the course instructor and /or student before rendering a judgment.
  - e. The possible outcomes of this appeal hearing are:
    - Support for the instructor and a recommendation that the grade should stand as given.
    - Recommendation to instructor to change the grade
    - Student accepts the grade and ends the appeal process.
    - Student does not accept the grading decision and decides to appeal to the next level.
  - f. The outcomes of the appeal will be documented by the Program Director within 5 working days with a copy sent to the student and placed in his/her file.
4. The next level of appeal is to the department chair.
  - a. The request to appeal the grade will be put in writing and addressed to the Health Professions Chair within 5 working days of the receipt of the decision of the Program Director. The appeal will contain the reason for the grade appeal and supporting materials. Acceptable reasons for appeal are limited to the above with the addition that:
    - e. The outcomes of the appeal will be documented by the course instructor within 5 working days after the hearing with a copy sent to the student and placed in his/her file.

- The Program Director recommended a grade change to the instructor; but the instructor did not change the grade.
  - b. The department chair will contact the student within 5 working days of receipt of the appeal and schedule a formal meeting with the student.
  - c. This meeting will be attended by the department chair, the student, and anyone else the student wishes to bring (if desired).
  - d. The meeting will be recorded by notes and audiotape.
  - e. The department chair will speak to the course instructor after meeting with the student to gather information about the grading. The department chair may also formally seek additional information from the course instructor and /or student before rendering a judgment.
  - f. The possible outcomes of this appeal hearing are:
    - Support for the instructor and a recommendation that the grade should stand as given.
    - Recommendation to instructor to change the grade
    - Student accepts the grade and ends appeal process.
    - Student does not accept the grading decision and decides to appeal to the next level.
  - g. The outcomes of the appeal will be documented by the department chair with a copy send to the student and placed in his/her file within 5 working days after the meeting.
5. The next level of appeal is to the Health Professions Department.
- a. If the student wishes to pursue an appeal, the request for a formal appeal at the Health Professions Department Level must be filed with the department chair in writing within 5 working days after receipt of the decision from the department chair. The appeal will contain the reason for the grade appeal and supporting materials. Acceptable reasons for appeal are limited to the aforementioned reasons plus:
    - Department chair recommended a grade change to the instructor; instructor did not change the grade.
  - b. The department chair, within 5 working days after receiving the appeal, will appoint the five-member ad hoc committee to hear the appeal as indicated in the bylaws:
    - Three faculty/staff of the program (whenever possible)
    - The instructor
    - One faculty/staff from outside of the program
  - c. The department chair will appoint one of the committee members (other than the course instructor) to chair the committee. The department chair shall not be a member of this committee but will attend the committee meeting as an observer and witness.
  - d. This appeals committee will meet within 5 working days of receipt of the written grade appeal. The committee members will be given copies of the documentation of the previous 3 levels of appeal prior to the appeal hearing.
  - e. The appeals hearing will be conducted as follows:
 

Student will be given 15 minutes to describe the basis for the appeal and provide supporting documentation to the committee.

    - Involved teacher will be given 15 minutes to describe the rationale for the grade and reason for not changing the grade.
    - Department chair will be asked to describe involvement in the situation and outcome of actions.
    - Student will be excused and committee will deliberate actions.
    - The committee may ask for additional information from any of the parties involved. The committee will specify the time frame for supplying the materials. The request for additional materials will be put in writing.
    - If additional materials are requested, the committee meeting will be adjourned. The committee will reconvene within one week after deadline for receipt of the requested materials.
  - f. The possible decisions the committee can make are:
    - Support the appeal and make a recommendation to the course instructor to change the grade.
    - Deny the appeal and support the grade as given.
  - g. The appeals committee chair will communicate the outcome of the appeal hearing in writing to the

- student, course instructor, and department chair within 5 days of the final committee hearing.
- h. A copy of the student written appeal and the response of the committee will be given to the student and placed in the student's permanent record.
6. A final grade will be determined by the instructor and will be communicated to the student within 5 working days of receiving the committee's recommendation.

### **Non-Grade Appeal Process**

1. If a student has concerns about actions of instructors or program officials which are construed to be related to discrimination or sexual harassment the following actions should be taken:
    - a. If the student is on campus, he/she should first speak with the Program Director.
      - Following that discussion, if the student wishes to pursue additional discussion and/or a formal complaint he/she will be directed to speak with the Affirmative Action Officer.
      - The process that is involved regarding concerns about discrimination on the basis of the student's race, color, creed, religion, sex, national origin, disability, ancestry, age, sexual orientation, pregnancy, marital status or parental status and processes regarding sexual harassment can be found in the Student Handbook at: [uwlax.edu/student-life/student-resources/student-handbook/](http://uwlax.edu/student-life/student-resources/student-handbook/).
    - b. If the student is at internship:
      - He/she should first speak with the Clinical Preceptor at his/her site.
      - Following that discussion, if the student wishes to pursue additional discussion and/or a formal complaint he/she will be directed to speak with the appropriate officer at the internship site.
        - The Program Director and Clinical Coordinator will also be apprised of the situation by the student.
      - A student who feels that the matter has not been satisfactorily addressed through the process at the site may petition in writing the Medical Dosimetry Advisory Committee for a change in internship site assignment.
- The Medical Dosimetry Advisory Committee will meet within 2 weeks of receiving the appeal and will respond to the student in regard to his/her petition within 2 weeks after the meeting.
  - A student who wishes to appeal the decision of the Medical Dosimetry Advisory Committee may do so by contacting the Health Professions Department Chair in writing within 5 working days following receipt of the Medical Dosimetry Advisory Committee decision.
  - The Chair will contact the student within 5 working days and schedule a meeting with him/her and whoever else is mutual agreed upon within 10 working days.
  - The Chair will make a recommendation to either support the decision of the Medical Dosimetry Advisory Committee or suggest an alternative decision to that Committee within 5 working days of the meeting.
  - If the student wishes to pursue further appeal, he/she must notify the Chair of Health Professions within 5 working days of receiving the prior decision.
  - The Chair will convene an ad hoc of 3-5 faculty, staff or adjunct faculty members and they will meet within 10 working days of the student's receipt of the earlier decision. The student and other agreed upon persons may attend but will not be voting members.
  - The decision of this Committee will be communicated to the program and the student within 5 working days of the meeting and will be final.
2. Students may appeal a program decision or action that he/she feels is unfair, biased, arbitrary or capricious.
    - a. If the program decision or action of concern is a result of alleged academic or non-academic misconduct on the part of the student the appropriate appeal process is determined by either UWS 14.03 or UWS 17.03 and can be found above.
    - b. If the program decision or action of concern is not related to student conduct, discrimination or sexual harassment, the following process is to be followed:
      - The student should contact the Program Director as soon as possible following the decision or action of concern to discuss the situation.
      - The Program Director will schedule a meeting with the student within 5 working days of the contact. If the

student is at internship site, this meeting may be by telephone.

- If the student wishes to submit a formal appeal of the decision or action, he/she must do so in writing to the Medical Dosimetry Advisory Committee (by contacting the Program Director or the Clinical Preceptor at his/her site) within 30 days of the original decision or action.
- The Medical Dosimetry Advisory Committee will meet within 10 working days of receipt of the appeal notice. It is preferred that the meeting be held in person with the student being given the opportunity to represent him/herself or to submit a written statement for the Committee's review. Under certain circumstances a telephone or video conference call may be held instead of a face-to-face meeting.
- The Committee will communicate its decision in writing to the student within 5 working days following its meeting.
- A student who wishes to appeal the decision of the Medical Dosimetry Advisory Committee may do so by contacting the Health Professions Department Chair in writing within 5 working days following receipt of the Medical Dosimetry Advisory Committee decision.
- The Chair will contact the student within 5 working days and schedule a meeting with him/her and whoever else is mutual agreed upon within 10 working days.
- The Chair will make a recommendation to either support the decision of the Medical Dosimetry Advisory Committee or suggest an alternative decision to that Committee and the student within 5 working days of the meeting.
- If the student wishes to pursue further appeal, he/she must notify the Chair of Health Professions within 5 working days of receiving the prior decision.
- The Chair will convene an ad hoc of 3-5 faculty, staff or adjunct faculty members and they will meet within 10 working days

of the student's receipt of the earlier decision. The student and other agreed upon persons may attend, but will not be voting members.

- The decision of the ad hoc Health Professions Committee will be communicated to the student in writing within 5 working days following their meeting.
- If the student is not satisfied with the decision of the Health Professions ad hoc Committee, he/she may appeal in writing to the Dean's Office within 5 working days.
- The Dean will review the information about the case that has been gathered and may meet with the student and/or Program Director and/or departmental chair within 10 working days of the student's appeal.
- The Dean's decision will be communicated to the student in writing within 10 working days of the meeting. The Dean's decision is final.

## C-5: FAIRNESS POLICIES

1. The University and the Clinical Internship sites believe strongly in their non-discriminatory policy, that admission and treatment of students in classes, clinical internship will not be affected by student characteristics of gender, race, color, creed, religion, national origin, disability, ancestry, age, sexual orientation, pregnancy, marital or parental status or relationship to employees.
2. The University and its Clinical Affiliates believe in hiring and promoting faculty and employees according to the above non-discriminatory statement.
3. Due process will be followed in any complaints against students in academic or non-academic concerns as detailed in the UWL Student Handbook: [uwlax.edu/student-life/student-resources/student-handbook/](http://uwlax.edu/student-life/student-resources/student-handbook/).
4. There is a mechanism for addressing of student grievances or appeals found in the UWL Student Handbook. Students in the program are also encouraged to consult the Program Director for any concerns. If that does not satisfy the student, an Advisory Committee for the program has been formed and can be appealed to.
5. If a student has concerns about the program which are not resolved through the grievance policy and procedures and if he/she feels that the program is not in compliance with JRCERT accreditation standards, or feels that the quality of instruction or general welfare of the students within the program is jeopardized, he/she may submit allegations of non-compliance directly to the JRCERT. Please see the JRCERT policy and allegations reporting in appendix B of this handbook.
6. Sexual harassment will not be tolerated. Any grievances should be reported to the Clinical Coordinator and Program Director. See the UWL policy in the Student Handbook for additional information [uwlax.edu/student-life/student-resources/student-handbook](http://uwlax.edu/student-life/student-resources/student-handbook).
7. A student's behavior in the clinical setting must conform to policies and rules established by the affiliated institution. Failure to conform may result in probation, or dismissal from that site. The Advisory Committee and Program Officials will be consulted to protect the student and the institution's interests as much as possible.
8. The number of students selected into the program will be limited by the number of clinical internship

sites available for the school year. The University and Program officials will do everything possible to guarantee sufficient sites for placement. However, actual placement is not guaranteed. It will be done following a successful interview process and offer of placement from one of the clinical internship sites.

9. Program officials will make every effort to assure that activities assigned to students in academic and clinical courses will be for educational purposes.

## C-6: GRADING POLICY

### DIDACTIC

1. The following grade scale will be used for Medical Dosimetry didactic coursework whenever possible:

94 – 100	A	4.0
92 – 93	A/B	3.5
86 – 91	B	3.0
84 – 85	B/C	2.5
78 – 83	C	2.0
70 – 77	D	1.0
----- 69	F	0.0

- Need to receive "C" or better → passing
  - Less than "C" in any course → dismissal from graduate study
  - Maintain overall GPA of 3.0 or greater → to remain in good standing
2. The instructor may grade assignments/exams on a curve if he/she consults with Program Officials and can justify the rationale.
  3. Course assessment (exams/quizzes/practice problems) equates to ~60% of the course grade. If a student fails the assessment category (< C grade) they may fail the course (= dismissal). Failing the assessment category but passing the course will result in a probationary status. On second occurrence, the student will be dismissed from the program.

### CLINICAL

The grade for a clinical internship course will be determined by clinical competency testing, affective clinical evaluations by clinical instructors, labs, and written assignments per the course syllabus.

## C-7: OFF CAMPUS COURSE ATTENDANCE POLICY

Attendance of classes is expected while in the program and notification of absence is required. The courses are delivered with weekly deadlines and designated times during clinical hours to complete required coursework. Students are to contact the Program Director or Clinical Coordinator when coursework is going to be missed.

## C-8: ACADEMIC HONESTY POLICY

Any form of cheating or claiming credit for work other than your own will automatically result in a grade of zero for the applicable assignment or exam.

### Integrity of Distance Education

Academic integrity is defined in state statute (UWS 14) and these requirements extend even to the online environment ([uwlax.edu/student-life/student-resources/student-handbook/#tm-academic-misconduct-chapter-uws-14](http://uwlax.edu/student-life/student-resources/student-handbook/#tm-academic-misconduct-chapter-uws-14)). Academic integrity includes the expectation that students submit their own work and do not claim credit for the work of others ([docs.legis.wisconsin.gov/code/admin\\_code/uws/14](http://docs.legis.wisconsin.gov/code/admin_code/uws/14)). The graduate school student honor code ([catalog.uwlax.edu/graduate/academicpolicies/studentconduct/#student-honor-code](http://catalog.uwlax.edu/graduate/academicpolicies/studentconduct/#student-honor-code)) reiterates that students are responsible for honest completion and representation of their own work and respect for others' academic endeavors.

Within the medical dosimetry program, there are several measures taken to ensure that academic integrity is maintained including the following:

- Verification of student identity & protection of privacy: UW-L verifies student identity through a system of secure logins and passwords first established for a student at the time of admission. A student ID and a NetID (network identification) are assigned to all students; students establish a password. Students receive a packet from medical dosimetry admissions with information about the NetID and password but there is also information on the University admissions website as well <https://www.uwlax.edu/admissions/next-steps/admitted-online-student/>. The NetID and password are required for students to login to

university computing and networking services, the learning management system, and to access payment and financial records.

- DUO security system: a more secured login system also implemented is the DUO security system. DUO is a multi-factor authentication system; a 2-Step authentication process to keep students and their data safe and secure. The DUO system helps prevent computer hacking of data because of comprised passwords. Our students can use the mobile app to help confirm their identity which generates a random pass code when they try to access UWL system applications.
- Respondus Lockdown Browser / Monitor: During assessment, there is a security feature that is required for exams called Respondus. Essentially, it is a software system that students download to their computer so the exam can only be taken if they have entered into Respondus Lockdown. The software restricts students to only work in Canvas on the exam screen and prohibits internet searching or navigating the computer. Respondus Monitor is the portion using the webcam from their computer to monitor the work environment prior to taking the exam, verifies identity, and monitors progress through the exam to ensure there are no notes, books or materials being used.

## C-9: ASSIGNMENT POLICY

All assignments will be due by the date and time indicated by the course instructor as per the syllabus. See course details for point reductions due to late assignments.

## C-10: RECORDS AND RELEASE OF INFORMATION

1. The release of information to and about students is in conformance with the Family Education Rights and Privacy Act, as amended in 1975.
2. A formal record of each student's grades is maintained. A student will be shown clinical affective evaluations with the Clinical Preceptors. A student may also inspect his/her own clinical internship records upon making an appointment with the Clinical Coordinator.
3. Student records are securely kept in the office of the Program Director and Clinical Coordinator. Records

- will also be maintained under strict security by University of Wisconsin-La Crosse in perpetuity.
4. Any information regarding the student's academic or clinical performance is confidential. An authorization for release of any information must be made in writing by the student or graduate to the Records and Registration Office. Clinical internship records must be requested from the Clinical Coordinator.
  5. Government officials or officials of the school's accrediting bodies may have access to the student records for the purpose of official business upon presentation of identification and statement of the purpose of viewing the records.
  6. Upon completion of the program, a student may request a copy of his/her grade transcript. This copy will be marked "personal copy".

## C-11: PERSONAL STUDENT USE OF SOCIAL NETWORKING SITES

The University of Wisconsin-La Crosse (UWL) Medical Dosimetry Program recognizes that social networking websites and applications, including but not limited to Facebook, Twitter and blogs, are an important and timely means of communication. Students, faculty and staff are reminded that they should have no expectation of privacy on social networking sites. Students, faculty and staff must also be aware that posting certain information is illegal. Violation may expose the offender to criminal and civil liability. Offenses may be considered non-academic misconduct and be subject to the appropriate policies and procedures.

The following actions are strictly forbidden:

- In your professional role as a caregiver, you may not present the personal health information of other individuals. Removal of an individual's name does not constitute proper de-identification of protected health information. Inclusion of data such as age, gender, race, diagnosis, date of evaluation, or type of treatment or the use of a highly specific medical photograph (such as a photograph of a patient undergoing Radiation Therapy or a photograph of a patient treatment plan) may still allow the reader to recognize the identity of a specific individual.
  - You may not report private (protected) academic information of another student or trainee. Such information might include, but is not limited to: course grades, narrative evaluations, examination scores, or adverse academic actions.
- In posting information on social networking sites, you may not present yourself as an official representative or spokesperson for the University of Wisconsin-La Crosse Medical Dosimetry Program or affiliate organizations.
  - You may not represent yourself as another person, real or fictitious, or otherwise attempt to obscure your identity as a means to circumvent the prohibitions listed above and below.

In addition to the absolute prohibitions listed above, the actions listed below are strongly discouraged. Violations of these suggested guidelines may be considered unprofessional behavior and may be the basis for disciplinary action.

- Defamatory statements about the program specific to enrollment, academic performance, instructor grading, or similar.
- Display of vulgar language.
- Display of language or photographs that imply disrespect for any individual or group because of age, race, gender, ethnicity or sexual orientation.
- Presentation of personal photographs or photographs of others that may reasonably be interpreted as condoning irresponsible use of alcohol, substance abuse or sexual promiscuity.
- Presentation of personal engagement in illegal activities including use of recreational drugs.
- Posting of potentially inflammatory or unflattering material on another individual's website, e.g. on the "wall" of that individual's Facebook site.

When using these social networking websites/applications, students are strongly encouraged to use a personal e-mail address, rather than their UWL email address, as their primary means of identification. Individuals also should make every effort to present themselves in a mature, responsible, and professional manner. Discourse should always be civil and respectful.

## Student Organization Use of Social Networking Sites

Registered student organizations that use social networking sites are required to include their advisor and/or the Director of Student Affairs for continuity purposes. Student organizations are not to represent themselves as official representatives or spokespersons for the University of Wisconsin La Crosse or affiliate organizations and are subject to the university's identity

standards. Violation of this policy may be considered non-academic misconduct in addition to the student organization losing their official registration status with the university.

\*This policy was adapted with permission from the University of Kansas Medical Center for use in UW-La Crosse Health Professions Programs.

## C-12: HEALTH AND SAFETY POLICIES

The University of Wisconsin-La Crosse program in Medical Dosimetry is interested in promoting good health for students, instructors and patients. The following policies have been developed to attain that goal.

1. Students at the various clinical sites must carry health insurance to cover medical expenses during the program.
2. All applicants are informed of the "Essential Functions of a Medical Dosimetrist". They are to consider whether the functions of the position of a medical dosimetrist and medical dosimetry student are within their abilities, with or without accommodation.
3. If it is determined that the student requires reasonable accommodation to perform the "Essential Functions", the clinical internship site and the University will make every effort to provide such accommodation.
4. Students beginning their clinical internship are required to complete a health screening (physical exam) prior to attendance. An immunization sheet completed during the health screening is required prior to the start of internship. Typically included: a chicken pox titer (if not previously completed), MMR, Hepatitis B, TB testing, flu shot, and a 5-panel drug and alcohol screening (when required by the internship site).
5. The Program does NOT mandate drug testing. However, individual clinical sites may require drug testing prior to clinical rotation to ensure patient safety. Prior to rotation, if a clinical site requests drug testing, students will be notified and referred to a capable testing facility. Students will assume the cost of testing.  
All collection and testing will be conducted pursuant to guidelines established by the Medical Review Officer (MRO) of the testing facility, and if applicable, in accordance with Substance Abuse and Mental Health Services Administration guidelines, which include a confirmatory test; opportunity for a split sample; review by an MRO, including the opportunity for students who tests positive to provide a legitimate medical explanation for the positive results, such as a provider's prescription; and a documented chain of custody. The Program, in conjunction with the MRO, will make decisions on a case-by-case basis about the fate of students who test positive for illicit drugs or medications.
6. Should a student become injured during the clinical portion of their training, he/she may be permitted to be treated on an emergency basis at the clinical site, with expenses billed to his/her insurance carrier. A University of Wisconsin system incident report must be submitted.
7. In orientation to the clinical internship site, students will be made aware of precautions to be taken in caring for patients. Universal precautions/standard precaution measures are to be strictly adhered to for safety of students, staff and patients.
8. If a student should be exposed to patient body fluid by a needle stick, OSHA recommendations will be followed, and the student will be seen by hospital personnel. A University of Wisconsin system incident report must be submitted.
9. **Policy on reporting of communicable diseases:** In the interest of protecting radiotherapy patients from exposure to communicable disease, the University of Wisconsin-La Crosse and its clinical affiliates request that students contracting such diseases inform the clinical preceptor. Upon such notification, the program officials will advise the student on the appropriate steps to take to avoid patient exposure. Such steps may include counseling on proper hand washing technique, the wearing of a mask or physical absence from the area when immuno-compromised patients are treated. All such information given by student to program officials will be held in strict confidence and will not be used against the student.
10. If the student is exposed to a communicable disease at the clinical internship site, for example by a needle stick, he/she must report the exposure to the Clinical Preceptor who will inform the Clinical Coordinator and Medical Advisor. The student will be sent to Employee Health for evaluation and/or treatment. A University of Wisconsin system incident report must be submitted.
11. In orientation to the clinical internship, students will be educated in regard to hazardous materials used at the affiliate site. MSDS sheets for commonly used materials will be shared. Students are expected to use safe handling procedures as they are taught.



**12. Sickness Policy:** Interns are required to follow the *Too Sick for Clinical Internship* requirements regarding sickness. If an intern presents with the conditions listed, it is the clinical preceptor's discretion to send the intern home or accept the intern into the clinical setting based on the examples provided. The intern will be required to use PTO time for his/her absence.

- If an intern is on narcotic prescription drugs, the intern will not be allowed to participate in clinical activities due to the potential side effects and altered mental status.
- The return-to-work protocol and other illness related clinical situations are to follow the hospital (clinical facility) policies.

The Too Sick for Clinical Internship document can be located on the Current Student Website (<https://www.uwlax.edu/grad/medical-dosimetry/current-students/>) and the Clinical Preceptor Website (<https://www.uwlax.edu/grad/medical-dosimetry/clinical-preceptors/>).

**13. COVID Policy:** The COVID policy may vary based on the internship site location and severity of outbreaks. A Remote Clinical Education Policy has been established and must be adhered to during a COVID restriction.

The Remote Clinical Education Policy is located on the Current Students Website (<https://www.uwlax.edu/grad/medical-dosimetry/current-students/#tab-clinical>).



## C-13: STUDENT PREGNANCY POLICY

Students should understand that a pregnancy during the medical dosimetry program might have an impact on their education and possibly upon the timing of graduation.

Two important factors are involved:

- Courses are only offered once each year and time missed for pregnancy and/or delivery will likely necessitate make up work or perhaps delay of up to a year to maintain the proper sequence of courses, depending on the timing and amount of time missed.
- There are potential risks to an embryo or fetus secondary to radiation exposure that may require counseling and alteration of the clinical education experience.

*The following policy has been developed to guide the program and its students in the event of a student pregnancy.*

1. The U. S. Nuclear Regulatory Commission Regulatory Guide 8.13 regarding "Possible Health Risks to Children of Women Who are Exposed to Radiation During Pregnancy" can be found in appendix A. Female students are to read this document as well as the pregnancy policy and complete and return the associated form to be kept in program records.
2. All students will be made aware of risks and hazards of prenatal radiation exposure during coursework at UWL and upon orientation to the clinical internship.
3. A student who is pregnant, or suspects that she may be, has the option to voluntarily declare that condition to program officials.
  - a. If the student decides to declare the pregnancy it shall be done in writing to the Program Director and/or the Clinical Preceptor of her internship site. The notification shall also include the expected date of delivery.
  - b. A student may "undeclare" her pregnancy at any time. The student should submit a written withdrawal of declaration of her pregnancy status. This should also be submitted to the Program Director or Clinical Coordinator and/or Clinical Preceptor if attending internship.
  - c. The program will comply with student confidentiality requests as much as possible.
4. If a student declares a pregnancy, a counseling session will be set up with the radiation safety officer at the student's clinical internship site to review radiation exposure risks and any additional monitoring practices that may be initiated.
5. A declared pregnant student may choose one of the options below (or may choose to change to a different option at a later time if desired, with written notice):
  - a. She may take a leave of absence from the program. (See policy for leave of absence.) Should the declared pregnant student decide to leave the program during pregnancy and delivery, tuition will be refunded according to the Tuition Refund Policy. In this circumstance the student would be readmitted to the program at the first available opening after delivery.
  - b. She may stay in the program, but make modifications in her didactic curriculum and/or the clinical rotation schedules to reduce the chance of exposure to the fetus. For example, she will not participate in brachytherapy treatments or proton treatments (or other site-specific rotations as recommended by the Radiation Safety Officer) during the time of the pregnancy. Competency and experience in all required areas will be made up following delivery. This could delay graduation beyond the originally expected date.
  - c. She may decide to stay in the program and/or internship during pregnancy and continue the program without modification of learning activities or clinical rotations. If she decides to do this, she does so in full knowledge of the potential hazard of embryo/fetal radiation exposure. If a student selects this option, it is recommended that she consult her personal physician in this regard. She must indicate in writing her intention to continue with the program without modification. A copy of documentation of this decision will be kept in the student's file. NOTE: A student choosing to continue the program without modifications will be held to the same requirements and deadlines as the students within her cohort.
6. If delivery occurs during clinical internship, all course work and clinical time must be completed before the student is eligible for graduation and to apply to take the MDCB examination.

## C-14: RADIATION SAFETY POLICIES

Radiation safety policies are developed for the protection of the students, staff, and patients. Students are required to exercise sound radiation protection practices at all times. At no time may a student participate in a procedure utilizing unsafe protection practices.

### Patient Safety

1. During treatment planning, the fields should be designed to minimize the amount of radiation exposure to the patient and normal tissues while effectively radiating the treatment volume.
2. Calculations and plans completed by the student will be double checked by the medical dosimetrists and/or physicists.
3. Students involved in simulation and treatment setups are to be supervised at all times by the medical dosimetrists and/or physicists.
4. Any errors in planning or charting are immediately communicated to the supervising medical dosimetrist, medical physicist, and radiation oncologist in charge of the patient's care.

### Radiation Safety

1. Students receive instruction on radiation safety during didactic courses such as DOS 516 Radiation Safety for Medical Dosimetrists.
2. Orientation to the clinical internship includes a review of radiation safety measures and requirements by the Radiation Safety Officer.
3. A radiation-monitoring badge, issued by the clinical affiliate, must be worn by the student(s) at all times while in the clinical internship setting. This badge should be worn as directed by the Radiation Safety Officer. This badge should not be worn while having diagnostic medical or dental radiographs taken.
4. Students not wearing the monitoring badge will not be permitted in the clinical internship site.
5. An accident with, or the loss of, badge(s) must be reported immediately to the Radiation Safety Officer.
6. Students, staff, and visitors are not allowed in the simulation or treatment rooms during the exposures or treatment.
7. If the student is in the simulator or High Dose Rate Afterloader room during fluoroscopy, he/she will wear a lead apron.
8. When rotating through brachytherapy, if the student is loading or unloading sources, a ring badge must be

worn. Students must remember to put to use the techniques of time, distance and shielding.

9. Students will be given counseling regarding radiation safety practices as necessary.

### Radiation Monitoring & Excessive Doses

1. Radiation Dosimeter reports are reviewed monthly by the Radiation Safety Officer at the clinical internship sites. The reports are available in the clinical internship site with personal identity information protected.
2. Monthly radiation exposures for students must not exceed the dosage of 50 mRem to occupationally exposed persons which may be less than or equivalent to the maximum permissible dose established by the state and federal agencies for radiologic health.
3. If abnormal (high) readings are present, the radiation safety officer, clinical preceptor and program officials will investigate the cause. This may include interviews with students, clinical instructors, clinical preceptors and other relevant individuals. The objective of this investigation will be to learn why the student received the excessive dose and to determine what type of corrective action may be needed.
4. A report of the information obtained and subsequent corrective action will be provided to the student. This action will be enforced and the results of the investigation and corrective action will be placed in the student's file and program files for future reference.
5. The Radiation Safety Officer and Program Officials will counsel the student to include the risk from radiation exposure, the reason for the exposure (if it's possible to determine), and changes in work habits, procedures, and equipment as appropriate. The student will be monitored closely to ensure they are following the corrective action plan.

## C-15: MRI SAFETY POLICY

In MRI, the magnetic field is always on. Students working with or observing in an MRI area will comply with each site's policies and procedures regarding metallic objects being introduced into the MRI scanning area. Carrying ferromagnetic articles or introducing them to the MRI scanning area is strictly prohibited. These objects can become projectiles within the scanning room causing serious injury or death and/or equipment failure. This would include but not be limited to: oxygen tanks, wheelchairs, carts, monitors, IV poles, laundry hampers, tools, furniture, personal ferromagnetic items (e.g. Cell phones, iPods, underwire bras). Students will be screened according to patient screening protocols at the respective hospital, to assure MRI compatibility. Students should notify the clinical preceptor immediately if their safety status should change after screening due to a surgical implant, personal injury or other event during the course of their time in the program.



## SECTION D

### CLINICAL INTERNSHIP

#### D-1: INTRODUCTION TO CLINICAL INTERNSHIP

The officials of the University of Wisconsin-La Crosse Medical Dosimetry Program support a philosophy that a strong clinical emphasis is essential in educating medical dosimetrists. The academic or didactic area is very important, but unless the individual dosimetrist can take what he/she has learned in class and put it to practice in the clinical arena, he/she will not be able to function adequately in the field. Trained and certified medical dosimetrists and physicists supervise students in their clinical rotations. They not only provide the student with information on techniques and procedures, but also with the background material and rationale for what is done. Radiation oncologists, radiation therapists, and nursing staff are available for further explanations and assistance.

The plan for clinical education includes the following points:

1. All activities are designed to be educational.
2. Qualified practitioners (e.g. certified medical dosimetrist, credentialed medical physicist, licensed radiation oncologist) will always supervise students. All clinical procedures/tasks performed by the student(s) must be approved by a qualified practitioner prior to implementation.
3. Students will rotate through all clinical areas routinely during the internship.
4. Written assignments will be given to check cognitive learning in regard to the clinical objectives.
5. Students will demonstrate psychomotor learning by competency testing on treatment planning listed in the syllabi for the clinical internship courses. If a student fails in an attempt to document competency, the treatment plan must be repeated.
  - a. The student is observed during the competency testing by a clinical instructor who completes the competency form electronically.
  - b. This instructor will give students ample time to complete the treatment plan. He/she will give the student an opportunity to self-correct any errors in the planning but will not allow the patient to be

treated incorrectly. A limited number of competencies may be obtained with the use of a "test" patient or phantom rather than a real patient as approved by the Clinical Coordinator.

- c. The required clinical competencies are listed on the *Master Competency Checklist*.
6. Clinical affective evaluation forms, addressing affective learning objectives, will be filled out electronically by a clinical instructor who has worked closely with the student during their rotation. The clinical instructor or clinical preceptor will review the evaluations with the students within two weeks of the end of each rotation, whenever possible.
7. Objectives for each clinical internship course, competency evaluations, affective evaluation forms, clinical labs, and written assignments will be given to the student at the beginning of the semester.

#### Daily Schedule

- a. Students are required to login to their UWL email daily (at least a few times daily). This is NOT the Canvas inbox. Students are responsible for login and completion of coursework in active Canvas courses daily.
- b. It is recommended to complete at least 2 hours of didactic time during daytime hours to ensure instructors and/or peers are available for assistance or to answer questions. Furthermore, students will require additional hours of homework in the evenings and weekends.
- c. Clinical internship hours per day and per week are established with the clinical coordinator and internship site prior to starting clinical internship.

#### D-2: ATTENDANCE POLICIES

2. General Information
  - a. The clinical internship is scheduled for 3 semesters (full-time) or 5 semesters (part-time).
  - b. Clinical internship is 30 hours per week for full-time or ~20 hours per week for part-time students. Students are not to be in clinical internship more than the required, scheduled hours per week.

- c. The purpose of time use regulation is to maximize the clinical education of students, assure fairness and equity between students and foster good work habits for future job success.
3. Daily Hours
    - a. Students are expected to report for the required internship hours with beginning and ending times approved by the Clinical Preceptor and Clinical Coordinator. Variations of these hours must be made in advance and approved by the Clinical Preceptor and Clinical Coordinator.
    - b. Students are responsible for entering their hours into the electronic time cards.
    - c. Students must fulfill a specific number of hours each day based on full time or part time enrollment. This is **actual internship time and does not include breaks or lunch time**. Therefore, if you are full time and are taking a lunch break, add that time to the required internship hours. For example, you are in clinic 8a to 3p; **6 hours of clinical** and 1 hour of lunch.
    - d. Early or late hours: should a patient planning situation of particular interest arise, that would necessitate attendance beyond normal hours, a student may volunteer to stay to observe and assist. However, the time should be deducted from clinic the following day. If this occurs on a Friday, the time should be deducted the following Monday.
      - Time spent over the required number of hours per week in this manner will be compensated to the student with equal time off at a time arranged between the student and the Clinical Preceptor (should be the next clinical day).
  4. Personal Time Off (PTO)
    - a. The student will be granted 5 days of PTO.
    - b. Students are required to request time off in advance with the approval of the clinical preceptor.
  5. Scheduled Breaks
    - a. A spring break will be scheduled per the program spring break schedule. Note that this schedule may not always coincide with the UW La Crosse campus schedule.
    - b. Clinical breaks in between semesters are dictated by the UW La Crosse Medical Dosimetry program didactic semesters. Program schedules are posted on the Current Students website: [uwlaax.edu/Medical-Dosimetry-MS/Current-students/](http://uwlaax.edu/Medical-Dosimetry-MS/Current-students/).
  6. Holidays
 

The holidays observed are: Martin Luther King Day, Memorial Day, Fourth of July, Labor Day, Thanksgiving (and Friday following), Christmas Eve/Day, and New Year Eve/Day.

    - If the clinic is closed on a non-UWL holiday, clinical internship will be cancelled and no time deducted from the student.
  7. Funeral attendance/Bereavement time
    - a. Students are allowed up to three days of time upon the death of a close family member for bereavement and funeral attendance.
    - b. Students may have time to attend the funeral of a friend or other significant person upon the discretion of the Clinical Preceptor and Clinical Coordinator.
    - c. For any use of time for this purpose, the Clinical Coordinator is to be consulted.
  8. Incomplete (insufficient) time
 

If a student uses more time than allowed for PTO and becomes deficient in the standard amount of time required by the clinical affiliate for graduation, the student will be required to spend the appropriate amount of time to be made up in the department during a normal work day under the supervision of a clinical instructor. Upon completion of the deficient time, the student will receive his/her diploma and will be declared a graduate of the program. Student's may voluntarily "makeup" time used in excess for leave or other reasons by:

    - a. Starting early or staying late in the clinic, or during scheduled breaks (pending program official's approval). The student must be involved in valuable clinical experience beyond the eight-hour day or during breaks (supervised by the Clinical Preceptor or Clinical Instructor.)
    - b. Above time must be noted on the time card and approved by the supervising clinical instructor.
    - c. Excessive absenteeism may be brought by the Clinical Preceptor of the student's internship site to the Advisory Committee, which will recommend action to be taken. Actions can include probation and dismissal from the program.
  9. Mandatory Attendance Requirements
    - a. General

- The student is required to attend designated didactic coursework time, unless ill or on approved leave.
  - Coursework time is prescheduled as approved by the Clinical Preceptor and Clinical Coordinator.
  - If a student fails to fulfill the required coursework or exams in the scheduled time, their grade on this work will be adjusted according to course instructor policies located in the syllabus.
- b. Conferences
- All students will attend conferences within the clinical site as scheduled by the Clinical Preceptor.
  - Students are required to join the American Association of Medical Dosimetrists (AAMD) professional society and encouraged to attend the regional or annual educational meetings.
  - Up to 5 days for Conference attendance will be granted for the student to attend the American Association of Medical Dosimetrists (AAMD) annual meeting. Other medical dosimetry meetings may be allowed during the year, as pre-approved by the Preceptor and Clinical Coordinator.
  - Time away from clinical internship to attend conferences must be logged into the clinical management system appropriately.
  - While attending conferences, students are responsible for remaining current with online didactic coursework.
  - When the conference falls on a weekend, conference days may be substituted for clinical days pending Clinical Preceptor and Clinical Coordinator approval.
- c. Applications Training
- Medical Dosimetry students are also permitted to attend vendor applications training if the clinical internship requests to send the student. The applications training must be dosimetry treatment planning specific and approved by the preceptor and Clinical Coordinator.
  - Time away from clinical internship to attend applications training must be logged into the clinical management system appropriately.
- While attending training, students are responsible for remaining current with online didactic coursework.
  - When applications training falls on a weekend, training days may be substituted for clinical days pending Clinical Preceptor and Clinical Coordinator approval.
- d. Liability Insurance for Conference/Applications Training
- Whether attending a conference or applications training, the liability insurance coverage is as follows:
    - Students are considered agents of UW-La Crosse if they are involved in any activity connected to their education. As agents of the University, they are covered for liability under the UW System's self-insured liability program. General Liability insurance for the student covers an occasion where the student would negligently injure or damage someone or something outside of his or her duties at a clinical facility. Attending an educational conference or going to a vendor sponsored training session would be considered university related educational activity of an agent of the university and, therefore, they would be covered for liability.
    - This is not the same liability insurance purchased for clinical internship. Professional liability insurance purchased for clinical internships would apply if students were to injure a patient. Therefore, this insurance only applies to clinical internship.
    - In addition, students are required to possess their own personal health insurance prior to enrolling in the program. This personal health insurance as well as other third-party at-fault situations would be considered depending on the circumstance (e.g. injured while riding in a taxi when attending an applications training – the taxi insurance would be responsible for coverage).
- d. Jury Duty
- Being selected for jury duty is a situation over which a student has no control. During juror selection the judge usually asks if anyone has any extenuating circumstances that would

somehow impede them from serving on a jury. That is the time to announce you are in a medical dosimetry program and you are in clinical 30 hours per week and would possibly be at risk for having to extend your duration in the program if you missed a certain number of days. Most judges are fairly understanding of students who have demanding schedules. If you are selected for jury duty and are unable to be excused, it will be considered an excused absence from the program. The Clinical Coordinator requires that students submit a copy of their jury notice prior to their scheduled jury duty.

- The individual course instructors will make reasonable accommodations for any student required to fulfill jury duty obligations. This includes providing additional time to complete assignments, tests or quizzes missed during this absence.
- Students that are absent from clinical due to jury duty and fall behind in terms of expected clinical performance, may be assigned additional days of clinical experience beyond the normal schedule. An individual clinical plan will be developed outlining the student performance requirements for this additional clinic time, if required.

### **D-3: INCLEMENT WEATHER POLICY**

Living and going to school in certain states can sometimes be challenging due to the weather. There are times that attendance may be affected by the weather. The policy regarding attendance during those times is as follows:

1. If any of the clinical internship sites cancel patient treatments due to weather, clinical internship will be cancelled and no time deducted from the student (e.g. snow day).
2. If a student feels that they cannot attend clinical assignment due to weather, they must call the clinical site and communicate that decision. They will be able to use personal time or make up the time at a later date.

### **D-4: EMPLOYMENT OF MEDICAL DOSIMETRY STUDENTS**

1. Students may be employed in a clinical radiation oncology facility outside scheduled educational hours provided the work does not interfere with the educational program.
2. The student should not be involved in unsupervised treatment planning of patients.
3. The student employed during training is not covered by UWL liability insurance during hours worked as an employee.
4. If you are employed at the internship facility, an internship schedule must be established, documented, and maintained while enrolled in the program. This is to protect the student's educational experience and adhere to accreditation standards. Adherence to an established schedule is required or may result in student dismissal and disaffiliation.

### **D-5: RESPONSIBILITIES OF A STUDENT MEDICAL DOSIMETRIST**

The student medical dosimetrist is a member of an allied health team dedicated to the diagnosis and treatment of disease. Under the supervision of qualified practitioners (e.g., radiation oncologists, medical dosimetrists, medical physicists) and other related professionals (e.g., radiation therapists, nurses) the student receives didactic and clinical education in the art and science of medical dosimetry.

#### **Student's Responsibilities are:**

1. Contributing to the department and hospital in such a way as to promote the highest quality patient care by:
  - a. Treating all patients with the utmost care and respect
  - b. Adhering to all Federal, State, and local laws and regulations regarding the confidential nature of information concerning patients and their treatment in hospital
  - c. Being sensitive to the special needs and concerns of patients and their families
  - d. Ensuring the safety of patient, staff, personnel, and students. Carelessness cannot and will not be tolerated



- e. Accurately generate treatment planning according to the specifications and orders of the physicians and physicists
- f. Maintaining a high quality of work in both clinical and didactic areas
2. Obtaining proficiency in all areas of didactic and clinical education by:
  - a. Attending all classes and clinical assignments as scheduled
  - b. Completing didactic and clinical assignments on time
  - c. Participating in clinical activities under the direction of clinical instructors. Students generating treatment plans must be supervised by certified medical dosimetrists and/or certified medical physicists. Any information entered into the patient record must be double-checked and approved by qualified practitioners.
  - d. Students can be assured that, during UWL clinical internship hours, they will not be used in place of paid staff.
  - e. Using clinical time wisely and practicing skills when not participating in treatment planning
  - f. Accepting instruction and correction in a professional and positive manner
  - g. Utilizing all opportunities to improve skills and knowledge in the field of medical dosimetry
3. Demonstrating personal conduct indicative of a mature health care professional by:
  - a. Being prompt for class time, conferences and clinical rotations
  - b. Entering hospital/clinic in full student uniform with a valid name tag
  - c. Being dependable, accepting tasks and responsibilities as they are delegated
    - Students may not drink alcoholic beverages or use drugs that affect sensory or motor skills during school hours. Nor will students be allowed to let such use on personal time affect their performance during school hours
    - Treating the equipment with respect. Informing proper personnel of problems that may arise with equipment
  - d. Reporting any clinical mistakes to the proper authorities
  - e. Maintaining high ethical and moral standards in clinical and didactic experiences
  - f. Following policies and procedures of the clinical affiliate

- g. Abiding by hospital policies, as amended from time to time

**Students are Responsible to:**

1. Clinical Instructor
2. Clinical Preceptor
3. Clinical Coordinator
  - Program Director

## D-6: CLINICAL ASSIGNMENTS

Students will rotate through the following clinical areas to receive training and experience. They will track their rotations and procedures through an electronic clinical management system.

- **Dosimetry:** training in measurement, calculation, and optimization of dose delivery for treatments
- **CT Simulation:** initiation of treatment process while determining planning approach to treatment combined with determination of patient position and immobilization devices, scan parameters, design/fabrication of treatment devices, and documentation
- **Treatment Machines:** reproducibility of simulation; implementation of treatment planning and calculation parameters; evaluation of accurate and precise treatment delivery
- **Brachytherapy:** preparation of brachytherapy sources and equipment; assist in localization verification; execute treatment planning of intracavitary or interstitial brachytherapy procedures (HDR or LDR)
- **Special Procedures:** include procedures such as stereotactic radiosurgery, stereotactic radiotherapy, superficial treatments, total body or skin irradiation, respiratory gating, craniospinal irradiation
- **Radiation Measurements:** application of special methods of radiation measurements including ion chambers, TLD's, diodes, or film.
- **Chart Checks:** weekly checks of parameters in patient charts; ensuring proper treatment documentation
- **Quality Assurance:** routine QA procedures in department; QA of machines and equipment in the radiation oncology department

## D-7: COMPETENCIES

A master competency list is used by the student to track the progress of the required clinical competencies and can be found in the modules of each online clinical internship course and on the current student website. The completed form is submitted at the end of each semester.

It correlates with the number of clinical competencies successfully completed and the dates. An evaluation form within the electronic clinical management system must be filled out by the clinical instructor/preceptor. A check mark or signature on the tracking list does not demonstrate successful completion of a competency.

There is a specific evaluation form in Typhon to be completed by the clinical instructor/preceptor for each competency attempt. An example of each form is available to view by the student in the dosimetry clinical internship I, II, and III courses within Canvas and on the current student website. The evaluation forms are accessed and recorded electronically by the clinical instructor and can be viewed by the student when the evaluation is completed.

Each semester a designated number of competencies must be completed. To obtain credit for the required competencies the student must submit all completed competency forms (pass or fail) and the *Master Competency Checklist*

(<https://www.uwlax.edu/grad/medical-dosimetry/current-students/>) with Preceptor/Clinical Instructor Initials.

- Failing a competency will result in remediation.
- Failure to successfully complete all required competencies per semester will possibly result in a non-passing grade and could potentially result in dismissal from the program and/or remediation.
- Failing more than one competency from the master competency list constitutes program advisory committee review and probable dismissal from the program.

## D-8: OBSERVATIONS AND CRITICAL PROCEDURES

There are additional observations that are required during internship. These observations are listed in the Typhon system as critical procedures. These procedures can be observed/completed clinically with actual patient cases; however, there are specific labs and course assignments to satisfy the required observations/critical procedures. The student is responsible for logging the completed procedures in Typhon.

## D-9: STUDENT SUPERVISION POLICY

The medical dosimetry student must be supervised by a qualified practitioner (e.g., certified medical dosimetrist, credentialed medical physicist, licensed radiation oncologist) during all procedures that have direct patient contact.

All clinical procedures/tasks (e.g. dose calculations, treatment plans, etc.) performed by the students must be approved by a qualified practitioner prior to implementation.

## D-10: DRESS AND APPEARANCE STANDARDS

Dress and appearance standards depend upon policies at the clinical internship sites and will be shared with students during their clinical site orientation. Examples of dress codes are included below to give students guidance in preparing for the internship. Our clothing communicates to fellow staff and patients who we are in part and connotes professionalism or lack thereof. This should be considered in selection of apparel for school.

### UNIFORMS:

Are usually acceptable and would consist of the following:

- Women's dress or pants uniform. White pants with a colored top are acceptable.
- Men's uniform would consist of white pants and shirt (white or other color).

### LAB COATS:

- Lab coats are to be worn at all times when a uniform is not worn.
- Lab coats are to be neat and clean, white in color, and without holes.

### STREET CLOTHING:

- Clothing worn beneath a lab coat should be neat and clean. Clothing usually associated with leisure activities is not appropriate. (No blue jeans, shorts, leggings, collarless t-shirts with writing, halters or sweatpants may be worn).
- Clothing that restricts movement, inhibiting ability to do clinical duties, or is revealing or offensive to patients in any other way is prohibited.

### FOOTWEAR:

- Shoes, any color, clean and polished may be worn. Tennis or athletic shoes are acceptable if they are kept clean and in good condition.
- Sandals may not be worn for safety reasons.
- Hosiery is required at all times.

### SCRUB CLOTHING:

- May be worn as a uniform but must conform to the clinical site policies.

### GROOMING:

Because the condition and treatment of our patients make them sensitive to odors in many cases, good grooming is essential. Use of an effective deodorant without strong aroma is required. Perfumes and after shaves must also be selected with care as these too may be difficult for outpatients to tolerate. Hair, beards, and mustaches must be neatly groomed and clean. Depending on the internship site, body piercing (other than ears) may not be allowed.

### IDENTIFICATION:

Name tag/ID Badge will be worn regardless of type of uniform worn.

**A student who does not comply with these standards may be sent home to change. During the absence he/she will have to use personal time. If further incidents occur, harsher disciplinary action will take place.**

## SECTION E

### INFORMATION ABOUT EVALUATION AND ASSESSMENT

1. Students are evaluated periodically through the semester during clinical internship (based on full-time or part-time enrollment). Clinical instructors are evaluated by students at the end of each semester.
2. Students are evaluated with regard to professional development progress throughout the program.
3. Students will evaluate didactic courses/instructors at the end of each course (electronically).
4. Students will evaluate the program officials and the clinical site (preceptors, staff and facility) at the end of the year (electronically).
5. All evaluations completed by students will be done anonymously.
6. An evaluation form will be sent to graduates 12 months following graduation. The evaluation will seek follow-up information about how graduates are progressing in the professional field, their perceptions about the education received at UWL, and how their education prepared them for the Medical Dosimetrist Certification Board (MDCB) exam.
7. An evaluation form will be sent to graduates' employers 12 months following graduation if the graduate provides an employer email address. The evaluation will seek follow-up information about how the graduates are progressing in the professional field and how well prepared they were to enter the workforce.
8. Students are strongly urged to participate in evaluation exercises to assist the program officials in outcomes assessment and improvement of the program.
9. The program completes an annual outcomes assessment plan. Outcome measures that do not meet benchmarks will signal a need for revision, which will be addressed by the Program Officials and Advisory Committee.
10. The University of Wisconsin-La Crosse seeks accreditation from the Joint Review Committee on Education in Radiologic Technology (JRCERT). The advisory committee and program officials will evaluate any JRCERT evaluations/reports and discussions/decisions based on findings may bring about change in the program.

We appreciate the time and efforts of those who cooperate in completing the forms.

## SECTION F APPENDICES

### F-1: APPENDIX A

#### Characteristics & Abilities Essential to the Development of the Professional Medical Dosimetrist

##### Commitment to Learning: (Evidenced by)

- Showing respect to all instructors and being attentive in classes and professional meetings
- Eagerness to acquire understanding of concepts and development of skills
- Use of ongoing self-assessment to evaluate personal performance, knowledge and skills
- Seeking out constructive feedback and effectively using it for personal and professional improvement
- Exploration and Investigation to advance the professional knowledge base
- Maintaining competence in professional practice and development of competence with new technology
- Continuing education after graduation to maintain and update knowledge

##### Interpersonal and Communication Skills: (Evidenced by)

- Development of effective oral, written and non-verbal communication skills
- Implementation of effective communication skills in practice with patients, their families and radiation oncology team members
- Appropriate interactions with patients, families, colleagues and other health practitioners
- Empathy and compassion for patients and their families
- Promotion of a positive, collaborative practice atmosphere

##### Problem solving and Critical thinking: (Evidenced by)

- Ability to recognize and define problems, analyze data, develop and implement solutions and evaluate outcomes
- Ability to assess and evaluate situations, logically question, distinguish relevant from irrelevant issues and make appropriate judgments

- Application of problem solving and critical thinking skills to personal, patient related or work-related issues.

##### Effective use of time and resources: (Evidenced by)

- Ability to take initiative and make the most of personal, class, and clinical time to maximize their educational value
- Adaptability and creativity in making adjustments to schedule changes and resource availability

##### Professional conduct: (Evidenced by)

- Use of appropriate dress and appearance to enhance patient and peer confidence
- Adherence to the profession's accepted ethical standards
- Commitment to providing optimal care to all patients
- Dependability in attendance
- Responsibility in fulfilling commitments and in reporting errors
- Being accountable for decisions and actions
- Support of, and participation in professional organizations
- Providing a positive role model and professional image of Medical Dosimetrists to others in public and private settings

##### Stress Management

- Ability to identify sources of stress and cope effectively with them

## F-2: APPENDIX B

Revision 3

JUNE 1999

U.S. Nuclear Regulatory Commission

REGULATORY GUIDE 8.13; Reviewed 10/2011

(Draft was issued as DG-8014)

### A. INTRODUCTION

The Code of Federal Regulations in 10 CFR Part 19, "Notices, Instructions and Reports to Workers: Inspection and Investigations," in Section 19.12, "Instructions to Workers," requires instruction in "the health protection problems associated with exposure to radiation and/or radioactive material, in precautions or procedures to minimize exposure, and in the purposes and functions of protective devices employed." The instructions must be "commensurate with potential radiological health protection problems present in the workplace."

The Nuclear Regulatory Commission's (NRC's) regulations on radiation protection are specified in 10 CFR Part 20, "Standards for Protection Against Radiation"; and Section 20.1208, "Dose to an Embryo/Fetus," requires licensees to "ensure that the dose to an embryo/fetus during the entire pregnancy, due to occupational exposure of a declared pregnant woman, does not exceed 0.5 rem (5 mSv)." Section 20.1208 also requires licensees to "make efforts to avoid substantial variation above a uniform monthly exposure rate to a declared pregnant woman." A declared pregnant woman is defined in 10 CFR 20.1003 as a woman who has voluntarily informed her employer, in writing, of her pregnancy and the estimated date of conception.

This regulatory guide is intended to provide information to pregnant women, and other personnel, to help them make decisions regarding radiation exposure during pregnancy. This Regulatory Guide 8.13 supplements Regulatory Guide 8.29 PDF Icon, "Instruction Concerning Risks from Occupational Radiation Exposure" (Ref. 1), which contains a broad discussion of the risks from exposure to ionizing radiation.

Other sections of the NRC's regulations also specify requirements for monitoring external and internal occupational dose to a declared pregnant woman. In 10 CFR 20.1502, "Conditions Requiring Individual Monitoring of External and Internal Occupational Dose," licensees are required to monitor the occupational dose to a declared

pregnant woman, using an individual monitoring device, if it is likely that the declared pregnant woman will receive, from external sources, a deep dose equivalent in excess of 0.1 rem (1 mSv). According to Paragraph (e) of 10 CFR 20.2106, "Records of Individual Monitoring Results," the licensee must maintain records of dose to an embryo/fetus if monitoring was required, and the records of dose to the embryo/fetus must be kept with the records of dose to the declared pregnant woman. The declaration of pregnancy must be kept on file, but may be maintained separately from the dose records. The licensee must retain the required form or record until the Commission terminates each pertinent license requiring the record.

The information collections in this regulatory guide are covered by the requirements of 10 CFR Parts 19 or 20, which were approved by the Office of Management and Budget, approval numbers 3150-0044 and 3150-0014, respectively. The NRC may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number.

### B. DISCUSSION

As discussed in Regulatory Guide 8.29 (Ref. 1) PDF Icon, exposure to any level of radiation is assumed to carry with it a certain amount of risk. In the absence of scientific certainty regarding the relationship between low dose exposure and health effects, and as a conservative assumption for radiation protection purposes, the scientific community generally assumes that any exposure to ionizing radiation may cause undesirable biological effects and that the likelihood of these effects increases as the dose increases. At the occupational dose limit for the whole body of 5 rem (50 mSv) per year, the risk is believed to be very low.

The magnitude of risk of childhood cancer following in utero exposure is uncertain in that both negative and positive studies have been reported. The data from these studies "are consistent with a lifetime cancer risk resulting from exposure during gestation which is two to three times that for the adult" (NCRP Report No. 116, Ref. 2). The NRC has reviewed the available scientific literature and has concluded that the 0.5 rem (5 mSv) limit specified in 10 CFR 20.1208 provides an adequate margin of protection for the embryo/fetus. This dose limit reflects the desire to limit the total lifetime risk of leukemia and other cancers associated with radiation exposure during pregnancy.

In order for a pregnant worker to take advantage of the lower exposure limit and dose monitoring provisions specified in 10 CFR Part 20, the woman must declare her pregnancy in writing to the licensee. A form letter for declaring pregnancy is provided in this guide or the licensee may use its own form letter for declaring pregnancy. A separate written declaration should be submitted for each pregnancy.

## C. REGULATORY POSITION

### 1. Who Should Receive Instruction?

Female workers who require training under 10 CFR 19.12 should be provided with the information contained in this guide. In addition to the information contained in Regulatory Guide 8.29 (Ref. 1), this information may be included as part of the training required under 10 CFR 19.12.

### 2. Providing Instruction

The occupational worker may be given a copy of this guide with its Appendix, an explanation of the contents of the guide, and an opportunity to ask questions and request additional information. The information in this guide and Appendix should also be provided to any worker or supervisor who may be affected by a declaration of pregnancy or who may have to take some action in response to such a declaration.

Classroom instruction may supplement the written information. If the licensee provides classroom instruction, the instructor should have some knowledge of the biological effects of radiation to be able to answer questions that may go beyond the information provided in this guide. Videotaped presentations may be used for classroom instruction. Regardless of whether the licensee provides classroom training, the licensee should give workers the opportunity to ask questions about information contained in this Regulatory Guide 8.13. The licensee may take credit for instruction that the worker has received within the past year at other licensed facilities or in other courses or training.

### 3. Licensee's Policy on Declared Pregnant Women

The instruction provided should describe the licensee's specific policy on declared pregnant women, including how those policies may affect a woman's work situation. In particular, the instruction should include a description of the licensee's policies, if any, that may affect the declared pregnant woman's work situation after she has

filed a written declaration of pregnancy consistent with 10 CFR 20.1208.

The instruction should also identify who to contact for additional information as well as identify who should receive the written declaration of pregnancy. The recipient of the woman's declaration may be identified by name (e.g., John Smith), position (e.g., immediate supervisor, the radiation safety officer), or department (e.g., the personnel department).

### 4. Duration of Lower Dose Limits for the Embryo/Fetus

The lower dose limit for the embryo/fetus should remain in effect until the woman withdraws the declaration in writing or the woman is no longer pregnant. If a declaration of pregnancy is withdrawn, the dose limit for the embryo/fetus would apply only to the time from the estimated date of conception until the time the declaration is withdrawn. If the declaration is not withdrawn, the written declaration may be considered expired one year after submission.

### 5. Substantial Variations Above a Uniform Monthly Dose Rate

According to 10 CFR 20.1208(b), "The licensee shall make efforts to avoid substantial variation above a uniform monthly exposure rate to a declared pregnant woman so as to satisfy the limit in paragraph (a) of this section," that is, 0.5 rem (5 mSv) to the embryo/fetus. The National Council on Radiation Protection and Measurements (NCRP) recommends a monthly equivalent dose limit of 0.05 rem (0.5 mSv) to the embryo/fetus once the pregnancy is known (Ref. 2). In view of the NCRP recommendation, any monthly dose of less than 0.1 rem (1 mSv) may be considered as not a substantial variation above a uniform monthly dose rate and as such will not require licensee justification. However, a monthly dose greater than 0.1 rem (1 mSv) should be justified by the licensee.

## D. IMPLEMENTATION

The purpose of this section is to provide information to licensees and applicants regarding the NRC staff's plans for using this regulatory guide.

Unless a licensee or an applicant proposes an acceptable alternative method for complying with the specified portions of the NRC's regulations, the methods described in this guide will be used by the NRC staff in the

evaluation of instructions to workers on the radiation exposure of pregnant women.

## **REFERENCES**

1. USNRC, "Instruction Concerning Risks from Occupational Radiation Exposure," Regulatory Guide 8.29, Revision 1 PDF Icon, February 1996.
2. National Council on Radiation Protection and Measurements, Limitation of Exposure to Ionizing Radiation, NCRP Report No. 116, Bethesda, MD, 1993. INSTRUCTION CONCERNING PRENATAL RADIATION EXPOSURE



## Questions And Answers Concerning Prenatal Radiation Exposure

### 1. Why am I receiving this information?

The NRC's regulations (in 10 CFR 19.12, "Instructions to Workers") require that licensees instruct individuals working with licensed radioactive materials in radiation protection as appropriate for the situation. The instruction below describes information that occupational workers and their supervisors should know about the radiation exposure of the embryo/fetus of pregnant women.

The regulations allow a pregnant woman to decide whether she wants to formally declare her pregnancy to take advantage of lower dose limits for the embryo/fetus. This instruction provides information to help women make an informed decision whether to declare a pregnancy.

### 2. If I become pregnant, am I required to declare my pregnancy?

No. The choice whether to declare your pregnancy is completely voluntary. If you choose to declare your pregnancy, you must do so in writing and a lower radiation dose limit will apply to your embryo/fetus. If you choose not to declare your pregnancy, you and your embryo/fetus will continue to be subject to the same radiation dose limits that apply to other occupational workers.

### 3. If I declare my pregnancy in writing, what happens?

If you choose to declare your pregnancy in writing, the licensee must take measures to limit the dose to your embryo/fetus to 0.5 rem (5 millisievert) during the entire pregnancy. This is one-tenth of the dose that an occupational worker may receive in a year. If you have already received a dose exceeding 0.5 rem (5 mSv) in the period between conception and the declaration of your pregnancy, an additional dose of 0.05 rem (0.5 mSv) is allowed during the remainder of the pregnancy. In addition, 10 CFR 20.1208, "Dose to an Embryo/Fetus," requires licensees to make efforts to avoid substantial variation above a uniform monthly dose rate so that all the 0.5 rem (5 mSv) allowed dose does not occur in a short period during the pregnancy.

This may mean that, if you declare your pregnancy, the licensee may not permit you to do some of your normal job functions if those functions would have allowed you

to receive more than 0.5 rem, and you may not be able to have some emergency response responsibilities.

### 4. Why do the regulations have a lower dose limit for the embryo/fetus of a declared pregnant woman than for a pregnant worker who has not declared?

A lower dose limit for the embryo/fetus of a declared pregnant woman is based on a consideration of greater sensitivity to radiation of the embryo/fetus and the involuntary nature of the exposure. Several scientific advisory groups have recommended (References 1 and 2) that the dose to the embryo/fetus be limited to a fraction of the occupational dose limit.

### 5. What are the potentially harmful effects of radiation exposure to my embryo/fetus?

The occurrence and severity of health effects caused by ionizing radiation are dependent upon the type and total dose of radiation received, as well as the time period over which the exposure was received. See Regulatory Guide 8.29, "Instruction Concerning Risks from Occupational Exposure" (Ref. 3), for more information. The main concern is embryo/fetal susceptibility to the harmful effects of radiation such as cancer.

### 6. Are there any risks of genetic defects?

Although radiation injury has been induced experimentally in rodents and insects, and in the experiments was transmitted and became manifest as hereditary disorders in their offspring, radiation has not been identified as a cause of such effect in humans. Therefore, the risk of genetic effects attributable to radiation exposure is speculative. For example, no genetic effects have been documented in any of the Japanese atomic bomb survivors, their children, or their grandchildren.

### 7. What if I decide that I do not want any radiation exposure at all during my pregnancy?

You may ask your employer for a job that does not involve any exposure at all to occupational radiation dose, but your employer is not obligated to provide you with a job involving no radiation exposure. Even if you receive no occupational exposure at all, your embryo/fetus will receive some radiation dose (on average 75 mrem (0.75 mSv)) during your pregnancy from natural background radiation.

The NRC has reviewed the available scientific literature and concluded that the 0.5 rem (5 mSv) limit provides an adequate margin of protection for the embryo/fetus. This

dose limit reflects the desire to limit the total lifetime risk of leukemia and other cancers. If this dose limit is exceeded, the total lifetime risk of cancer to the embryo/fetus may increase incrementally. However, the decision on what level of risk to accept is yours. More detailed information on potential risk to the embryo/fetus from radiation exposure can be found in References 2-10.

### **8. What effect will formally declaring my pregnancy have on my job status?**

Only the licensee can tell you what effect a written declaration of pregnancy will have on your job status. As part of your radiation safety training, the licensee should tell you the company's policies with respect to the job status of declared pregnant women. In addition, before you declare your pregnancy, you may want to talk to your supervisor or your radiation safety officer and ask what a declaration of pregnancy would mean specifically for you and your job status.

In many cases you can continue in your present job with no change and still meet the dose limit for the embryo/fetus. For example, most commercial power reactor workers (approximately 93%) receive, in 12 months, occupational radiation doses that are less than 0.5 rem (5 mSv) (Ref. 11). The licensee may also consider the likelihood of increased radiation exposures from accidents and abnormal events before making a decision to allow you to continue in your present job.

If your current work might cause the dose to your embryo/fetus to exceed 0.5 rem (5 mSv), the licensee has various options. It is possible that the licensee can and will make a reasonable accommodation that will allow you to continue performing your current job, for example, by having another qualified employee do a small part of the job that accounts for some of your radiation exposure.

### **9. What information must I provide in my written declaration of pregnancy?**

You should provide, in writing, your name, a declaration that you are pregnant, the estimated date of conception (only the month and year need be given), and the date that you give the letter to the licensee. A form letter that you can use is included at the end of these questions and answers. You may use that letter, use a form letter the licensee has provided to you, or write your own letter.

### **10. To declare my pregnancy, do I have to have documented medical proof that I am pregnant?**

NRC regulations do not require that you provide medical proof of your pregnancy. However, NRC regulations do not preclude the licensee from requesting medical documentation of your pregnancy, especially if a change in your duties is necessary in order to comply with the 0.5 rem (5 mSv) dose limit.

### **11. Can I tell the licensee orally rather than in writing that I am pregnant?**

No. The regulations require that the declaration must be in writing.

### **12. If I have not declared my pregnancy in writing, but the licensee suspects that I am pregnant, do the lower dose limits apply?**

No. The lower dose limits for pregnant women apply only if you have declared your pregnancy in writing. The United States Supreme Court has ruled (in *United Automobile Workers International Union v. Johnson Controls, Inc.*, 1991) that "Decisions about the welfare of future children must be left to the parents who conceive, bear, support, and raise them rather than to the employers who hire those parents" (Reference 7). The Supreme Court also ruled that your employer may not restrict you from a specific job "because of concerns about the next generation." Thus, the lower limits apply only if you choose to declare your pregnancy in writing.

### **13. If I am planning to become pregnant but am not yet pregnant and I inform the licensee of that in writing, do the lower dose limits apply?**

No. The requirement for lower limits applies only if you declare in writing that you are already pregnant.

### **14. What if I have a miscarriage or find out that I am not pregnant?**

If you have declared your pregnancy in writing, you should promptly inform the licensee in writing that you are no longer pregnant. However, if you have not formally declared your pregnancy in writing, you need not inform the licensee of your non-pregnant status.

### **15. How long is the lower dose limit in effect?**

The dose to the embryo/fetus must be limited until you withdraw your declaration in writing or you inform the licensee in writing that you are no longer pregnant. If the declaration is not withdrawn, the written declaration may be considered expired one year after submission.

### 16. If I have declared my pregnancy in writing, can I revoke my declaration of pregnancy even if I am still pregnant?

Yes, you may. The choice is entirely yours. If you revoke your declaration of pregnancy, the lower dose limit for the embryo/fetus no longer applies.

### 17. What if I work under contract at a licensed facility?

The regulations state that you should formally declare your pregnancy to the licensee in writing. The licensee has the responsibility to limit the dose to the embryo/fetus.

### 18. Where can I get additional information?

The references to this Appendix contain helpful information, especially Reference 3, NRC's Regulatory Guide 8.29, "Instruction Concerning Risks from Occupational Radiation Exposure," for general information on radiation risks. The licensee should be able to give this document to you.

For information on legal aspects, see Reference 7, "The Rock and the Hard Place: Employer Liability to Fertile or Pregnant Employees and Their Unborn Children--What Can the Employer Do?" which is an article in the journal *Radiation Protection Management*.

You may telephone the NRC Headquarters at (301) 415-7000. Legal questions should be directed to the Office of the General Counsel, and technical questions should be directed to the Division of Industrial and Medical Nuclear Safety.

You may also telephone the NRC Regional Offices at the following numbers: Region I, (610) 337-5000; Region II, (404) 562-4400; Region III, (630) 829-9500; and Region IV, (817) 860-8100. Legal questions should be directed to the Regional Counsel, and technical questions should be directed to the Division of Nuclear Materials Safety.

## REFERENCES FOR APPENDIX B

1. National Council on Radiation Protection and Measurements, *Limitation of Exposure to Ionizing Radiation*, NCRP Report No. 116, Bethesda, MD, 1993.
2. International Commission on Radiological Protection, *1990 Recommendations of the International Commission on Radiological Protection*, ICRP Publication 60, Ann. ICRP 21: No. 1-3, Pergamon Press, Oxford, UK, 1991.
3. USNRC, "Instruction Concerning Risks from Occupational Radiation Exposure," *Regulatory Guide 8.29*, Revision 1, February 1996.(1) (Electronically available at <http://www.nrc.gov/reading-rm/doc-collections/reg-guides/>)
4. Committee on the Biological Effects of Ionizing Radiations, National Research Council, *Health Effects of Exposure to Low Levels of Ionizing Radiation (BEIR V)*, National Academy Press, Washington, DC, 1990.
5. United Nations Scientific Committee on the Effects of Atomic Radiation, *Sources and Effects of Ionizing Radiation*, United Nations, New York, 1993.
6. R. Doll and R. Wakeford, "Risk of Childhood Cancer from Fetal Irradiation," *The British Journal of Radiology*, 70, 130-139, 1997.
7. David Wiedis, Donald E. Jose, and Timm O. Phoebe, "The Rock and the Hard Place: Employer Liability to Fertile or Pregnant Employees and Their Unborn Children--What Can the Employer Do?" *Radiation Protection Management*, 11, 41-49, January/February 1994.
8. National Council on Radiation Protection and Measurements, *Considerations Regarding the Unintended Radiation Exposure of the Embryo, Fetus, or Nursing Child*, NCRP Commentary No. 9, Bethesda, MD, 1994.
9. National Council on Radiation Protection and Measurements, *Risk Estimates for Radiation Protection*, NCRP Report No. 115, Bethesda, MD, 1993.
10. National Radiological Protection Board, *Advice on Exposure to Ionising Radiation During Pregnancy*, National Radiological Protection Board, Chilton, Didcot, UK, 1998.
11. M.L. Thomas and D. Hagemeyer, "Occupational Radiation Exposure at Commercial Nuclear Power Reactors and Other Facilities, 1996," *Twenty-Ninth Annual Report, NUREG-0713*, Vol. 18, USNRC, 1998.

## Form Letter for Declaring Pregnancy

This form is provided for your convenience. To make your written declaration of pregnancy, you may fill in the blanks in this form letter, you may use a form letter the licensee has provided to you, or you may write your own letter.

### DECLARATION OF PREGNANCY

TO: \_\_\_\_\_

In accordance with the NRC's regulations at 10 CFR Part 20.1208, "Dose to an embryo/fetus," I am declaring that I am pregnant. I became pregnant in \_\_\_\_\_ (only the month and year need be provided).

I understand the radiation dose to my embryo/fetus during my entire pregnancy will not be allowed to exceed 0.5 rem (5 millisievert) (unless that dose has already been exceeded between the time of conception and submitting this letter). I also understand that meeting the lower dose limit may require a change in job or job responsibilities during my pregnancy.

\_\_\_\_\_  
Your Signature

\_\_\_\_\_  
Your name printed

\_\_\_\_\_  
Date

## REGULATORY ANALYSIS

A separate regulatory analysis was not prepared for this regulatory guide. A regulatory analysis prepared for 10 CFR Part 20, "Standards for Protection Against Radiation" (56 FR 23360), provides the regulatory basis for this guide and examines the costs and benefits of the rule as implemented by the guide. A copy of the "Regulatory Analysis for the Revision of 10 CFR Part 20" (PNL-6712, November 1988) is available for inspection and copying for a fee at the NRC Public Document Room, 2120 L Street NW, Washington, DC, as an enclosure to Part 20 (56 FR 23360).

1. Single copies of regulatory guides, both active and draft, and draft NUREG documents may be obtained free of charge by writing the Reproduction and Distribution Services Section, OCIO, USNRC, Washington, DC 20555-0001, or by fax to (301) 415-2289, or by email to (DISTRIBUTION@NRC.GOV). Active guides may also be purchased from the National Technical Information Service on a standing order basis. Details on this service may be obtained by writing NTIS, 5285 Port Royal Road, Springfield, VA 22161. Copies of active and draft guides are available for inspection or copying for a fee from the NRC Public Document Room at 2120 L Street NW., Washington, DC; the PDR's mailing address is Mail Stop LL-6, Washington, DC 20555; telephone (202)634-3273; fax (202)634-3343.
2. Copies are available at current rates from the U.S. Government Printing Office, P.O. Box 37082, Washington, DC 20402-9328 [telephone (202) 512-1800]; or from the National Technical Information Service by writing NTIS at 5285 Port Royal Road, Springfield, VA 22161. Copies are available for inspection or copying for a fee from the NRC Public Document Room at 2120 L Street NW, Washington, DC; the PDR's mailing address is Mail Stop LL-6, Washington, DC 20555; telephone (202) 634-3273; fax (202)634-3343.

## F-3: APPENDIX C

Students have the right to submit allegations against a JRCERT-accredited program if there is reason to believe that the program has acted contrary to JRCERT accreditation standards or that conditions at the program appear to jeopardize the quality of instruction or the general welfare of its students. The individual must first attempt to resolve the complaint directly with institution/program officials by following the grievance procedures provided by the institution/program.

### Joint Review Committee on Education in Radiologic Technology (JRCERT)

#### Process for Reporting Allegations

[www.jrcert.org/students/process-for-reporting-allegations/report-an-allegation](http://www.jrcert.org/students/process-for-reporting-allegations/report-an-allegation)

The JRCERT cannot advocate on behalf of any student(s). An investigation into allegations of non-compliance addresses only the program's compliance with accreditation standards and will not affect the status of any individual student.

The investigation process may take several months.

The JRCERT will not divulge the identity of any complainant(s) unless required to do so through legal process.

#### PROCESS:

1. Before submitting allegations, the individual must first attempt to resolve the complaint directly with program/institution officials by following the due process or grievance procedures provided by the program/institution. Each program/institution is required to publish its internal complaint procedure in an informational document such as a catalog or student handbook. (Standard One, Objective 1.6)
2. If the individual is unable to resolve the complaint with program/institution officials or believes that the concerns have not been properly addressed, he or she may submit allegations of non-compliance to the JRCERT:

Chief Executive Officer  
 Joint Review Committee on Education in Radiologic Technology  
 20 North Wacker Drive, Suite 2850  
 Chicago, IL 60606-3182  
 Ph: (312) 704-5300  
 Fax: (312) 704-5304  
 e-mail: mail@jrcert.org

3. The Allegations Reporting Form must be completed and sent to the above address with required supporting materials. All submitted documentation must be legible.
4. Forms submitted without a signature or the required supporting material will not be considered.
5. If a complainant fails to submit appropriate materials as requested, the complaint will be closed.

The Higher Education Opportunities Act of 2008, as amended, provides that a student, graduate, faculty or any other individual who believes he or she has been aggrieved by an educational program or institution has the right to submit documented allegation(s) to the agency accrediting the institution or program.

The JRCERT, recognized by the United States Department of Education for the accreditation of radiography, radiation therapy, magnetic resonance, and medical dosimetry educational programs investigates allegation(s) submitted, in writing, signed by any individual with reason to believe that an accredited program has acted contrary to the relevant accreditation standards or that conditions at the program appear to jeopardize the quality of instruction or the general welfare of its students.

Updated 2018

## F-4: APPENDIX D

### Disclosure of Possible Bar from Clinical\* Experiences Policy

Students applying to Health Professions Department programs with an arrest (with charge pending) and/or a conviction as noted in the Department of Justice record may be barred from engaging in the required clinical placements. Failure to disclose an arrest (with charge pending) and/or a conviction that subsequently appears on the Department of Justice record may also bar the student from clinical placements. It is the clinical sites' prerogative to accept or deny clinical rotations to students with an arrest (with charge pending) and/or a conviction.

It is the student's responsibility to inform the program and/or college of any changes in his/her criminal history during the course of his/her education.

It is the policy of the Health Professions Department to notify a student with an arrest (with charge pending) and/or a conviction that s/he may not be able to complete the required clinical experiences to earn a degree.

The student shall be required to read and sign the Disclosure of Possible Bar from Clinical Experiences waiver.

#### PROCEDURE:

1. If a student has an arrest (with charge pending) and/or a conviction, the Program Director will meet with the student to discuss the situation. The student will be advised as to his/her options.
2. It will be the student's decision as to whether or not he/she will begin/continue in the program.
3. The student and Program Director will sign the Disclosure of Possible Bar from Clinical Experiences waiver.

If the student chooses to begin/continue his/her education, the student is not guaranteed a clinical site can be obtained. Each program will follow its own written policy for the number of sites contacted to find a clinical placement. The fieldwork educator will follow a script, written by the Program Director with student input, when contacting the site. If the site(s) deny the student for clinical education based upon the results of the background check, the student cannot continue with the clinical education portion of the program or subsequent courses in which clinical education is a prerequisite. Acceptance for clinical placement during one rotation does not guarantee subsequent clinical placements.

\*For clarification purposes, the term "clinical" can be used interchangeably with the terms "internship", "practicum" or "fieldwork".

## Disclosure of Possible Bar from Clinical\* Experiences Waiver

I have been notified that because of my arrest (with charge pending) and/or conviction record I may not be able to complete the required clinical experiences needed to complete the \_\_\_\_\_ program.

I am aware that the program may require clinical experiences at multiple facilities and that acceptance at one facility does not guarantee acceptance for subsequent required clinical experiences at different facilities. I am aware that it is the clinical sites' prerogative to accept or deny clinical rotations to students with an arrest (with charge pending) and/or conviction record.

I acknowledge that it is my decision whether or not I choose to begin or continue the program based on the knowledge that I may not be able to participate in clinicals. I am aware that I must also meet other division and program policies regarding grades, conduct, etc.

I am aware that it is my responsibility to inform the program and/or college of any changes in my arrest (with charge pending) and/or conviction record during the course of my education.

I understand that even if I am able to complete the required clinical experiences and earn a degree, my arrest (with charge pending) and/or conviction record may affect my eligibility to take state or national certification and/or licensure exams.

\_\_\_\_\_  
Student Signature

\_\_\_\_\_  
Program Director

\_\_\_\_\_  
Date

\_\_\_\_\_  
Date

\_\_\_\_\_  
Student Printed Name

\*For clarification purposes, the term "clinical" can be used interchangeably with the terms "internship", "practicum" or "fieldwork".



