Cuyahoga Community College
Radiography Program
Associate of Applied Science Degree

Application Packet

Program Website
www.tri-c.edu/radiography

Disclaimer
The contents of this packet were revised as of December 2015. All information is subject to change. For questions, please contact the Radiography Program Manager at 216-987-5264.
Dear Applicant:

Thank you for your interest in the Radiography Program (Program). Please read this packet and review the Program’s website (www.tri-c.edu/radiography) thoroughly before applying to the Program.

All admission requirements, including core courses, overall and core grade point average requirements and TOEFL scores (if required; see page 12), must be completed prior to submitting an application to the Program. An application submitted before all admission requirements are complete will not be processed.

The Health Careers Program Application can be accessed from the Program website; it is not included in this packet. Click on the link “Apply to Health Careers” and follow the instructions on the application. Applications should be mailed or delivered to the address on the application. Applications are accepted on a rolling admission basis.

Following submission of the Health Careers Program Application, the Health Careers Enrollment Center will review your application and if you meet all admission requirements, your application will be forwarded to the Program. Following an additional review by the Program, you will receive an email to the email address you placed on the Health Careers Enrollment Application. The email will inform you of your acceptance status and if accepted into the Program, provide you with a projected start date.

Questions about the application process should be directed to the Health Careers Enrollment Center at (216) 987-4247.

Questions about the Program should be directed to the Radiography Program Manager at (216) 987-5264.

Sincerely,

Elizabeth Gildone, M.Ed., R.T. (R)(CT), GCDF
Program Manager, Radiography
College Mission Statement
To provide high quality, accessible and affordable educational opportunities and services - including university transfer, technical and lifelong learning programs - that promote individual development and improve the overall quality of life in a multicultural community.

Radiography Program Mission Statement
To provide learning opportunities that prepare the student to become a competent radiographer in the medical imaging profession.

Radiography Program Accreditation
The Program is accredited by the Joint Review Committee on Education in Radiologic Technology (JRCERT), 20 N. Wacker Dr., Suite 2850, Chicago, IL 60606-3182; 312-704-5300; www.jrcert.org. The program complies with the JRCERT Standards for an Accredited Program in Radiologic Technology. The Standards can be viewed at www.jrcert.org.

Radiography Program Goals and Student Learning Outcomes
The Program has established goals and student learning outcomes in accordance with JRCERT Standards. The Program establishes benchmarks and utilizes a variety of tools to assess whether student learning outcomes are achieved. Tools include but are not limited to student assignments, exams and laboratory assessments, the Evaluation of Technical Skills and Professional Behavior clinical form, the Clinical Portfolio and employer, graduate, and exit surveys.

Goal: Students will demonstrate clinical competency.
Student Learning Outcomes: Students will operate radiographic equipment to produce quality images.
Students will practice patient care including radiation safety.
Students will perform diagnostic imaging procedures for a diverse population of patients.

Goal: Students will demonstrate critical thinking and problem solving skills.
Student Learning Outcomes: Students will demonstrate the ability to make decisions and use independent judgment.
Students will perform computer skills essential to the functions of a radiology department.

Goal: Students will demonstrate communication skills.
Student Learning Outcomes: Students will display effective communication skills using verbal/written communication to provide patient care.
Students will provide patient/public education related to radiographic procedures and radiation protection.

Goal: Students will demonstrate professional development.
Student Learning Outcomes: Students will demonstrate professional, ethical behavior as a radiographer.
Students will prepare to enter the profession as a Registered Radiographer committed to professional development.
Program Performance

In addition to the Program goals and student learning outcomes listed above, the performance of the Program is reflected through Program Effectiveness Data as defined by the JRCERT. Program Effectiveness Data includes the program completion rate, credentialing examination pass rate and job placement rate. Explanations of these measures and current Program data can be obtained on the Program’s website, www.tri-c.edu/radiography or at www.jrcert.org/resources/program-effectiveness-data. Questions about Program data should be directed to the Radiography Program Manager.

Professional Certification and Licensure

Through completion of the Program, the graduate is prepared to take the national certification examination conducted by the American Registry of Radiologic Technologists (ARRT). State of Ohio law requires all radiographers be licensed. Radiographic licenses are obtained by applying to the Ohio Department of Health after ARRT certification is obtained.

Equal Opportunity Educational Program

In conformance with the state and federal guidelines, the Radiography Program at Cuyahoga Community College (College) is an equal opportunity educational program. The Program does not discriminate on the basis of age, ancestry, color, disability, military status, national origin, race, religion, sex, sexual orientation, gender identity and expression, pregnancy, veteran status and genetic information. In compliance with FERPA guidelines and in order to protect the privacy of its students, the release of information to third parties may occur only after receiving written permission from the student.

Delayed Entry List (Waiting List) and Limited Enrollment Program Capacity

The limited enrollment capacity of the Program, like other health career programs at Cuyahoga Community College, means that not all students who apply and are accepted can begin the Program immediately. This results in the existence of a delayed entry or “waiting” list. The number of students accepted into the Program is determined by a number of factors, the primary one being the availability of space in the Program's clinical affiliates. It is likely that there may be some qualified applicants who cannot be accommodated by the Program immediately. These applicants will be accepted, placed on the delayed entry list and given a projected entry date. The Program website indicates the semester for which the Program is accepting applicants based on the length of its delayed entry list. The Program does not maintain separate delayed entry lists for the daytime and evening/weekend tracks of the Program.

Students are not placed on the delayed entry (waiting) list until all admission requirements are met and the student formally applies to and is accepted into the Program.

The average length of time a student is on the delayed entry list is approximately one year. While there is no guarantee, it is possible that students may be contacted by the Program prior to their projected entry date to inquire if they would be able to begin the Program sooner. This occurs when students ahead of them on the delayed entry list choose not to pursue the Program. Students are contacted in the order in which they were placed on the delayed entry list. While a student may be contacted about an earlier entry date, the student is under no obligation to begin the Program earlier than their original projected entry date.

In addition, acceptance into radiography academic classes does not guarantee immediate clinical placement due to variables affecting clinical site capacity.

Students on the delayed entry list are encouraged to:

1. Complete remaining associate of applied science (AAS) degree requirements. See the College Catalog or meet with a counselor in the Counseling Office for a list of AAS degree requirements. Note that degree requirements may change over time and are determined by the semester in which a
student begins the Program. Note that BIO 2200 (Radiobiology) and PHYS 2250 (Radiographic Physics and Quality Control) may NOT be taken prior to beginning the Program; they must be taken concurrently with designated radiography courses in specific semesters.

2. Take courses or attend counseling center student success workshops that will support academic success in the Program. GEN-1022, Strategies for Success, is highly recommended.

3. Read Becoming a Radiologic Technologist by Jeremy Enfinger, R.T. (R). This short, inexpensive book contains a wealth of advice and information. It is available for loan through the Western Campus library or for purchase through Amazon.com in hard copy and e-book editions. It is a must-read for prospective radiography students.

4. Pursue short-term certificate programs that will complement their radiography training and enhance their professional preparation (e.g. Phlebotomy Short-Term Certificate [www.tri-c.edu/phlebotomy], the Leadership Certification Program through the Office of Student Life).

5. Obtain volunteer experience in a hospital if they do not already have exposure to the healthcare environment. Contact the hospital’s volunteer department directly to explore these opportunities.

6. Adjust their employment and personal commitments with the understanding that once they enter the Program, they will be committed to a full-time program (in terms of time commitment) that is significantly more challenging than what they experienced when completing their core courses.

7. Take courses that will apply to a bachelor degree. If a student receives financial aid, this option should be discussed with the Office of Financial Aid to determine if/how a student’s financial aid award may be affected.

**Mandatory Program Information Sessions**

Students are required to attend a Radiography Program Information Session prior to entering the Program. Attendance at an information session does NOT need to be completed prior to applying but must be completed prior to Program entry. Sessions are held each semester and are posted on the Program’s webpage: www.tri-c.edu/radiography. Students are encouraged to bring a support person. Students must sign in to document their attendance and attend the entire session.

Sessions are designed to help students prepare for success in the Program. Students with an interest in health careers but are uncertain which one is right for them are welcome to attend. During the session, students will learn important information about the Program, hear from current students and/or recent graduates and tour the radiography lab.

**Essential Functions of a Radiography Student**

Below is a list of the essential functions for entrance into and progression through the Program. While not definitive, this list is meant to provide an overview of what is expected of each student. The functions are essential to support the job responsibilities of the radiologic technologist as defined in the American Registry of Radiologic Technologists’ Task Inventory for Radiography (www.arrt.org). When applicable, each student’s circumstances and ability to meet requirements will be evaluated on a case-by-case basis according to College and Program policies. If appropriate, accommodations will be made. Additionally, each clinical site may have its own requirements.

The radiography profession requires extensive, direct patient care in a fast-paced, constantly changing clinical environment. Radiography students must be able to handle the physical, psychological and emotional demands of this type of work. Students must possess the following characteristics and abilities in order to be successful in the Program and the profession.

1. Must be able to handle the physical and psychological requirements of radiography student

2. Demonstrate the ability to manipulate radiographic supplies/equipment and adjust the radiographic tube, which is at a height of 76 - 80 inches from the floor.
3. Understand and manipulate spatial distances, spatial relationships and alignment/angulation of imaging equipment and patient anatomy.

4. Recall and perform radiographic skills in an organized, sequential manner in a timeframe deemed appropriate by the Program based on clinical parameters.

5. Lift, carry and manipulate radiographic accessories and up to five imaging receptors which can weigh up to 50 pounds.

6. Transfer and skillfully position patients who may weigh in excess of 300 pounds.

7. Transport a mobile radiography machine for bedside radiographs.

8. Give clear commands at a sufficient volume to the patient who is positioned for the radiograph at a distance 6 to 20 feet from the technologist control area.

9. Must be able to clearly read and adjust the radiographic control panel, correctly position the patient and observe them from a distance of 6 to 20 feet.

10. Must to be able to respond to a patient from a distance of 6 to 20 feet.

11. Must not be highly allergic to developer or fixer chemicals, contrast media and/or latex products.

12. Must not be chemically dependent.

13. Must react rapidly and appropriately in emergency situations.

14. Be poised, neat, well-groomed, tactful, discreet, flexible, ethical, professional, and dependable.

15. Be able to understand and follow instructions completely in the academic and clinical settings.

16. Demonstrate the capacity for calm and reasoned judgment in the academic and clinical settings.

17. Perform in life and death situations.

18. Demonstrate integrity and honesty in all matters.

19. Enjoy patient contact and working with people.

**Student Commitment**

1. **The Program is a very rigorous and comprehensive combination of academic course work, lab practice/competency demonstration and clinical training. Radiography students express that the amount and level of work required in the Program is significantly greater than what was required while taking prerequisite coursework.**

2. Students must achieve a minimum of a ‘C’ grade in all Program coursework. Courses in which a ‘D’ or ‘F’ grade is earned may result in Program academic probation and/or dismissal from the Program in accordance with the Program’s academic policies. The Program’s grading scale is below.

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<thead>
<tr>
<th>%</th>
<th>Grade</th>
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<tbody>
<tr>
<td>95 up to 100</td>
<td>A</td>
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<tr>
<td>85 up to 95</td>
<td>B</td>
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<tr>
<td>75 up to 85</td>
<td>C</td>
</tr>
<tr>
<td>70 up to 75</td>
<td>D</td>
</tr>
<tr>
<td>Below 70</td>
<td>F</td>
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3. The Program’s attendance and tardiness requirements for classes, labs and clinicals are stringent and are designed to prepare students for the expectations of healthcare employers. Repeated absences and/or tardiness will result in point deductions that can affect course grades.

4. While enrolled in the academic semesters, students are required to attend lectures, labs and additional practice lab sessions. **Regular attendance, study and active participation in all aspects of didactic coursework are critical to the student’s retention of information and academic**
success. A general rule of thumb is that for every hour spent in the classroom or lab, a student should expect to engage in at least two hours of study time. If one’s schedule does not permit this level of commitment, it is important to reconsider the feasibility of pursuing the Program.

5. While enrolled in clinical semesters, students are assigned rotations at one of the Program’s clinical affiliates. Students attend clinicals 40 hours per week (33 hours/week for evening/weekend track students); therefore, full-time employment is strongly discouraged and can significantly impact a student’s ability to succeed in the Program. Employment must be scheduled so as not to interfere with class, lab and clinical hours. Class, lab and clinical hours will not be adjusted to accommodate a student’s employment/personal schedule. Flexibility in one’s schedule is essential and having a strong personal support system is important.

6. The Program requires participation in occasional meetings outside of a student’s class/lab/clinical schedule. Examples include orientation sessions and clinical assignment meetings.

7. Students must adhere to a Program calendar which is provided at the beginning of the Program. The calendar details each semester including semester begin/end dates, breaks, etc.

8. A student’s physical appearance must convey professionalism and competence. It is important to remember that a professional image is conveyed not only by what is worn, but also by what is NOT worn. The healthcare environment demands certain standards of appearance which may require students to set aside their personal styles and preferences in the lab and clinical setting in order to comply with professional and safety standards. Students will be required to follow the dress code established by the assigned clinical facility while in their clinical rotations.

9. Clinical rotation schedules will be provided to students in advance to allow for planning employment and personal schedules. During the course of the entire clinical training students should expect to rotate to different clinical sites in the greater Cleveland area. Students must have reliable transportation and must be willing to commute to new or unfamiliar locations.

Frequently Asked Questions

What is a radiographer?

A radiographer, or radiologic technologist, is a healthcare professional who provides an essential service for the diagnosis and treatment of injury and disease. A radiographer administers radiation in the form of x-rays to create images (radiographs) of the human body for use in diagnosing medical conditions.

Responsibilities of the radiographer include adjusting equipment to the correct settings for each radiographic procedure, positioning the patient, manipulating equipment for proper imaging and providing radiation protection. Radiation, when used by uneducated persons, can be dangerous to the patient and the user. The trained radiographer understands radiation principles and knows how to safely produce quality diagnostic examinations while protecting both the patient and the radiographer. In carrying out these responsibilities, the radiographer must apply knowledge of physics, anatomy and physiology, patient care and other related radiographic principles that are included in the Program curriculum.

Individuals interested in a career as a radiographer need a strong science and math background. They must have a genuine interest in working with people, have excellent communication skills and be able to adapt to a variety of situations. They must act with professionalism, compassion, accuracy and discernment. They must be able to apply the knowledge and skills learned in the classroom and lab to the unpredictable and ever-changing hospital environment.

What employment and career opportunities are available?

Registered radiographers can find a wide market for their acquired professional and technical skills. Opportunities for employment are available throughout the country. Graduates may work in hospitals, clinics, surgical centers and urgent care facilities providing services to patients around the clock. Qualified radiographers may also find job opportunities in education, civil service, industry and commercial sales/
training. As is the case for many health care professions, the demand for radiographers fluctuates from time to time due to variables affecting the healthcare industry as a whole.

The hourly rate for a new graduate ranges from $18.00 to $25.00 per hour. The annual salary ranges from $36,000 - $50,000 for a new graduate. Typically, salaries are higher on evening or night shifts and/or in hospitals and may be lower in physician practices. The hourly rate of a PRN position (“as needed” schedule and without employer benefits) is typically higher than the hourly rate for a full-time or part-time position with benefits.

Graduates with an Associate of Applied Science Degree in Radiography may continue their education to earn a bachelor’s degree. Advanced degrees enable radiographers to move into positions in management, education, industry and government. Continuing technical education and/or clinical experiences are available for technologists interested in becoming an interventional technologist, computed tomography (CT) technologist, mammographer, and/or magnetic resonance imaging (MRI) technologist. With continuing formal technical education, a radiographer can become a nuclear medicine technologist, a radiation therapist or a diagnostic medical sonographer.

Is financial aid available?

Students may qualify for federal or state programs and some health career professional organizations offer specific scholarships upon admission to the Program. For more information, contact:

Financial Aid Office at the Western Campus 216-987-5100
http://www.tri-c.edu/paying-for-college/financial-aid-and-scholarships

College Now Greater Cleveland 216-241-5587
www.collegenowgc.org

American Society of Radiologic Technologists 800-444-2778
www.asrt.org

Ohio Society of Radiologic Technologists 866-405-6778
www.osrt.org

When can I apply to the Program?

Applicants should submit the Health Careers Program Application only after all admission requirements have been met. See page 10 for admission requirements. Following submission of the Health Careers Program Application which is downloadable from the Program website (www.tri-c.edu/radiography), the Health Careers Enrollment Center will review the application and if all admission requirements are met, the application will be forwarded to the Program. Following an additional review by the Program, applicants will receive an email to the email address they placed on the Health Careers Enrollment Application informing them of their acceptance status and providing them with a projected start date.

How many applications are received each year? How many students are accepted?

The Program averages 75 - 100 applications annually. For the daytime track, the Program accepts students twice each year (fall semester [August] and spring semester [January]). For the evening/weekend track, the Program accepts students once each year for the fall semester (August). Maximum class size for the daytime track is 19 to 24 students. The evening/weekend track accepts a maximum of 8 students. Applicants must keep their contact information current with the College and Program. Failure to do so could result in the Program’s inability to contact the student regarding Program admission.

How long is the Program? Can it be completed on a part-time basis?

The Program is a two-year Associate of Applied Science Degree Program. Students can complete core (prerequisite) and degree requirements on a part-time basis. However, once accepted into the Program, a full-time commitment is necessary to complete the required number of clinical hours and variety of clinical
procedures. **While the credit hours per semester reflect a part-time status (< 12 credits/semester), the time commitment required is that of a full-time student.** The Program offers two tracks: daytime and evening/weekend. See below for detailed track information.

**What is the schedule for the daytime track?**

The Program is six semesters in length and includes two summer semesters. Academic classes and labs are held the first, third and fifth semesters at the western campus in Parma. Classes are generally held between the hours of 8:00 AM and 5:00 PM, Monday through Friday. The second, fourth, and sixth semesters are clinical semesters requiring 40 hours per week at a hospital facility. Clinical hours are generally during the day with starting times varying from 7:00 to 8:00 AM. Other rotations include 11:30 AM to 8:00 PM and evening rotations of 2:30 to 11:00 PM. Students are not scheduled for clinicals on weekends or College-recognized holidays.

**What is the schedule for the evening/weekend track?**

The evening/weekend track requires students to have significant flexibility in their schedules because some daytime clinical hours are required. Evening/weekend students are only accepted for the fall semester and enrollment is limited. The evening/weekend track mirrors the daytime track with respect to the on-campus academic classes and the total number of clinical hours obtained at the clinical sites. The timeframe in which the clinical hours are obtained differs between the two tracks.

Evening/Weekend Academic Class/Lab Schedule: Academic classes and labs are held the first, third, and fifth semesters at the western campus in Parma. The evening/weekend track academic classes and labs are held Monday through Friday evenings between the hours of 5:00 and 11:00 PM. Hours may vary depending on the semester.

Evening/Weekend Clinical Schedule: The second, fourth, and sixth semesters are exclusively clinical semesters. It is necessary for some clinicals to be held during intersession terms (between semesters) to ensure students have sufficient exposure to the variety of clinical procedures required. During clinical semesters, clinicals are held Monday through Friday evenings for five (5) hours each evening. Starting time is between the hours of 4:30 and 6:00 PM and is dependent on the clinical site. There is also an 8-hour scheduled Saturday clinical rotation each week which may be scheduled during daytime or evening hours at the discretion of the Program and/or clinical site.

In May of the first year of the program, between the spring and summer semesters, there is a daytime intersession clinical requiring 80 hours over the course of two designated weeks. The total number of clinical hours in any given week will not exceed 40.

In December and January of the second year of the Program, between the fall and spring semesters, there is a daytime intersession clinical requiring 80 hours over the course of two designated weeks. The total number of clinical hours in any given week will not exceed 40.

During the final 10-week summer clinical semester students in the evening/weekend track will complete their clinical hours on the daytime rotation, Monday through Friday, 40 hours per week.

**Can I work while attending the Program?**

Full-time employment is **strongly discouraged** and can significantly impact a student’s ability to succeed in the Program. Employment must be scheduled so as not to interfere with class, lab and clinical hours. Class, lab and clinical hours will not be adjusted to accommodate a student’s employment schedule. Flexibility in one’s work schedule is essential and having a strong personal support system is important.

**Can I transfer credits from another college or university?**

Generally, yes. Students should schedule an appointment with a counselor after their transcripts have been forwarded to and evaluated by the College. Many degree requirement courses may transfer; however, not all courses transfer directly. It is important that students confirm course transferability with the counseling center and complete a course substitution/course waiver form if instructed to do so. Counseling appointments can be scheduled by calling (800) 954-8742, option #4.
If I already have college credits, can I complete the Program in less than two years?

No. Students must complete the Program's six-semester radiography course sequence (including two summer semesters), in order to fulfill the Program's academic and clinical requirements. Students are strongly encouraged to complete the non-radiography degree requirements prior to entering the Program.

What courses are included in the Program?

The Program's Suggested Semester Sequence is provided on pages 14 and 15 in this packet. Program specialty courses are those that begin with the prefix RADT and also include BIO 2200 and PHYS 2250. Course descriptions are available in the Cuyahoga Community College Catalog.

Radiography Program Admission Requirements

Applicants must complete all of the following admission requirements. Applications will be processed once all requirements have been met.

A. College Admission for Application

If an applicant has not previously attended Cuyahoga Community College, he/she must submit a completed Application for Admission, an official high school transcript or official General Education Development (GED) certificate and official transcripts from all colleges and universities attended. Upon receipt and approval of the application, a letter will be sent indicating admission to Cuyahoga Community College as a general admission student. This admission letter does not admit a student into restricted programs like the Radiography Program.

Applicants who are full-time students at Cuyahoga Community College do not need to submit another application for admission to the College nor do they need to resubmit any transcripts that were previously submitted to the College. However, transcripts that reflect coursework taken elsewhere following admission to Cuyahoga Community College should be submitted.

Part-time students should submit their high school transcript/GED certificate along with all other official transcripts from colleges and universities they have attended (if they had not done so previously) to the Office of the Registrar (see address below). It is not necessary to reapply for admission to the College.

B. High School Transcript/GED Certificate

All Program applicants must be graduates of an accredited high school in the United States or have successfully obtained a GED certificate. The official high school transcript or GED certificate should be sent directly to the Office of the Registrar (see address below).

C. College Transcripts for General Admission

Cuyahoga Community College must have official transcripts from all schools, colleges, and universities attended sent directly to the Office of the Registrar:

Office of the Registrar
Cuyahoga Community College
P.O. Box 5966
Cleveland, Ohio 44101-0966

Allow a minimum of 6 to 8 weeks for transcript evaluation. Applicants will receive an email from the College notifying them when the evaluation of their transfer credit has been completed.

Foreign transcripts should be submitted early for evaluation and translation. Contact the Enrollment Center for specific guidelines for the evaluation of foreign transcripts. Contact
information for the Enrollment Center can be found by calling (800) 954-8742 or by visiting http://www.tri-c.edu/enrollment-center.

D. Health Careers Program Application

In order to be considered for acceptance into the Radiography Program, applicants are required to complete the Health Careers Program Application which can be accessed from the Program website (www.tri-c.edu/radiography). This application should NOT be submitted until all admission requirements (core courses, GPA's, etc.) have been completed. The application should be mailed to the Health Careers Enrollment Center on the metropolitan campus at the address listed on the application.

Applicants do not need to resubmit an official high school transcript, GED certificate and college/university transcripts if they were previously sent to and formally evaluated by the College and their receipt can be verified by the Health Careers Enrollment Center.

E. Academic Requirements

1. High school graduate or successful completion of GED equivalency.

2. Completion of core courses with cumulative core GPA of 2.5 or higher. Core courses may be repeated only once to improve a grade below a “C.” Core courses include:

   BIO 1221 Anatomy & Physiology for Diagnostic Medical Imaging or transfer equivalent. BIO 2331 AND BIO 2341 will be accepted as a substitute for BIO 1221. Grade(s) of “C” or better.

   DMS 1351 Patient Care Skills or transfer equivalent. Grade of “C” or better. Note that this course cannot be waived by possession of a medical credential or work experience (e.g. STNA, medical assistant, etc.)

   ENG 1010 College Composition I or transfer equivalent. Grade of “C” or better.

   MA 1020 Medical Terminology I or transfer equivalent. Grade of “C” or better.

   MATH 1240\(^1\) Contemporary Mathematics (or higher) or transfer equivalent. Grade of “C” or better.

   PSY 1010 General Psychology or transfer equivalent. Grade of “C” or better

\(^1\) MATH 1240 Contemporary Mathematics (3 credits) or higher will become a Program admission requirement effective fall 2016. Math 1270 or higher will be accepted as a substitute for MATH 1240 for students who completed the math requirement prior to the fall 2016 semester.

Courses used as core courses for the health career and nursing programs must have a traditional letter grade. The pass/no pass option for core courses will not be accepted by the health career and nursing programs.

There is no time limit on core courses. However, applicants are advised that they will be held accountable for the content of core courses when they begin the Program.
Applicants are strongly advised to review math and skeletal anatomy prior to beginning the Program.

3. Overall GPA of 2.0 or higher.

4. Applicants who are non-native speakers of English are required to have completed the Test of English as a Foreign Language (TOEFL) with a minimum internet-based test (iBT) score of 24 in the speaking component and a minimum iBT score of 22 in the listening component. This requirement is due to the Program’s professional technical standards for written and verbal communication skills. Preparation for the test is highly recommended. Cuyahoga Community College offers a preparation course for the TOEFL. It is the sole responsibility of the student to prepare, schedule and incur the costs for the TOEFL. Visit www.ets.org for more information about the test. For more information about English as a Second Language offerings at Cuyahoga Community College, http://www.tri-c.edu/programs/english-as-a-second-language.

F. Program Information Session

Students are required to attend a Radiography Program Information Session prior to entering the Program. Attendance at an information session does NOT need to be completed prior to applying but must be completed prior to Program entry. Sessions are held each semester and are posted on the Program’s webpage (www.tri-c.edu/radiography). Students are encouraged to bring a support person. Students must sign in to document their attendance and attend the entire session.

Sessions are designed to help students prepare for success in the Program. Students with an interest in health careers but are uncertain which one is right for them are welcome to attend. During the session, students will learn important information about the Program, hear from current students and/or recent graduates and tour the radiography lab.

Additional Program Requirements

The Program requires students to complete the following additional requirements to maintain compliance with external agency and certification standards. It is important that applicants be aware of these additional requirements prior to applying to the Program.

These should NOT be completed at the same time as the Health Careers Program Application, but will be required later in the admission process or following admission to the Program. The Program will inform students when they should obtain these requirements as many have time limitations. Completing them too early may necessitate having to repeat them and incur additional costs.

A. Basic Cardiac Life Support Certification for Health Care Provider

Evidence of current certification in Basic Cardiac Life Support for Health Care Providers according to American Heart Association standards will be required prior to receiving clinical assignment. Students will be asked to verify certification by submitting a photocopy of both sides of their CPR card prior to clinical assignment. Students are responsible for maintaining certification throughout the Program.

B. Evidence of Good Health and Immunizations

The work of a radiographer frequently deals with life and death situations and places students in direct contact with patients. Health requirements mandate that the student submit evidence of good health through a physical examination and titers or immunizations after admission to the Program but prior to clinical assignment. A student can be dismissed from the Program if significant limiting health conditions are present or arise which prevent the student from
performing the normal functions of a student radiographer and/or constitute a hazard to the health or safety of patients, fellow students and/or College/hospital personnel.

C. College-required Background Check

All health career and nursing students are required to complete a background check that includes fingerprinting and a court search. The background check must be completed and approved by the College prior to beginning the Program. Students are responsible for any and all costs incurred.

Additional information on background checks can be found at: http://www.tri-c.edu/programs/healthcareers/Pages/BackgroundCheckInformation.aspx.

D. Background Checks, Clinical Placement and American Registry of Radiologic Technologists (ARRT) Certification

It is very important that applicants understand that the College’s determination of acceptable background check results for the purposes of the educational program does not guarantee a similar determination by other entities (i.e. clinical affiliates, professional certifying organizations [i.e. American Registry of Radiologic Technologists] and/or future employers). Students with a history of prior conviction should be prepared and will be required to comply with the requirements of clinical and accrediting agencies throughout the course of their educational program and career.

Individuals who have been convicted of, pleaded guilty to, or pled nolo contendere to a crime may not be eligible to take the American Registry of Radiologic Technologists (ARRT) certification examination, according to the ARRT’s Code of Ethics. Prior to applying to the Radiography Program, prospective applicants who may be impacted by this are highly encouraged to contact the ARRT by calling (651) 687-0048, extension 580 and/or visiting https://www.arrt.org/pdfs/Ethics/Ethics-Review-Pre-Application.pdf. Students with prior offenses are encouraged to complete the ARRT Ethics Review Pre-application Process prior to beginning the Program.

E. Drug Testing and Nicotine Use

Some clinical sites require mandatory drug testing. Students are responsible for the cost of testing. A positive result on the test will delay or prevent a student from beginning a clinical rotation. All of the Program’s clinical sites are non-smoking environments and many will not hire individuals who test positive for nicotine. Students who pursue health career programs should be mindful of their lifestyle choices because they may impact clinical training opportunities and future employment prospects.

Program Suggested Semester Sequence

The following two pages detail the courses required for the 64-credit Associate of Applied Science Degree in Radiography.
## Associate of Applied Science degree in Radiography

Associate of Applied Science

Effective Fall 2016. Students enrolled prior to Fall 2016 can continue to follow a prior year’s catalog in accordance with the College’s catalog-in-force policies or choose to follow this updated program sequence. Recommend students run a Degree Audit report and see a counselor to determine the best pathway to degree completion.

### General Education Requirements

<table>
<thead>
<tr>
<th>Area</th>
<th>Course</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>Arts &amp; Humanities/Social &amp; Behavioral Sci/Natural &amp; Phys Sci (6 semester credits)</td>
<td>BIO 1221 Anatomy and Physiology for Diagnostic Medical Imaging</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>PSY 1010 General Psychology or</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>PSY 101H Honors General Psychology</td>
<td>3</td>
</tr>
<tr>
<td>Communication/Mathematics/Nat &amp; Phys Sci (minimum 6 credits. All listed courses must be completed.)</td>
<td>ENG 1010 College Composition I or</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>ENG 101H Honors College Composition I</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>ENG 1020 College Composition II or</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>ENG 102H Honors College Composition II</td>
<td>3</td>
</tr>
<tr>
<td>Mathematics &amp; Data Analysis (3 Semester Credits)</td>
<td>MATH 1240 Contemporary Mathematics or higher</td>
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### Program Requirements

<table>
<thead>
<tr>
<th>Course</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>BIO 2200 Radiobiology</td>
<td>2</td>
</tr>
<tr>
<td>DMS 1351 Patient Care Skills</td>
<td>1</td>
</tr>
<tr>
<td>MA 1020 Medical Terminology I</td>
<td>3</td>
</tr>
<tr>
<td>PHYS 2200 Radiographic Physics and Quality Control</td>
<td>4</td>
</tr>
<tr>
<td>RADT 1300 Fundamentals of Radiography</td>
<td>4</td>
</tr>
<tr>
<td>RADT 1351 Image Acquisition and Evaluation</td>
<td>3</td>
</tr>
<tr>
<td>RADT 1400 Radiographic Positioning</td>
<td>3</td>
</tr>
<tr>
<td>RADT 1410 Intermediate Radiographic Positioning</td>
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</tr>
<tr>
<td>RADT 1911 Clinical Radiography I (Option A)</td>
<td>7</td>
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<tr>
<td>RADT 191A Clinical Radiography I (Option C)</td>
<td>6</td>
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<tr>
<td>RADT 191B Clinical Radiography I (Option C)</td>
<td>1</td>
</tr>
<tr>
<td>RADT 191S Clinical Radiography I (Option B)</td>
<td>5</td>
</tr>
<tr>
<td>RADT 2350 Radiographic Pathology</td>
<td>3</td>
</tr>
<tr>
<td>RADT 2302 Interventional Radiography and Pharmacology</td>
<td>1</td>
</tr>
<tr>
<td>RADT 2401 Imaging Systems</td>
<td>2</td>
</tr>
<tr>
<td>RADT 2511 Clinical Radiography II (Option A)</td>
<td>7</td>
</tr>
<tr>
<td>RADT 251A Clinical Radiography II (Option C)</td>
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</tr>
<tr>
<td>RADT 251B Clinical Radiography II (Option C)</td>
<td>1</td>
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<tr>
<td>RADT 251S Clinical Radiography II (Option B)</td>
<td>7</td>
</tr>
<tr>
<td>RADT 2521 Clinical Radiography III (Option A)</td>
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<tr>
<td>RADT 2521 Clinical Radiography III (Option C)</td>
<td>5</td>
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<tr>
<td>RADT 252S Clinical Radiography III (Option B)</td>
<td>7</td>
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</table>

### Suggested Semester Sequence

#### Program Admissions Requirements

<table>
<thead>
<tr>
<th>Course</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>BIO 1221 Anatomy and Physiology for Diagnostic Medical Imaging</td>
<td>4</td>
</tr>
<tr>
<td>DMS 1351 Patient Care Skills</td>
<td>1</td>
</tr>
<tr>
<td>ENGL 1010 College Composition I or</td>
<td>3</td>
</tr>
<tr>
<td>ENGL 101H Honors College Composition I</td>
<td>3</td>
</tr>
<tr>
<td>MA 1020 Medical Terminology I</td>
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<td>PSY 1010 General Psychology or</td>
<td>3</td>
</tr>
<tr>
<td>PSY 101H Honors General Psychology</td>
<td>3</td>
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<tr>
<td>MATH 1240 Contemporary Mathematics or higher</td>
<td>3</td>
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<tr>
<td>Total:</td>
<td>17</td>
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#### First

<table>
<thead>
<tr>
<th>Course</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>BIO 2200 Radiobiology</td>
<td>2</td>
</tr>
<tr>
<td>RADT 1300 Fundamentals of Radiography</td>
<td>4</td>
</tr>
<tr>
<td>RADT 1400 Radiographic Positioning</td>
<td>3</td>
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<tr>
<td>Total:</td>
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#### Second

<table>
<thead>
<tr>
<th>Course</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>RADT 1911 Clinical Radiography I (Option A)</td>
<td>3</td>
</tr>
<tr>
<td>RADT 191A Clinical Radiography I (Option C)</td>
<td>6</td>
</tr>
<tr>
<td>RADT 191B Clinical Radiography I (Option C)</td>
<td>1</td>
</tr>
<tr>
<td>RADT 191S Clinical Radiography I (Option B)</td>
<td>5</td>
</tr>
<tr>
<td>RADT 2350 Radiographic Pathology</td>
<td>3</td>
</tr>
<tr>
<td>RADT 2302 Interventional Radiography and Pharmacology</td>
<td>1</td>
</tr>
<tr>
<td>RADT 2401 Imaging Systems</td>
<td>2</td>
</tr>
<tr>
<td>RADT 2511 Clinical Radiography II (Option A)</td>
<td>7</td>
</tr>
<tr>
<td>RADT 251A Clinical Radiography II (Option C)</td>
<td>6</td>
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<tr>
<td>RADT 251B Clinical Radiography II (Option C)</td>
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<tr>
<td>RADT 251S Clinical Radiography II (Option B)</td>
<td>7</td>
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<tr>
<td>RADT 2521 Clinical Radiography III (Option A)</td>
<td>5</td>
</tr>
<tr>
<td>RADT 2521 Clinical Radiography III (Option C)</td>
<td>5</td>
</tr>
<tr>
<td>RADT 252S Clinical Radiography III (Option B)</td>
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<td>Total:</td>
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#### Third

<table>
<thead>
<tr>
<th>Course</th>
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<tbody>
<tr>
<td>PHYS 2200 Radiographic Physics and Quality Control</td>
<td>4</td>
</tr>
<tr>
<td>RADT 2350 Radiographic Pathology</td>
<td>3</td>
</tr>
<tr>
<td>RADT 2302 Interventional Radiography and Pharmacology</td>
<td>1</td>
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</table>

#### Summer 2

<table>
<thead>
<tr>
<th>Course</th>
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</thead>
<tbody>
<tr>
<td>RADT 2521 Clinical Radiography III (Option A)</td>
<td>5</td>
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<tr>
<td>RADT 252S Clinical Radiography III (Option B)</td>
<td>5</td>
</tr>
<tr>
<td>RADT 2521 Clinical Radiography III (Option C)</td>
<td>5</td>
</tr>
<tr>
<td>Total:</td>
<td>15</td>
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</tbody>
</table>
This page is a continuation of the Suggested Semester Sequence and explains the three clinical options.

Students are assigned a clinical option based on when they begin the program (fall or spring semester) and on their program track (daytime or evening/weekend).

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### Core Program Total / 45 Hours

<table>
<thead>
<tr>
<th>Options</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Option A</strong>: Fall Start - Daytime Track</td>
<td><strong>Credits</strong></td>
</tr>
<tr>
<td>Students beginning the program in a fall semester (daytime track) will complete the following clinical courses: RADT 1911; RADT 2911 and RADT 2921</td>
<td>7</td>
</tr>
<tr>
<td>RADT 1911 Clinical Radiography I</td>
<td>7</td>
</tr>
<tr>
<td>RADT 2911 Clinical Radiography II</td>
<td>5</td>
</tr>
<tr>
<td>Credit Total for Option A</td>
<td>19</td>
</tr>
<tr>
<td>Program total for Option A</td>
<td>64</td>
</tr>
<tr>
<td><strong>Option B</strong>: Spring Start - Daytime Track</td>
<td><strong>Credits</strong></td>
</tr>
<tr>
<td>Students beginning the program in a spring semester (daytime track) will complete the following clinical courses: RADT 191S, RADT 291S and RADT 292S</td>
<td>5</td>
</tr>
<tr>
<td>RADT 191S Clinical Radiography I</td>
<td>7</td>
</tr>
<tr>
<td>RADT 291S Clinical Radiography II</td>
<td>7</td>
</tr>
<tr>
<td>RADT 292S Clinical Radiography III C</td>
<td>5</td>
</tr>
<tr>
<td>Credit Total for Option B</td>
<td>19</td>
</tr>
<tr>
<td>Program total for Option B</td>
<td>64</td>
</tr>
<tr>
<td><strong>Option C</strong>: Fall Start - Evening/Weekend Track</td>
<td><strong>Credits</strong></td>
</tr>
<tr>
<td>Students beginning the program in a fall semester (evening/weekend track) will complete the following clinical courses: RADT 191 1 or RADT 191A and RADT 191B; RADT 291 1 and RADT 291B; and RADT 2921</td>
<td>6</td>
</tr>
<tr>
<td>RADT 191A Clinical Radiography I and</td>
<td>6</td>
</tr>
<tr>
<td>RADT 191B Clinical Radiography I</td>
<td>1</td>
</tr>
<tr>
<td>RADT 291A Clinical Radiography II</td>
<td>6</td>
</tr>
<tr>
<td>RADT 291B Clinical Radiography II</td>
<td>1</td>
</tr>
<tr>
<td>RADT 2921 Clinical Radiography III C</td>
<td>5</td>
</tr>
<tr>
<td>Credit Total for Option C</td>
<td>15</td>
</tr>
<tr>
<td>Program total for Option C</td>
<td>64</td>
</tr>
</tbody>
</table>

1. BIO 2331 and BIO 2341 together will be accepted in place of BIO 1221.
2. MATH 1240 or higher is a program admission requirement effective fall 2016. MATH 1270 or higher will be accepted as a substitute for MATH 1240 for students who completed the math requirement prior to the fall 2016 semester.
3. Students beginning program in fall semester (daytime track) must take RADT 1911, 2911 and 2921. Students beginning in spring semester (daytime track) must take RADT 191S, 291S and 292S. Students beginning in the fall semester evening/weekend track) may take modular courses RADT 191A and 191B in place of RADT 1911 and must take RADT 291A, 291B, and 2921. RADT 191A & 191B are accepted in place of RADT 2911.
4. Students formally accepted into the program in fall 2016 or later must take ENG 1020 or ENG 1021. Students accepted into the program prior to fall 2016 may fulfill this requirement through a 3 credit course in one of the following areas: ENG, ASL, SPCH or foreign language. These students should meet with a counselor to confirm that their choice of course will meet the communications requirement.

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Student Fees

Student tuition rates are published on the College’s website at http://www.tri-c.edu/paying-for-college/tuition-and-fees. Other expenses which the student radiographer should be aware of include, but are not limited to:

- Physical exam and immunizations
- Hospital uniforms and shoes
- Transportation for clinical experiences
- Physical examination fee
- Lab and clinical fees
- Drug testing
- Parking
- State of Ohio licensure fee
- Medical liability insurance
- Health insurance
- Registration fee for the certification examination
- CPR certification
- Background check
- Miscellaneous expenses (e.g. name badge, markers, etc.)

Below is an estimate of expenses. Students should plan accordingly so that they are able to address these expenses when they arise. An inability to do so can impact a student’s ability to complete Program and professional requirements.

<table>
<thead>
<tr>
<th>Radiography Program Expenses*</th>
<th>In-County</th>
<th>Out-of County</th>
<th>Out-of-State</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tuition</td>
<td>8,000.00</td>
<td>10,000.00</td>
<td>18,000.00</td>
</tr>
<tr>
<td>Lab and Clinical Fees</td>
<td>275.00</td>
<td>275.00</td>
<td>275.00</td>
</tr>
<tr>
<td>Textbooks &amp; Supplies</td>
<td>1,400.00</td>
<td>1,400.00</td>
<td>1,400.00</td>
</tr>
<tr>
<td>Parking</td>
<td>260.00</td>
<td>260.00</td>
<td>260.00</td>
</tr>
<tr>
<td>Uniform (shoes, lab coat &amp; scrubs)</td>
<td>300.00</td>
<td>300.00</td>
<td>300.00</td>
</tr>
<tr>
<td>Liability Insurance</td>
<td>30.00</td>
<td>30.00</td>
<td>30.00</td>
</tr>
<tr>
<td>National Registry Examination Fee</td>
<td>200.00</td>
<td>200.00</td>
<td>200.00</td>
</tr>
<tr>
<td>State of Ohio Licensure Fee</td>
<td>65.00</td>
<td>65.00</td>
<td>65.00</td>
</tr>
<tr>
<td>Background Check Screening</td>
<td>85.00</td>
<td>85.00</td>
<td>95.00</td>
</tr>
<tr>
<td>Drug Testing</td>
<td>50.00</td>
<td>50.00</td>
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</tr>
<tr>
<td><strong>Total Estimated Cost of Program</strong></td>
<td><strong>$10,665.00</strong></td>
<td><strong>$12,665.00</strong></td>
<td><strong>$20,675.00</strong></td>
</tr>
</tbody>
</table>

* Fees and expenses are estimated and subject to change at any time.

An Invitation to Prospective Students to Observe in a Radiology Department

The Program has a number of primary hospital affiliates where students engage in clinical training. These sites are listed on the following page. Students are assigned to a hospital site for their clinical education by the Program prior to the second semester. Students must be willing and able to travel to all clinical affiliates.

The Program welcomes weekday, daytime observation visits by prospective students at many of its clinical sites. An observation can help students determine if the healthcare environment and the radiography profession are right for them. Observations can be arranged by contacting one of the clinical instructors listed. Note that there is a designated observation contact, Amy Graska, R.T.(R)(M), for all Cleveland Clinic system hospitals. Her telephone number is listed as the observation contact number for multiple sites.

This invitation does not imply acceptance to the Program, but rather an opportunity for prospective students to become acquainted with the field of radiography. Once a student is accepted into the Program, he or she will be required to complete a separate, formal observation and an Observation Verification Form indicating the observation has been completed.

Professional, business casual attire is required. Students who are dressed inappropriately will be sent home and will be required to reschedule the observation. Inappropriate attire includes jeans, shorts, leggings, short skirts, low-cut blouses, halter tops, bare midriffs, visible tattoos, facial piercings, tennis shoes, open-toed shoes/flip-flops and shoes with heels exceeding one inch.
Mark Moore, RT(R)  
Clinical Instructor  
Division of Radiology / A21  
Cleveland Clinic*  
9500 Euclid Avenue  
Cleveland, Ohio 44195  
Contact: Amy Graska  
Phone: (216) 529-8395  
Email: amgras@ccf.org

Laurie O’Neal, RT(R)  
Clinical Instructor  
University Hospitals Parma Medical Center  
Radiology Department  
7007 Powers Boulevard  
Parma, OH 44129  
Phone: (440) 743-4026  
Department: (440) 743-4669

Carol Gaba, RT(R)  
Karen Hogan, RT(R)  
Clinical Instructors  
Radiology Department  
Fairview Hospital*  
18101 Lorain Avenue  
Cleveland, Ohio 44111  
Contact: Amy Graska  
Phone: (216) 529-8395  
Email: amgras@ccf.org

Ann Brumenschenkel, RT(R)  
Clinical Instructor  
Southwest General Health Center  
Radiology Department  
18697 East Bagley Road  
Middleburg Hts., OH 44130  
Phone: (440) 816-8778

Noedi Torres, RT(R)  
Clinical Instructor  
Radiology Department  
Marymount Hospital*  
12300 McCracken Road  
Garfield Hts., OH 44125  
Contact: Amy Graska  
Phone: (216) 529-8395  
Email: amgras@ccf.org

Michael Morley, BA, RT(R)  
Sheri Thibo, RT(R)  
Clinical Instructors  
Radiology Department  
University Hospitals Case Medical Center  
11100 Euclid Ave.  
Cleveland, OH 44106-5000  
Phone: (216) 844-1170  
Observations available to current UH employees only

Mindy Bolger, RT(R)  
Clinical Instructor  
Medina Hospital*  
1000 E. Washington Street  
Medina, Ohio 44256  
Contact: Amy Graska  
Phone: (216) 529-8395  
Email: amgras@ccf.org

* Facility requires an eight-hour observation.