

**Student Clinical Expectations
for
Postprimary Programs in Radiology**

Recognized by:

The American Registry of Radiologic Technologists (ARRT)

Pulse Radiology

Pulse Radiology Overview

Pulse Radiology is the first online radiology program approved by the American Registry of Radiologic Technologists (ARRT) for structured education and the American Society of Radiologic Technologists (ASRT) as a recognized continuing education evaluation mechanism (RCEEM) in the United States.

The core focus is to be able to provide quality and approved online education to working radiologic technologists, sonographers, nuclear medicine technologists, and radiation therapists and to help develop the future of the radiology field. As of 2016, the ARRT mandates that all technologists must hold proper certification in their primary imaging modality. This provides our patients with the utmost standard of care through technologists who have mastered a specific discipline.

Pulse Radiology technologists must complete a rigorous program to earn a Certificate of Completion in the postprimary pathway they have chosen. Once the program is successfully completed, a student will earn 29 ASRT Category A CE credits for CT, 25.5 ASRT Category A CE credits for MRI, or 40 ASRT Category A CE credits for Mammography. Once a technologist passes with a grade of 75% or greater, they will receive the ARRT Certificate of Completion, which is to be uploaded to the technologist's ARRT dashboard.

After finishing your postprimary education, you are required to complete the ARRT clinical requirements to qualify for the ARRT certification exam. These clinical requirements consist of mandatory cases that must be completed within a 24-month period and verified by a registered ARRT technologist.

- **CT and MRI students** must perform a total of 125 case-specific exams to meet the ARRT clinical requirements.
- **Mammography students** must complete 100 mandatory exams, which include 25 MQSA exams. Additionally, 32 exams focused on Quality Control are required, along with one (1) mandatory mammographic image evaluation.

Once ARRT structured education and clinical requirements are complete, Pulse Radiology technologists are deemed eligible for their specific certification registry exam.

POSTPRIMARY STUDENT CLINICAL POLICIES

The Pulse Radiology model focuses on establishing a clinical relationship with not-for-profit and for-profit healthcare systems, imaging networks, and ancillary care facilities to help develop technologists. Clinical training is a very important step in a technologist's education; therefore, unprofessional behavior will not be tolerated. Our clinical affiliates share a similar interest in developing the future of our labor force. To ensure a positive outcome, clinical affiliates can remove a trainee from a site, pause training, or approach them for employment. Pulse Radiology technologists are to treat this training as a live interview with the end goal to not just pass a certification exam but to become a long-term asset for our clinical partners. To ensure clarity, the following are Pulse Radiology clinical expectations and policies for all postprimary students.

I. Assigned Clinical Rotations

Policy:

To ensure that all clinical activities are educationally valid and sound, it is the policy of the Program to assign students to clinical areas once you fill out the Commencement form at the end of Week 12. Each Pulse Radiology technologist will be assigned a personal clinical coordinator to help with communication, coordination, and managing of schedules. A clinical rotation schedule will be created once the Clinical Coordinator obtains approval from the clinical site. Any changes to clinical assignments must be approved by the Clinical Coordinator prior to starting the clinical placement process.

Students are not permitted to be "pulled" by clinical supervisors to cover other, non-assigned rotations. Students are never to be utilized to supplement paid, technical staff. Furthermore, students are not permitted to "visit" in rotations other than their assigned area.

Each student understands that he or she will be given **16 weeks** to complete the clinical assignment. A minimum of two (2) days per week is required. This includes Monday through Friday and needs to be during regular working hours. Each student must complete the 14 weeks of didactic learning prior to starting the clinical assignment (unless early entry is advised under the directive of the Clinical Coordinator). The student's grades must be 75% or higher to qualify for clinical.

Each student understands that he or she will not reach out to any clinical sites until they are approved for clinical training via an email from the Clinical Coordinator. Pulse staff will be in close communication with the clinical sites to complete the student's clinical on-boarding. Failure to comply may result in losing an option for clinical training. Each student understands that clinical training sites are available on a first come first serve basis. Students who are enrolled and completed their didactic learning prior to another student will start clinical training in that order. Each student acknowledges that the initial

anticipated start date of the clinical assignment may change at the discretion of the clinical affiliate location and understands that at any point a clinical site may remove Pulse Radiology from its list or change the days and hours available to Pulse Radiology students.

Procedure:

1. Complete Week 12 module and submit the Commencement form.
2. Verify with your Clinical Coordinator which clinical site you'd like to train at as well as your updated schedule and start date.
3. Once confirmed, your Clinical Coordinator will begin communicating with clinical sites to check their availability. Please be aware that this can take weeks and depends on how quickly the clinical site responds.

II. Student Supervision

Policy:

The clinical education portion of the curriculum is a structured competency-based program interrelated with the didactic portion of the program. Through the interaction between other technologists, the Pulse instructor and staff, and the patients to be imaged, students have an opportunity to complete competencies (as defined by the ARRT) and to achieve the program's mission and goals.

The presence of students in the clinical areas is not intended to supplement or replace staff. Clinical education opportunities are provided under the supervision of qualified, licensed technologists.

Direct Supervision defined:

Until a student has demonstrated clinical competency in performing a specific exam, all medical imaging procedures must be conducted under the direct supervision of a licensed technologist. The technologist must remain in the room, closely observing the student's performance until the student acquires the necessary knowledge and skill to perform the procedure independently.

All students are required to work under direct supervision, with a licensed technologist physically present in the examination room, until they are confident in their ability to safely and effectively perform the exam on their own.

Indirect Supervision defined:

When a student has observed and performed an exam with assistance and gains confidence to do it themselves, they are permitted to perform only those examinations under the indirect supervision of a qualified, licensed technologist. Indirect supervision is defined as a licensed technologist being immediately available to the student in an adjacent room or in a nearby area to assist the student should

the need arise. The licensed technologist is also available to answer any questions the student may have relative to the procedure and patient condition.

The student's ability to work under indirect supervision following successful completion of a competency evaluation shall be at the discretion of the supervising licensed technologist.

If a student feels that the supervision policies described above are not being adhered to, written notification must be immediately submitted to the Clinical Coordinator so that the necessary corrective actions may be taken. No student retaliation will be permitted following notification of policy violations.

III. Clinical Case Checklist

Policy:

Each student shall print the exam sheet provided for clinical training which is found in Week 13: Pulse Radiology Clinical Case Checklist. The student agrees to have a technologist initial each exam that they felt comfortable completing on his or her own. The student will write down every exam they observe, assist with, or complete without assistance or with minimal assistance, and they will send a copy of this sheet to their Clinical Coordinator twice a month.

IV. Attendance

Policy:

Each student understands that they will continue to communicate with the Pulse Radiology team members with the same email address until they have completed the program. The student understands that he or she will notify their Clinical Coordinator as far in advance as possible if they will not be able to attend a regularly scheduled clinical rotation. If the student is sick, they will contact their Clinical Coordinator and the clinical site/tech with whom he or she is working with as soon as possible. Each student is allowed a maximum of 2 days of call out time from their training.

V. Leaving Clinical Areas

Policy:

Students are not allowed to leave their assigned clinical areas during the scheduled clinical time without permission of the clinical supervisor. Students will be assigned a lunch break by the area supervisor and are not to leave their clinical areas at the end of the day until all work in progress is completed unless permission is given to the student and appropriate transfer of patient care is done. If a student leaves an assigned area without the permission of the area supervisor disciplinary action will result.

VI. Clinical Responsibilities

Policy:

Students are required to maintain a clean environment in their assigned clinical area/examination room. This may also include stocking of rooms and replenishment of the room linen supply. Students must exercise care and fully comply with all established safety standards when performing examinations.

Students are responsible for all technical, clerical, and other duties relative to the performance of their clinical duties. This includes, but is not limited to, all necessary exam paperwork and computer functions. All students will perform patient examinations and studies according to their skill-level and will assist staff technologists with the following:

- a. caring for the needs of patients
- b. lifting and moving patients as necessary
- c. cleaning examination rooms and equipment
- d. emptying laundry hampers in examination rooms if necessary
- e. recording the procedure in the facility's RIS or HIS system and completing associated paperwork.

Under no circumstances may a student eat or drink in patient areas including examination rooms. Food and beverage consumption must be done only in designated areas within the clinical site. Each area supervisor will inform students of the designated area.

VII. Clinical Site Photo Identification

Policy:

Once you have completed your Pulse Radiology enrollment form, a photo identification badge will be mailed to you, if applicable. For security reasons, students must always wear their Pulse Radiology photo identification badge while on the clinical site property. If you are completing your clinical training at a hospital, an additional badge may be required and created by the hospital. The front of the badge denoting the individual as a student must be prominently displayed at all times. If a student loses their photo identification badge, they must notify their Clinical Coordinator immediately.

Procedure:

In the event a photo identification badge is lost:

1. The student must contact their Clinical Coordinator immediately.
2. The Clinical Coordinator will resend a replacement badge right away.

VIII. Professional Demeanor

Policy:

It is the policy of the program to expect each student to always conduct themselves in a professional manner. Failure to do so will result in the appropriate disciplinary action including the probation, program suspension, and/or program dismissal. The disciplinary action taken will be at the discretion of the Clinical Coordinator and will reflect the inappropriate action displayed by the student. Pulse Radiology has a Two Strike policy. No out of character behavior or failure to show when scheduled without notice during clinical training will be tolerated. Students are there to learn, gain competencies, and help the other technologists. Every clinical assignment is a live interview regardless of a student's interest in a future position there.

Clinical site policies, procedures, and rules are to be followed at all times. Any questions regarding these rules should be directed to the area supervisor or Clinical Coordinator for clarification.

IX. Clinical Equipment & Supplies

Policy:

Clinical equipment and supplies are to be used only for the purpose intended. Students are not permitted to remove any equipment or supplies from the clinical premises. Students in violation of this policy are subject to disciplinary action up to and including program dismissal and possible criminal prosecution. Furthermore, equipment and supplies should be cleaned and returned to their proper location following completion of the procedure they are being used for.

X. Use of Cellular Phones in Clinical Area

Policy:

Student technologists must not bring personal phones into the clinical areas. Phones must be turned off or be placed on silent mode if they are to be stored with the student's belongings. Violation of this policy will result in the assignment of probation or program suspension for repeat offenses leading up to the possible program dismissal, as this is disruptive to the learning and clinical environments; and may be hazardous to the electronic circuitry of some medical equipment.

XI. Uniform Requirements and Grooming

Policy:

It is the policy of the program that students always conform to acceptable standards of grooming. Acceptable standards of grooming may be defined as follows:

- The uniform (solid-colored scrubs or business casual) should be neat and clean and worn with the Pulse Radiology badge above the waist.
- Shoes should always be clean and may include sneakers and hospital clogs.

- All students must maintain a conservative hairstyle. Hair that falls below the shoulder must be fastened up or back.
- Students must be clean-shaven or facial hair must be neatly trimmed.
- Excessive use of cosmetics or perfumes is not permitted.
- Fingernails must be kept at a suitable length and neatly trimmed.
- Canvas shoes are not permitted.

For clarification, **uniform restrictions** will be defined as follows:

- Shoes: Sandals, ankle-laced, platform, open-toe, or open-backed shoes.
- Denim materials including jeans.
- Jump suits, sweatpants, harem pants, and coveralls.

Students not conforming to uniform requirements will be sent home. Subsequent occurrences will result in program suspension and/or program dismissal for repeat offenses.

XII. Dosimeters

Policy:

When applicable, each student understands that he or she will keep track of their control and radiation dosimeter that is sent to them via mail from Landauer. These items, along with the return bag, are to be returned when the student completes their clinical assignment. Failure to return the items will result in a \$30 fee (“Failure to Return Fee”). Further, there will then be no record of the dose you may or may not have received during clinical training.

XIII. Radiation Safety

Policy:

It is the policy of the Program to comply with all institution and state radiation safety guidelines and policies. CT and Mammo student technologists will be operating radiation-producing equipment only as part of their training under the supervision of licensed, qualified technologists during clinical training. Exposure of any individual to ionizing radiation solely for educational purposes will not be permitted.

The program’s radiation protection policies and practices reflect adherence to the ALARA Principle, which is to limit radiation exposure to a level that is “As Low As Reasonably Achievable”. This principle applies to patients, the public, hospital staff, and the operators of radiation-producing equipment. Each of these categories will be addressed relative to program policy.

Patient Protection

All female patients of childbearing age will be asked, prior to exposure, if they are pregnant or suspect they may be. If suspected or confirmed, a supervisor must be notified prior to the start of any exams. A

Radiologist may also be notified. In cases where known pregnant patients must be imaged, every effort should be taken to maintain the lowest radiation dose possible to the fetus.

Immobilization devices will be employed when necessary to prevent the need for repeat exposures due to patient motion. The patient's family, with the exception of pregnant females, will be allowed in the exam room only under special circumstances. These individuals must be provided with protective apparel and instructed on radiation protection practices prior to any exposure. Effective communication will be utilized to ensure patient cooperation with positioning and procedural needs, thus reducing the possibility of repeated exposures. Exams may only be repeated in the presence of a qualified, licensed technologist.

Student Radiation Protection

Whenever possible, students assisting in procedures must remain behind protective barriers. Student technologists will never be used for the purpose of holding patients during exams. No exceptions to this policy will be made. Pregnant students are encouraged to notify their Clinical Coordinator in writing if a pregnancy is suspected or confirmed. Please refer to the Declaration of Pregnancy policy for additional information.

All student technologists will be issued a whole-body dosimeter in the form of a film badge.

- a. The film badge shall be worn at the collar level.
- b. When a lead apron is worn, the film badge must be located on the outside of the apron during exposures.
- c. In the event a film badge is lost or damaged, the Clinical Coordinator must be notified immediately. Students will be responsible for the cost of replacement.

XIV. Declaration of Pregnancy

Policy:

It is the policy of the Program to comply with all federal regulations regarding disclosure of pregnancy by the student technologist. If a female student becomes pregnant (or suspects she may be pregnant), it is recommended that she notify her Clinical Coordinator as soon as possible in writing. Disclosure of pregnancy status is voluntary. Every effort will be made to protect the health of the student and developing fetus. Furthermore, all enrolling females will be made aware of this policy.

Procedure:

1. If the student decides to disclose her pregnancy, the notification must be in writing and will include the estimated date of conception and projected due date.
2. The Clinical Coordinator will immediately order the appropriate fetal dosimeter. The determination of the student's ability to engage in clinical training will be determined ultimately by the student and her physician.

3. Following written documentation from her physician that she is permitted to continue clinical activities, the students will discuss clinical options with her Clinical Coordinator. Each pregnant student will be handled on a case-by-case basis. Options included, but are not limited to, the following:
 - a. Continue without modification.
 - b. Continue with the didactic portion of the program and take a leave of absence, with continuation of the clinical portion of the program following delivery.
 - c. Continue with didactic and clinical education portions of the program, but with an altered schedule to ensure the lowest possible radiation dose to the developing fetus. As a result, altered schedules may prevent the student from completing their exams in a timely manner.
4. If a pregnant student technologist can continue with the clinical portion of the program, she will be provided a second fetal dosimeter to be worn at waist level.

Additional Guidelines will be followed:

- The second radiation dosimeter (fetal badge) should always be worn while in the clinical areas.
- During all radiation exposures, the pregnant student should remain behind fixed protective barriers.
- At no time will a student hold a patient during exposure.
- A student who does not declare her pregnancy will be treated as if she is not pregnant.
 - a. The ultimate decision on what option to decide will be made by the student and should depend upon physician recommendations, remaining length of the pregnancy, remaining program length, and input from the Clinical Coordinator.
 - b. The obstetrician's recommendations will be followed in all cases when provided.

Upon completion of a leave of absence, the student will be allowed to resume her studies without prejudice. In all cases, however, the student must meet clinical education standards.

Student Guidelines

- Always wear appropriate uniform, including dosimeter(s) (if applicable).
- Always wear your Pulse Radiology ID Badge.
- When applicable, wear your Facility ID badge.
- No cell phones, tablets or any other electronic device are permitted in the patient care area.
- A student in need of making a phone call must ask for permission and step out of the patient care area.

Notifications

- Students must notify their Clinical Coordinator in advance of any schedule change.
- Any schedule change must be approved by your Clinical Coordinator and clinical supervisor.
- Each student must also notify their Clinical Coordinator and clinical supervisor if not attending to training on any particular day(s).