Imaging Sciences Program

RADIOLOGIC TECHNOLOGY

INFORMATION AND APPLICATION PACKET
2011-2012
February 1, 2011

Dear Interested Candidate:

Thank you for your interest in the Imaging Sciences Program at Ivy Tech Community College in Indianapolis. Enclosed you will find the application steps, information about the program, the current suggested curriculum sequence, the application form, and frequently asked questions.

Our College is accredited by the North Central Association of Colleges. The Program is accredited by the JRCERT. www.jrcert.org The mission of our program is to provide graduates knowledge through educational opportunities in Imaging Sciences, therefore providing Indianapolis and the surrounding areas with competent individuals to function within a healthcare environment.

The Imaging Sciences Program includes AS degrees in Imaging Sciences, Sonography, Nuclear Medicine, or MRI. Presently, only the Terre Haute campus offers programs other than Radiologic Technology.

Imaging Sciences is truly an exciting field in healthcare and it is growing and it is changing every year. We want to help you reach your goals to become a part of this healthcare team. Please carefully read through all the information supplied in this packet. This application packet is the most current and replaces any other previously printed application packet. If you have any questions, please call (317) 921-4800 and ask to speak to the Imaging Sciences Program faculty.

Program Chair                                       Clinical Coordinator
Ivy Tech Community College                              Ivy Tech Community College
317-921-4438                                               317-921-4414

Haya Bannourah A.S., RT(R)(M)(CT)
Instructor
Ivy Tech Community College
317-921-4402

Ivy Tech Community College Imaging Sciences Program-Indianapolis 2010
5 year average national exam pass rate = 99%
5 year average job placement rate= 85%
Annual program completion rate= 93%

In the future these statistics will be posted at www.jrcert.org
The radiologic technologist is someone who specializes in using x-rays to create images of the body, and is known as a radiographer. The radiographs that are produced by the radiographer enable the doctor to diagnose the patient for disease, fractures, or any irregularities. Therefore, a radiographer must be a professional who is skilled in the art and science of radiography and is able to apply scientific knowledge, problem-solving techniques, and the use of high tech equipment, while providing quality patient care.

Technologists are employed in hospitals, clinics, physicians offices, federal and state agencies, industry, and certain education institutions.

This program includes a curriculum that includes patient care, radiographic technique, positioning, radiation exposure, radiation protection, physics, pathology, and ethics (complete list is in this packet). Clinical practice and supplemental instruction are provided at the accredited sites. Upon successful completion of this program, graduates are eligible to take the American Registry Examination given by the American Registry of Radiologic Technologists (ARRT).

This Imaging Sciences Program is a selective program with limited enrollment due to accreditation standards set by the Joint Review Committee on Education in Radiologic Technology (JRCERT). Once accepted, it is a full-time program with the students rotating to the clinical sites and to the didactic instruction at Ivy Tech Community College.

For some health programs, you may not be eligible to be licensed or certified if you have been convicted of a felony. Please check with the Program Chair if you have questions concerning this before enrolling in the program or you may contact the American Registry of Radiologic Technologists (ARRT) http://www.arrt.org.
IMAGING SCIENCES PROGRAM MISSION STATEMENT
The Mission of the Imaging Sciences Program at Ivy Tech Community College in Indianapolis, Indiana, is to provide graduates knowledge through educational opportunities in Imaging Sciences, therefore providing Indianapolis and the surrounding areas with competent individuals to function within a healthcare environment.

PROGRAM GOALS
1. Students will be clinically competent
2. Students will develop problem-solving and critical thinking skills.
3. Students will prepare for life-long learning
4. Students will demonstrate effective communication skills.

PROGRAM OUTCOMES
1. Students will provide appropriate patient care
2. Students will practice radiation safety principles
3. Students will be adequately prepared to perform as entry level practitioners
4. Students will apply problem solving skills
5. Students will demonstrate critical thinking skills
6. Students will successfully complete the program
7. Students will demonstrate oral communication skills
8. Students will demonstrate written communication skills
9. Students will demonstrate professional growth and development
10. Students and graduates will demonstrate work ethics
Radiologic Technology

*PHYSICAL DEMANDS AND REQUIREMENTS*

- **Standing** - Standing is required 95-100% of the time throughout the assigned clinical hours. Essentially, the position cannot be performed without the ability to stand for long periods of time.

- **Walking** - Walking is required 90-100% of the time during the course of the assigned clinical hours.

- **Climbing** - Climbing is not required except for stairs.

- **Pushing** - Pushing is required for moving the patients to and from the x-ray table

- **Pulling** - Pulling is required for both short and long duration's when moving patients onto tables and when transporting to and from units. X-ray apparatus including tubes and monitors may require significant physical exertion.

- **Lifting** – Up to 50 lbs. Most significant: must be able to assist patient to and from x-ray table

- **Carrying** - Students consistently carry film cassettes/magazines and other supplies. See lifting.

- **Exposure to Disease** - On a daily basis, involves caring for the patients with known and potential infections

- **Handling Repulsive Tasks** - Involves handling and disposing of body secretions, blood, stool, etc. The general cleaning and maintenance of an incontinent patient is not uncommon

- **Working in Confined Places** - Confined places included the processing darkroom, which is frequently used each day. Each time being 1-5 minutes in duration. Must be able to work around constantly running water

- **Exposure to Potentially Harmful Radiation** - Daily contact with radiation producing devices.

- **Visual** – 20/100 vision, correctable (with glasses or contacts) to 20/30 in one eye or 20/100 vision correctable (with glasses or contacts) to 20/40 in both eyes

- **Auditory and Speech** – Student must be able to respond to auditory codes, phones, equipment noise and/or verbal expressions from patients and physicians for proper patient care. The student must be able to verbally communicate medical information to the patient, staff, physicians, and general public.

* If you do not meet these requirements, check with the Disability representative at your campus for assistance.
## Imaging Science Program

**RADIOLOGIC TECHNOLOGY**

Prerequisites (shaded area) and Program Curriculum

Semester Sequence

<table>
<thead>
<tr>
<th>GENERAL EDUCATION PREREQUISITES 1ST SEMESTER</th>
<th>CREDITS</th>
<th>RADIOLOGY TECHNOLOGY CURRICULUM SUMMER SEMESTER</th>
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<tr>
<td>IVYT 101 - Life</td>
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<tr>
<td>APHY 101 – Anatomy &amp; Physiology I</td>
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<td>RADT 201 – Radiographic Positioning III &amp; Lab</td>
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<td>MATH 136 – College Algebra</td>
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<td>RADT 202 – Radiographic Clinical Education III</td>
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<td>ENGL 111 – English Composition</td>
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<td>HLHS 101 – Medical Terminology</td>
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<tr>
<td>APHY 102 – Anatomy &amp; Physiology II</td>
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<td>RADT 221 – Pharmacology &amp; Advanced Procedures</td>
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<td>COMM 101 – Speech or COMM 102 – Interpersonal Communication</td>
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<td>RADT 209 – Radiographic Positioning IV</td>
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<tr>
<td>CINS 101 – Introduction to Microcomputers</td>
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<td>RADT 203 – Radiographic Clinical Education IV</td>
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<td>PSYC 101 – General Psychology or SOCI 111 – Principles of Sociology</td>
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<td>RADT 218 – Imaging Production &amp; Evaluation II</td>
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<td>RADT 111 – Orientation and Patient Care</td>
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<td>RADT 204 – Radiographic Clinical Education V</td>
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<td>RADT 114 – Radiographic Clinical Education I</td>
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<td>RADT 299 – General Examination Review</td>
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<td>RADT 113 – Radiographic Positioning I &amp; Lab</td>
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<td>RADT 250 – Cross Sectional Anatomy</td>
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<td>RADT 117 – Radiation Physics &amp; Equipment Operation</td>
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<td>RADT 116 – Radiographic Clinical Education II</td>
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<td>RADT 112 – Image Production &amp; Evaluation I</td>
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<tr>
<td>RADT 206 – Radiobiology and Radiation Protection</td>
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<tr>
<td><strong>Total</strong></td>
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Radiologic Technology
APPLICATION AND SELECTION PROCESS

If You Are Planning To Apply To The Imaging Sciences Program, PLEASE Read This Information Carefully

The Imaging Sciences Program has a limited enrollment based on the standards set by the Joint Review Committee on Education in Radiologic Technology (JRCERT). Applications to the program and/or completion of prerequisite courses do not guarantee admission into the technical portion of the program.

PRE- RADIOLOGY STEPS:
Since the Imaging Sciences Program is a selective program, it is important that you closely follow the application steps and the requirements that follow:

1. The following steps are required for new Ivy Tech Community College students:
   - Complete the application process for Ivy Tech Community College in the Admissions Office at any campus or on-line at www.ivytech.edu/apply-now.html.
   - Attend an “Admission Workshop” presented by Student Services.
   - Provide any previous college official transcript(s).
   - Complete the Compass Assessment test, if applicable.
   - Make an appointment with your campus Student Success Assistant to help you with this process and to help you interpret your Compass scores.
   - If necessary, complete any of the Academic Skills courses required from the results of your Compass test.
   - Complete IVYT 101 during your first semester at the College.

2. Once the student begins taking the General Education courses (see the list in this packet), the Imaging Sciences Program faculty becomes your college advisor.
   - The student should attend an Imaging Sciences information session during the first semester of prerequisites to be sure that the student is taking the appropriate courses and in the correct sequence. The dates and times are listed on the website. www.ivytech.edu/indianapolis

3. Meet all of the physical requirements (see sheet in packet).

4. Complete the prerequisites by the due dates (see below).

5. Complete the TEAS - (Test of Essential Academic Skills) – by the last business day of January, 2012. (See below for details concerning the TEAS test).

IMAGING SCIENCES APPLICATION REQUIREMENTS:
1. Send the “Application” (use the form in this packet) for the Imaging Sciences Program to the Program Office (Indianapolis campus). Room 319 Fairbanks Bldg
   - Deadline is the last business day of January, 2012.

2. Submit an Ivy Tech Community College transcript to the Imaging Sciences Program at the Indianapolis campus with the application.
3. If you have previous college courses from other colleges/universities that have been officially approved as transfers by the registrar's office at Ivy Tech Community College, you will need to send a copy of the official transcript from those colleges/universities to the Imaging Sciences Program office at the Indianapolis, IN campus.
   - This means you will need to request 2 copies from the college/university; one copy will go to the campus where you initially registered and one copy will go to the Imaging Sciences Program in Indianapolis. This also must be sent with the application.

4. Successfully complete the following four (4) prerequisite courses by the end of the Fall semester, December 2011. These are the courses that will be awarded points for GPA.
   - APHY 101 – Anatomy and Physiology I
   - ENGL 111 – English Composition
   - HLHS 101 – Medical Terminology
   - MATH 136 – College Algebra

5. Successfully complete all other prerequisites by June 1st of 2011. The GPA in these courses is not used in calculations for GPA and student selection. These courses are the following:
   - CINS 101 – Introduction to Microcomputers
   - PSYC 101 or SOCI 111 – Either Psychology or Sociology
   - COMM 101 or COMM 102 – Either Speech or Interpersonal Communication
   - AHPY 102 – Anatomy and Physiology II
   - MATH 136 – College Algebra or MATH 131 – Algebra-Trigonometry
   Failure to complete the prerequisites would mean that the student would forfeit his or her spot and the next student with the highest points will be offered admittance into the program.

6. Take the TEAS test by the application date, last business day of January, 2012.
   - The TEAS can be taken at the Fairbanks campus. Check times and availability at the testing center.
   - The TEAS may be taken up to 3 (three) times in a two year period. Only the first three scores will be considered.
   - There must be 30 days between the test dates.
   - The student must pay the approved testing fee each time.
   - Exam scores will be valid for 2 (two) years from the date of the initial TEAS test.
   - The adjusted composite score from all four components will be used to determine points. The components are Reading, Math, Science, and English.
   - It is recommended that you take the TEAS more than 30 days before the Application due date so you have time to repeat it if you want to attempt a higher score.
   - Submit scores with application.
**Clinical Rotations**

Students will be required to rotate to different hospitals and clinics for the clinical portion of their education. Students will be assigned locations before each semester begins. Proximity to a clinical site does not guarantee rotation to that site. The currently approved clinical sites include the following:

- Clarian North Medical Center-Carmel, IN
- Fayette Memorial Hospital-Connersville, IN
- Home Hospital-Lafayette, IN
- Johnson Memorial Hospital-Franklin, IN
- Major Hospital-Shelbyville, IN
- Rampart Radiology Clinic-Shelbyville, IN
- Schneck Medical Center-Seymour, IN
- Westview Hospital-Indianapolis, IN
- White County Hospital-Monticello, IN
- Witham Hospital-Lebanon, IN

**FAQ**

1. **How many students do you accept every year?**
   Presently it is 15.

2. **How many applications do you receive?**
   It varies from year to year but average is around 70.

3. **Is there a waiting list?**
   No, we do not use a waiting list. If an applicant is not selected, then he or she must reapply the following year.

4. **What is your deadline for the application?**
   The deadline is the last business day of January.

5. **When are students selected?**
   The selection process will be no later than midterm of the Spring semester.

6. **How will I know if I am accepted?**
   Students will receive a letter through email from the Program Chair regarding acceptance or non-acceptance.

7. **What are the prerequisites?**
   See the curriculum sheet in this booklet.

8. **Do I have to take the prerequisites in Indianapolis?**
   No, the prerequisites may be taken at any Ivy Tech campus.

9. **What is the TEAS?**
   The TEAS stands for Test of Essential Academic Skills which is a scholastic aptitude assessment test. This test covers four general areas: Math, Reading, English, and Science.
10. Where do I take the TEAS?
   See information about TEAS in the selection process of this packet. TEAS can be
taken at the testing center on the Fairbanks campus.

11. What do I need to score on the TEAS?
   We do not do our TEAS scoring like nursing. We use the “adjusted individual total
   score” found in the upper right-hand side of the results that are given from the test
   center. So for example, if the score was 82.5, then the points awarded to the student
   would be 8.25. Since 2009 was the first year we required the TEAS we do not have a
   lot of data. As of this writing, the average TEAS score for 2010-2011 application was
   77.4. Remember this is the average, not necessarily the scores of those that were
   accepted into the program.

12. How can I study for the TEAS?
   There is a Pre-Test manual for the TEAS test available in the Ivy Tech bookstore.
   There is also information about the teas test with practice test on the library website.
   http://wwwcc.ivytech.edu/library/central-indiana/index.html
   For sample questions and testing tips also go to www.atitesting.com.

13. How are students selected?
   The selection process is decided by a point system. Points are awarded for the
   following:
   ● GPA of the following: APHY 101 – Anatomy and Physiology I, ENGL 111 –
     English Composition, HLHS 101 – Medical Terminology, MATH 136
     ○ These must be completed by the end of December, 2010.
   ● Composite score of the TEAS test.

14. Where are your clinical sites?
   Students will be required to rotate to different hospitals and clinics for the clinical
   portion of their education. Students will be assigned locations before each semester
   begins. Proximity to a clinical site does not guarantee rotation to that site.

15. Can I take the prerequisite courses in the summer if I didn’t get them done in
    the Spring semester?
   No, the last of the required general education courses must be completed by the end
   of the spring semester of the year you apply for selection. By signing the application
   the student states that he or she will successfully complete the remainder of the
   prerequisite courses before the end of the Spring semester of the year that the
   student applies to the program.

16. What do I need to do if I am accepted?
   If you are accepted into the radiologic technology program, you will need to do the
   following:
   ● Attend the summer orientation.
   ● Submit a current physical by a medical doctor.
   ● Have a TB skin test and a Rubella Titer.
   ● Have a current CPR card.
   ● Hepatitis B surface antibody shot is recommended but is optional. Details will be
     sent prior to starting the program.
   ● Required to travel to the various clinical sites.
17. **What happens if I don’t get accepted?**
   If the student is not accepted into the imaging sciences program the student may...
   - Reapply the following year and submit new transcripts and scores if repeated.
   - Consult with your advisor for other programs that you may complete or be eligible to pursue.
   - Discuss with the Imaging Sciences Program faculty on areas that need to be improved.
   - Discuss with the Imaging Sciences Program faculty an alternate plan.

18. **Will I learn US, CT, or MRI in the Imaging Sciences Program?**
    Not ultrasound or MRI but some basics of CT. The imaging sciences program is to prepare students for radiology and x-rays. During the program, students will be introduced to other imaging modalities but will not learn how to do medical procedures. Presently, the Terre Haute campus does offer an AS degree in Sonography.

19. **What is the cost of the program?**
    The program is 80 credits so multiply 80 x the present tuition for ITCC (you can go to [www.ivytech.edu](http://www.ivytech.edu) for current tuition). Other cost includes:
    - 2 scrub outfits and shoes. These prices will vary depending on where you purchase these articles.
    - There is also a cost for books and lab fees. This too will vary according to market value but I would estimate to be around $1,200 -1,500.
    - Dosimetry badges and service: $30.00 per semester.
    - Students will also travel to a variety of clinical sites so gasoline is another cost.

20. **Can I work and be in the program?**
    You can but we don’t recommend it. The regular hours of attending class and going to clinicals are about 32-34 hours a week and you still need study time on top of that.

21. **Can I take classes at night?**
    Any of the prerequisites may be taken at anytime at any campus but once admitted into the program, most courses are daytime. Students are scheduled for some afternoon clinical rotations during their fourth and fifth semesters.
Evaluation Grid (Example)

Name: Ann Wilcox  
Student ID - C0012345678

GPA Points for Courses: For each letter grade received in the prerequisites courses, the student will receive points according to the following scales:

<table>
<thead>
<tr>
<th>APHY, MATH, HLHS</th>
<th>ENGL Courses</th>
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<tbody>
<tr>
<td>A = 6 points</td>
<td>A = 3 points</td>
</tr>
<tr>
<td>B = 4 points</td>
<td>B = 2 points</td>
</tr>
<tr>
<td>C = 2 points</td>
<td>C = 1 points</td>
</tr>
<tr>
<td>D = 0 points</td>
<td>D = 0 points</td>
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</tbody>
</table>

**Course Number and Name** | **GPA Points**
--- | ---
APHY 101 – Anatomy & Physiology 1 | A 6
ENGL 111 – English Composition 1 | A 3
MATH 111 or MATH 136 (Highest score if both) | B 4
HLHS 101 – Medical Terminology | C 2

**Total** 15

Course Completion:

**Course Number and Name** | **Semester Completed** | **Pass**
--- | --- | ---
APHY 102 – Anatomy & Physiology 1 | 091 | √
CINS 101 - Microcomputers | 093 | √
COMM 1XX | 093 | √
MATH 136- College Algebra | 093 | √
PSYC 101 or SOCI 101 | 091 | √
IVYT 1XX | 091 | √

**Number Successfully Completed** 6

TEAS:
Point totals are taken from the adjusted individual total score and a decimal point will be placed between numbers (example: 82% is equal to 8.2 points).

**TEAS Test Area** | **Percentage Received** | **Points Earned**
--- | --- | ---
Adjusted Individual Total Score | 82.8 | 8.28

**Total Points:** 8.28

**GPA** = 15
**TEAS** = 8.28
**Total** = 23.28
APPLICATION TO THE IMAGING SCIENCES PROGRAM

Name ___________________________________________________________ (Last) (First) (Middle)

College ID # C0___________

Street Address _______________________________________________________

City _________________________________________________________________

State ___________________________ Zip _______________________

Home Phone # ____________________________

Daytime or cell phone number # ____________________________

Ivy Tech Campus Connect E-Mail address _______________________________________

By signing this Application, I hereby acknowledge that I must complete all the required
general education courses by June 1, 2012.

Signature of Applicant ___________________ Date ____________

Submit the Application no later than the last business day of January to the campus in
which you want to apply. See contact information below.

Ivy Tech Community College of Indiana provides equal opportunity to all applicants. Applicants will
be evaluated on merit not on basis of race, color, religion, creed, gender, national origin, disability,
marital or veteran status, sexual orientation, or any other legally protected status.

OFFICIAL USE: Received on ____________________

Central Indiana
9301 E. 59th Street
Indianapolis, IN 46216
Ann Wilcox – Chair
317-921-4438
asisel@ivytech.edu

East Central
261 S. Commerce Drive
Marion, IN 46953
Debbie Dillman – Chair
765-651-3100
dillman@ivytech.edu

Wabash Valley
8000 S. Education Drive
Terre Haute, IN 47802
Lou Ann Wisbey – Chair
812-298-2242
lwisbey@ivytech.edu
Certification/Licensure Training Disclaimer

Ivy Tech Community College cannot guarantee that any student will pass a certification or licensing exam. Your success will be determined by several factors beyond the instruction you are given in the classroom including your test-taking skills, your willingness to study outside of class, and your satisfactory completion of appropriate practice exams. Certification and licensure exam questions are drawn from databases of hundreds of possible questions; therefore, a thorough understanding of the subject matter is required. The goal of Ivy Tech in providing a certification/licensure exam studies class is to assist you in understanding the material sufficiently to provide a firm foundation for your studies as you prepare for the exam.