

# ALLIED HEALTH | BACHELOR OF SCIENCE IN MEDICAL DIAGNOSTIC IMAGING

Increased technology has prompted many hospitals to seek to employ RTs who have been trained in two or more skilled areas. This program provides you the opportunity to pursue cross-training in various areas of advanced imaging. During different times of the year, you may be able to attend course sequences in modalities such as computed tomography (CT), ultrasound (US), cardiovascular-interventional technology (CVIT), mammography (M), magnetic resonance imaging (MRI), or bone densitometry (BD). This degree is also available online.

## Program Summary

The B.S. in Medical Diagnostic Imaging requires a minimum of 120 Credit Hours for graduation, including:

Code	Title	Hours
General Education		34
Cognate courses		29
Medical Diagnostic Imaging Core Courses		30
Open Electives <sup>1</sup>		27
<b>Total Hours</b>		<b>120</b>

<sup>1</sup> Open electives are the credit hours required to reach a minimum of 120 total hours and 45 upper-level hours. The number listed assumes all courses are completed at FHSU as listed. This number may vary if students transfer courses, or have individual substitutions allowed.

Students should speak with their advisor if either situation applies to determine if the number will vary, and to ensure they enroll in a minimum of 45 upper-level hours.

Students entering within 1 year of high school graduation will take UNIV 101 Freshman Seminar and may apply that hour in the open elective category.

## Program Requirements

### General Education

All undergraduate degrees require completion of the Kansas Systemwide General Education (<https://catalog.fhsu.edu/general-education/>).

Courses identified with <sup>GE</sup> on this page may satisfy a general education requirement in addition to the identified degree requirement. Students who apply a degree requirement to satisfy a general education requirement will typically add an equal number of hours to the the university elective category. This flexibility may allow you to complete a minor or certificate within the 120 hour degree. Transfer students and students majoring in programs with approved exceptions (<https://www.fhsu.edu/general-education/documents/fhsu-gen-ed-transfer-exceptions-explainer1.pdf>) are especially encouraged to select these courses in completing General Education requirements to maximize the likelihood of completing the degree with 120 credit hours.

Code	Title	Hours
General Education		34-35

Code	Title	Hours
<b>Department Cognate Courses (required)</b>		
ENG 101	English Composition I	3
ENG 102	English Composition II	3
COMM 100	Fundamentals of Oral Communication	3
BIOL 100	Human Biology	3
BIOL 102	Laboratory Experiences in Biology	1
BIOL 230	Anatomy and Physiology I	3
BIOL 230L	Anatomy and Physiology I Laboratory	1
BIOL 231	Anatomy and Physiology II	3
BIOL 231L	Anatomy and Physiology II Laboratory	1
BIOL 245	Medical Terminology	2
MATH 110	College Algebra	3
<b>Total Hours</b>		<b>26</b>

Required Cognates can be used to satisfy the first four areas of the General Education requirements; English, Communication, Math & Statistics, and Natural & Physical Sciences.

Code	Title	Hours
<b>Department/Major Requirements</b>		
Select a minimum of 30 credits from the following:		30
MDI 410	Cross-Sectional Anatomy: Normal	
MDI 411	Sectional Pathology & Variant Anatomy	
MDI 412	Computed Tomography Procedures	
MDI 413	Computed Tomography Physics & Instrumentation	
MDI 414	Medical Imaging Clinical Preceptorship	
MDI 417	MRI Physics and Instrumentation	
MDI 418	Cardiovascular-Interventional Technology	
MDI 419	Mammography for Radiologic Technologists	
MDI 420	Leadership and Management of Radiology	
MDI 422	Advanced Patient Care for Imaging Professionals	
MDI 423	Bone Densitometry Techniques	
MDI 424	Advanced Mammography	
MDI 425	Digital Mammography	
MDI 426	Advanced Cardiovascular Interventional Technology	
MDI 427	CVIT Pathology and Case Review	
MDI 428	Principles of Diagnostic Medical Sonography	
MDI 430	PACS Administration	
MDI 431	MRI Procedures	
MDI 432	Managing Change in Healthcare	
MDI 433	Emerging Issues in Health Care	
<b>Total Hours</b>		<b>30</b>

<sup>1</sup> In addition to the prerequisite courses, all students must complete the KBOR General Education Program (<https://www.fhsu.edu/general-education/>).

## Degree Requirements

Code	Title	Hours
<b>All bachelor degrees require:</b>		
GPA of 2.0 on FHSU courses & 2.0 on all coursework (Higher program requirements prevail over the 2.0 when set)		
A minimum of 30 hours earned from FHSU with a grade of D, C, B, or A		
Successful completion of an upper division Writing and Information Literacy course (Most majors contain a course designated)		
A minimum of 45 hours of recognized upper division credit		
A minimum of 120 hours of recognized college credit		

## Degree Maps

Course	Title	Hours
<b>First Year</b>		
<b>Fall</b>		
SGE010 - English Discipline Area		3
SGE030 - Math Statistics Discipline Area		3
BIOL 245	Medical Terminology	2
UNIV 101	Freshman Seminar	1
SGE070 - Institutionally Designated Area: Personal and Professional Development		3
SGE020 - Communication Discipline Area		3
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
SGE010 - English Discipline Area		3
SGE020 - Communication Discipline Area		3
Open Electives		3
<b>Hours</b>		<b>9</b>
<b>Second Year</b>		
<b>Fall</b>		
SGE040 - Natural Physical Science Discipline Area		4
<b>Hours</b>		<b>4</b>
<b>Spring</b>		
SGE060 - Arts Humanities Discipline Area		3
<b>Hours</b>		<b>3</b>
<b>Third Year</b>		
<b>Fall</b>		
SGE050 - Social Behavioral Sciences Discipline Area		3
<b>Hours</b>		<b>3</b>
<b>Spring</b>		
SGE060 - Arts Humanities Discipline Area		3
<b>Hours</b>		<b>3</b>
<b>Fourth Year</b>		
<b>Fall</b>		
SGE050 - Social Behavioral Sciences Discipline Area		3
SGE070 - Institutionally Designated Area: Personal and Professional Development		3
<b>Hours</b>		<b>6</b>
<b>Spring</b>		
SGE070 - Institutionally Designated Area: Critical Thinking		3
<b>Hours</b>		<b>3</b>
<b>Total Hours</b>		<b>46</b>

to change. Students should consult with their academic advisors for additional guidance on course planning.

To determine courses to take in the directed choices (often listed as Program Elective Course) and directed elective course blocks see the overview tab for courses. To locate approved courses in General Education areas (Undergraduate Programs) see the general education section (<https://catalog.fhsu.edu/general-education/>) of the catalog.

The undergraduate course maps typically advise the most efficient route for students to complete the general education requirements. Courses that are required in the major may be listed as fulfilling relevant general education requirements. This will result in more open elective course hours in some maps than is listed on the degree overview page.

**Academic Degree Maps** are term-by-term sample course plans that specify milestones, courses, and special requirements that are necessary for facilitating on-time completion. Degree Maps are *examples* and are not prescriptive. Individualized choices such as concentration options, transfer credits, optional minors, advisory programs (certificates), etc. can alter the recommended coursework. Course offerings are subject