



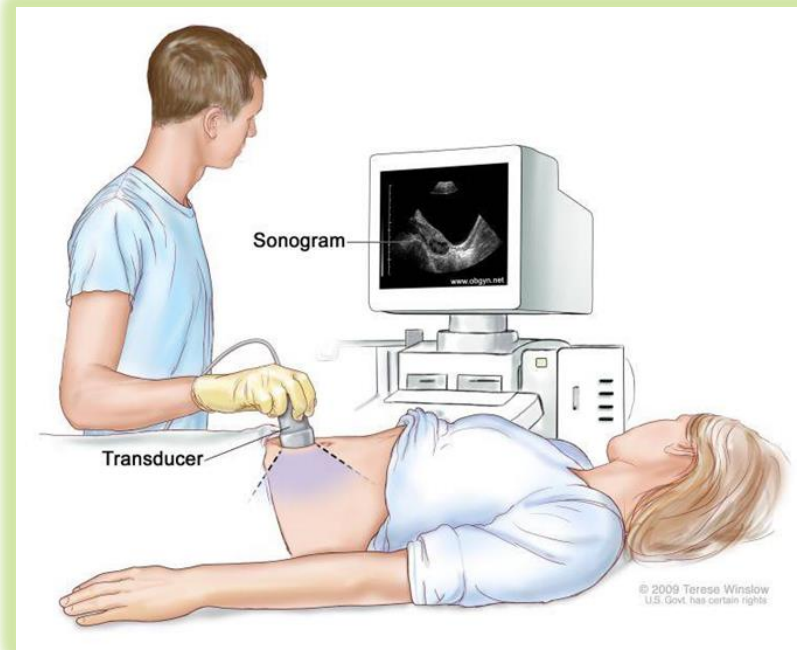
College of DuPage

Diagnostic Medical Imaging Sonography (DMIS) Programs Advising Session



What is Ultrasound/Sonography?

- Clinical discipline.
- Use of equipment that produces sound waves which are converted into images of human anatomy.
- Medical interpretation and diagnosis by a Radiologist.
- Sonography programs at COD prepare students for entry-level positions in Sonography.



What Do Sonographers Scan?

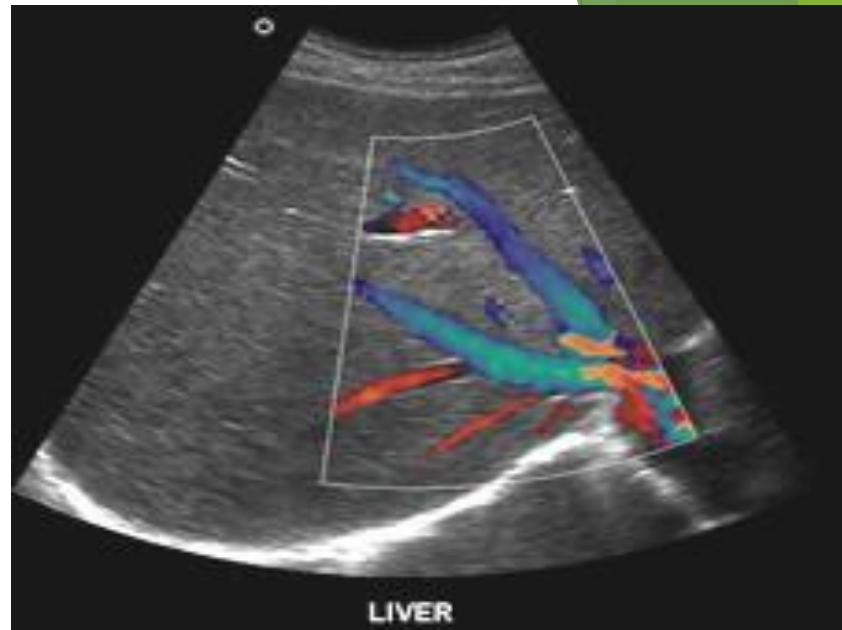
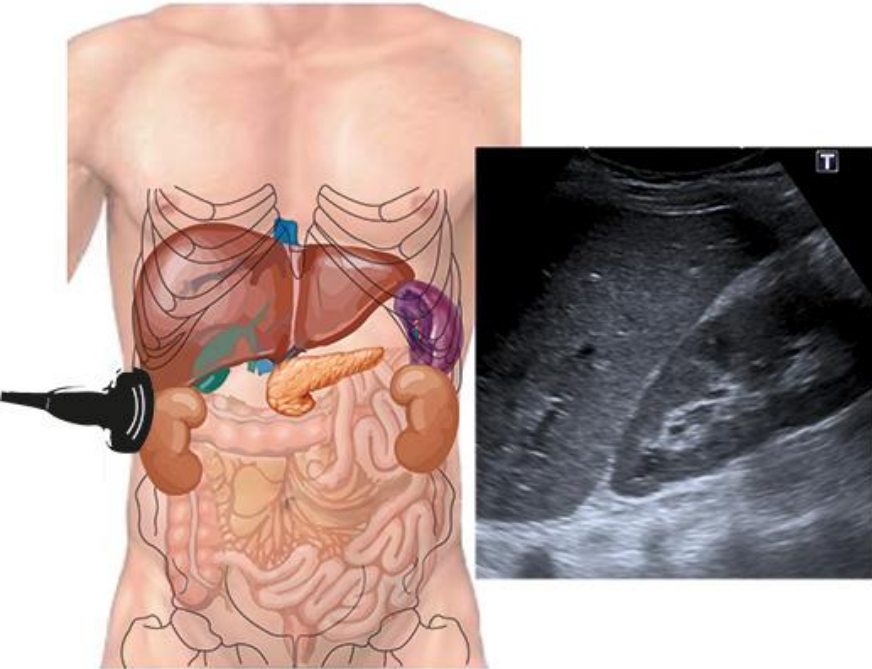
Sonography Lab at COD

- Liver
- Gallbladder
- Pancreas
- Spleen
- Kidneys
- Uterus/Ovaries
- Testicles
- Thyroid
- Obstetrics
- Breast
- Arteries/Veins
- Pediatric Hips/Spine
- Neonate Heads
- Assist with Biopsies/Aspirations



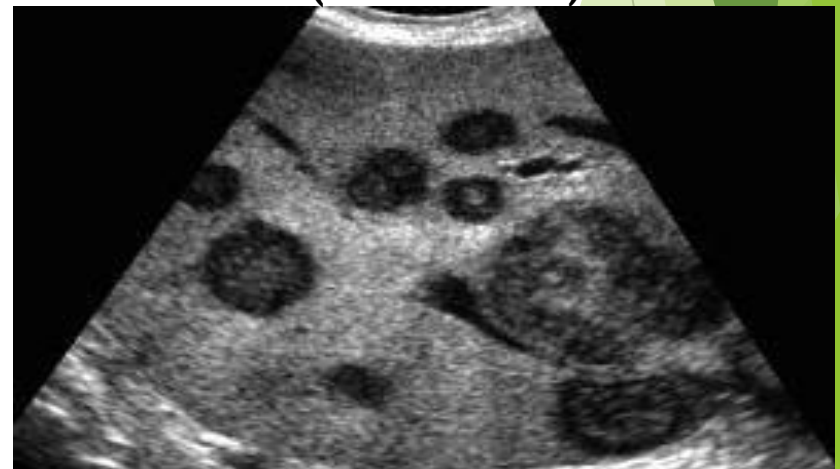
KIDNEYS/LIVER

Scanning Approach/View



Color Doppler of Hepatic Veins

Liver Masses (Dark Areas)



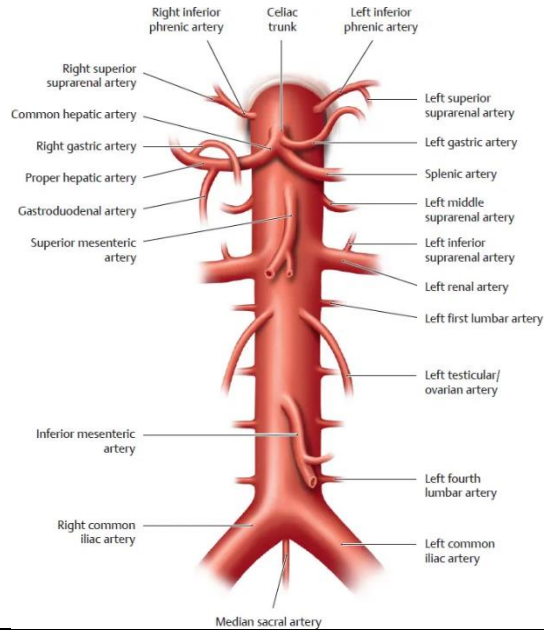
Images of a Kidney

Longitudinal & Transverse Scan Plane

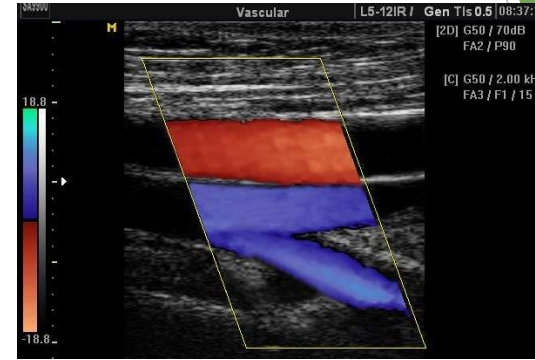


Vascular Sonography

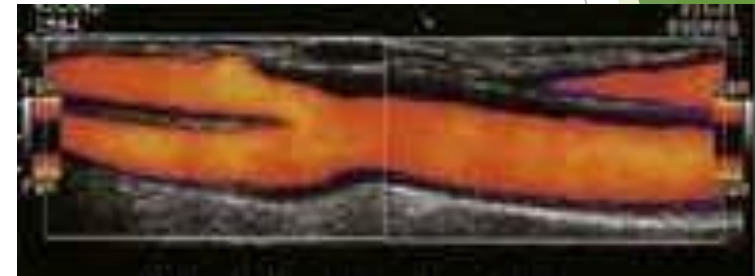
Abdominal Aorta



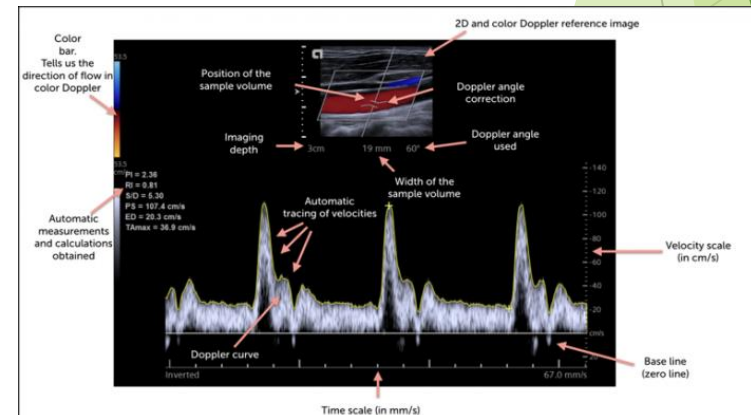
Femoral Vein & Artery



Carotid Artery

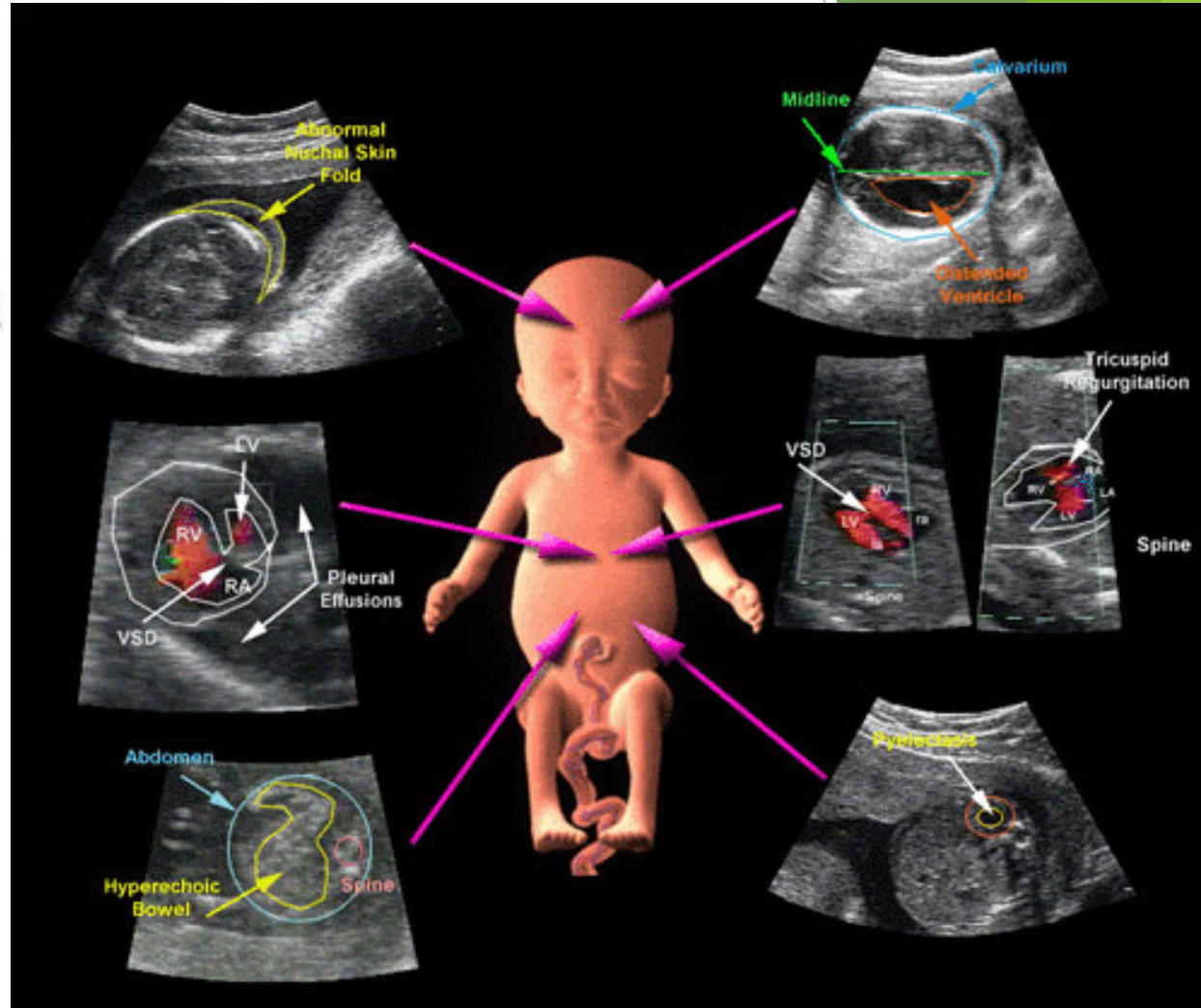


Pulsed Wave Doppler



OBSTETRICS

Transabdominal Fetal Ultrasound



Earning Your Sonographer Credentials

(*Because the certificate(s) or degree alone is not enough!)

American Registry of Diagnostic Medical Sonographers (ARDMS)

| CREDENTIAL EARNED | EXAMINATION NEEDED | CORRESPONDING SPECIALTY EXAMINATION |
|---|---|--|
| RDMS® Registered Diagnostic Medical Sonographer | SPI Sonography Principles & Instrumentation Examination | Abdomen (AB) Examination |
| | | Breast (BR) Examination |
| | | + Fetal Echocardiography (FE) Examination |
| | | Obstetrics & Gynecology (OB/GYN) Examination |
| | | Pediatric Sonography (PS) Examination |
| RDCS® Registered Diagnostic Cardiac Sonographer | SPI Sonography Principles & Instrumentation Examination | Adult Echocardiography (AE) Examination |
| | | + Fetal Echocardiography (FE) Examination |
| | | Pediatric Echocardiography (PE) Examination |
| RVT® Registered Vascular Technologist | SPI Sonography Principles & Instrumentation Examination | + Vascular Technology (VT) Examination |
| RMSKS™ Registered Musculoskeletal Sonographer | SPI Sonography Principles & Instrumentation Examination | + Musculoskeletal Sonographer (MSKS) Examination |

COD DMIS =

* Breast = Trained but not eligible for exam

Programs & Application Requirements

CERTIFICATES

General (Advanced Certificate) 18 months

- *Training in Abdomen & Obstetrics/Gynecology Sonography
- *Must already be a currently licensed healthcare professional with a completed associates degree in either Radiology, Nursing, Physical Therapy, etc.
- *PLUS – Possible Prerequisite Coursework

Vascular (Vascular Technology Certificate) 6 months

- *Training in Vascular Sonography
- *Must already be a currently registered Sonographer in either Obstetrics/Gynecology (RDMS), Abdomen/Superficial Structures (RDMS), or Echocardiography (RDCS)
- *PLUS – Possible Prerequisite Coursework

DMIS AAS DEGREE (Vast Majority of Applicants)

2 years not including prerequisites

- *Training in Abdomen & Obstetrics/Gynecology & Vascular Sonography
- *Must be a HS/GED graduate, and complete specific general education prerequisites PLUS, courses specific to sonography that can only be taken at COD

*See admission packets for more information:

Link: [Sonography Program | College of DuPage \(cod.edu\)](https://www.cod.edu/sonography)

So...

▶ **COD Advanced Certificate makes you eligible for:**

SPI, Abdomen & Obstetrics/Gynecology Exams

= Jimmy Page, RDMS

▶ **COD Vascular Certificate makes you eligible for:**

SPI & Vascular Technology Exams

= Taylor Swift, RVT

*These days employers want you to know it all!

(so, you would 100% want to take both certificates to become RDMS, RVT !!)

▶ **COD AAS Degree makes you eligible for:**

SPI, Abdomen, Obstetrics/Gynecology, & Vascular Technology Exams

= Patrick Kane, RDMS & RVT

*Breast (*Trained but not eligible for the exam.*)

AAS Degree Prerequisites

Completion required by end of Spring semester preceding Fall program start.

| COURSE # | COURSE TITLE | GRADE REQUIRED |
|---|---|-----------------------|
| ENGLISH 1101 | English Composition I | “C” or higher |
| SPEECH 1100 or 1120 (or equivalent) | Fund. Speech Communication Small-Group Communication | “B” or higher |
| ANAT 1552 or 1572* | Human Anatomy & Physiology II or Human A & P with Cadaver II | ‘B’ or higher |
| <i>*Prerequisite: A&P 1551 or 1571 with a grade of ‘B’ or higher</i> | | |
| HUMANITIES | Any Humanities Course | ‘C’ or higher |
| PSYCH 1100 (or equivalent) | General Psychology | ‘C’ or higher |
| HLTHS 1110* | Biomedical Terminology | ‘B’ or higher |
| *MATH 1120 | Mathematical Foundations for DMIS | ‘B’ or higher |
| OR Algebra/Statistics/or higher AND Gen. Physics or Radiographic Physics | | ‘B’ or higher |
| *DMIS 1110 | Basic Patient Care Skills for Sonographers | ‘B’ or higher |
| *DMIS 1105 | Intro to Pathophysiology for Sonographers | ‘B’ or higher |

***These are only offered at COD. They are not offered Summer semester.**

NOTE: The DMIS Program is undergoing revisions.

Please monitor the program admission packet for updates and/or modifications.

Program Schedules

CERTIFICATES

Advanced General Sonography Certificate Program

*It is an 18-month certificate program.

*The program is full-time on campus and at hospitals.

1st semester = (2) 12-hour days & evenings on campus

2nd-4th semesters = (2) 8-12-hour days & evenings on campus AND
(3) 8.5 hour shifts per week at a hospital/clinic

Vascular Sonography Certificate Program

*It is a 6-month certificate program.

*The program is mostly full-time on campus and at hospitals.

1st semester = (2) 8-12-hour days & evenings on campus AND (3) 8.5
hour shifts per week at a hospital/clinic

2nd semester = (3) 8.5 hour shifts a week at a hospital/clinic

DEGREE

Sonography Degree Program

*It is a 2-year degree program (not including prerequisites).

*The program is full-time on campus and at hospitals.

1st semester = (2) 12-hour days & evenings on campus

2nd -5th semesters = (2) 8-12-hour days & evenings on campus AND
(3) 8.5 hour shifts per week at a hospital/clinic

6th semester = (3) 8.5 hour shifts a week at a hospital/clinic

Clinical shifts will be days, nights and/or weekends, the hospital/clinic sets the schedule

Where, How, When would I work

Depends on.....

Type of Facility:

Hospital, Free-Standing ER, Quick Care Clinic,
Imaging Center, Obstetrics Office, Medical Clinic.

Type of Position:

Full Time, Part Time, Registry

Facility Hours:

Days, Nights, Overnight, Call, Weekends, Holidays

Pay:

Depends on type of position – FT/PT/Registry, & Location.
Starting pay is typically \$30-40. an hour in the Chicagoland
area. U.S. Department of Labor, Occupational Outlook
Handbook reports median as \$29.33 per hour (\$61k a year)

<https://www.bls.gov/ooh/healthcare/diagnostic-medical-sonographers.htm>



Program Costs

| Item | Estimated Cost |
|---|--|
| Non-Refundable College of DuPage Application | \$20.00 |
| Non-Refundable Health Career Application Fee | \$50.00 |
| HESI-A2 Admission Exam | \$60.00 |
| In-District Tuition (77 credits) (variable tuition applies to Sonography classes) <ul style="list-style-type: none"> > 58 credits of DMIS courses x \$274/credit = \$15,892.00 > 27 credits of General Education courses x \$152/credit = \$4,104.00 | \$19,996.00 |
| Uniform (approximate cost for 2 uniforms and 1 jacket) | \$130.00 |
| Books (approximate cost to purchase new) | \$1,200.00 |
| Course/Lab Fees (2 year malpractice insurance included) | \$1,922.00 |
| Criminal Background Check (see Health Requirement Packet for details (PDF)) | \$72.99 |
| Mandatory Drug Testing (\$33.99 per year) (see Health Requirement Packet for details (PDF)) | \$67.98 |
| Medical Document Manager (see Health Requirement Packet for details (PDF)) | \$19.49 |
| Health Requirements (see Health Requirement Packet for details (PDF)) | Varies |
| Estimated Total | \$23,538.46 + Health Requirements |

STANDARD SKILLS IN SONOGRAPHY

- ▶ To participate in the clinical education portion of the DMIS programs, the applicant must possess skills relevant to a sonography department. These technical standards are consistent with the duties of an entry-level sonographer. The student must have the ability to:
 - Lift and carry thirty pounds of weight.
 - Lift and transfer patients to and from wheelchairs, stretchers, beds, and imaging tables.
 - Move, adjust, and manipulate equipment to perform imaging studies.
 - Position patients for exams.
 - Respond appropriately to sounds such as the patient's voice and movements, at a normal conversational volume.
 - Review and evaluate recorded real time images to determine the quality of the image as well as demonstrate visual accuracy in differentiating subtle shades of grays used in sonographic imaging.
 - Respond appropriately to equipment signals such as sound and light.
 - Speak and write English fluently.
 - Manipulate necessary hospital equipment for patient care and patient imaging such as dials, switches, push buttons, and keyboards.
 - Stand and perform ultrasound exams for a prolonged period without scheduled breaks in a typical shift of 8-12 hours.
 - Manipulate a transducer with the right hand in a back-and-forth manner while maintaining balance as well as operating the machine controls with the left hand.
 - Communicate orally and in writing with the patient, doctors, and other personnel clearly and effectively.
 - Must be able to follow verbal and written directions.

- ▶ Other Skills Include:
 - Ability to view computer/ultrasound machine screens for extended periods.
 - Ability to deal with extremely ill patients.
 - Ability to make independent decisions using good judgment skills (as appropriate for level of education).
 - Ability to practice high quality patient care.
 - Ability to function with minimal assistance (as appropriate for level of education).
 - Exposure to hazardous chemicals, such as for probe and machine cleaning.
 - Recognition of needs and behaviors of a variety of age groups and abilities of patients treated.

Important Information to Review

See links below:

- ▶ [Health Requirements Packet \(cod.edu\)](#)

Health Requirement Information (essential functions/technical standards for acceptance, drug testing, criminal background check, immunizations, etc.)

- ▶ [Policies and Procedures | College of DuPage \(cod.edu\)](#)

Policy for Professional Conduct

Statement on Transportation

Prohibition of Discrimination and Harassment

Student Diversity

Student Email

Statement on Medical Care and Health Insurance

Statement on Medical Malpractice Insurance

Citizenship/Visa Status

How do I become part of this amazing field?



Qualify to apply to the program (by completing prerequisite classes and other application requirements)

*Have a Plan B (We have more applicants than seats available)

Apply to the program

(Acceptance into the programs is Merit Score based)

Complete certificate or degree requirements & sit for exams (for RDMS and/or RVT)

Start your career!

On average 75% of our students are hired prior to graduation!



WHAT DO I DO NEXT??

[Application Materials Checklist](#)

[Admissions Packet](#)

New to COD?

Already a COD student?



Questions? Please email:
Melissa McKirdie MS, RDMS, RVT
mckirdiem@cod.edu

**THANK
YOU
FOR
YOUR TIME
AND ATTENTION**

 **College of DuPage**