

HEATING, VENTILATION AND AIR CONDITIONING (HVAC)

IvyTech.edu/hvac



OVERVIEW

The HVAC program prepares students to gain knowledge and skills that will lead to gainful employment, advancement or to continue their education in the HVAC field. To accomplish the programs primary purpose, students are provided with practical experience and general theory of both commercial and residential heating, ventilation, air conditioning and refrigeration applications. The program is structured to develop the technical skills, general knowledge, and troubleshooting skills of graduates. Broad-based technical skills and critical thinking processes assist the student in adapting to changes in the ever growing and broadening field of Heating, Ventilation, Air Conditioning and Refrigeration. Additionally the program prepares graduates to transfer into baccalaureate degree granting institutions.

TWO-YEAR PROGRAM OPTIONS

ASSOCIATE OF APPLIED SCIENCE

(60 credit hours)

The HVAC Program prepares students for employment in a variety of commercial and residential areas. Professional/technical courses equip students with the skills to obtain employment and to advance in the workforce. The United Association of Plumbers, Pipefitters and Steam Fitters Local 157 now promote an AAS degree in HVAC for any new HVAC Technicians entering their apprenticeship. Many employers promote employees to achieve an AAS degree by offering incentive pay raises ... "Pay for Knowledge." The general education courses equip students with the problem solving, communications, scientific and mathematical skills to compete successfully in the job market. Professional/technical courses equip students with the skills to obtain employment and to advance in the workforce.

Average Hourly Wages: (\$15 to \$37)

ONE-YEAR PROGRAM OPTIONS

CERTIFICATES OFFERED

HVAC TECHNICAL CERTIFICATE (TC)

(31 Credit Hours)

Students obtaining a Technical Certificate are prepared to become HVAC Residential Technicians, Commercial Refrigeration Technician, Nursing Home Maintenance, Housing Complex Maintenance, schools, Hospitals and HVAC Supply Companies.

Average Hourly Wage (\$15 to \$23)

FOR MORE INFORMATION:

Coy A. Riley

Program Chair

Office: 765-269-5233

criley56@ivytech.edu

EMPLOYMENT:

- Plumbing and Heating contractors
- Commercial Refrigeration Contractors
- Manufacturers
- Housing Complexes
- Building Facility Maintenance-Hospitals and Schools
- PipeFitter & Plumbers Local Union 157
- Anderson Plumbing & Heating
- Lafayette Heating & Cooling
- ARS
- Caterpillar
- IU Health & St. Elizabeth

\$15-37 /hour median salary in Indiana

EARN MORE AND IMPROVE YOUR SKILLS

If you want a good-paying job, you need to invest in your education. With an associate degree from Ivy Tech Community College, you'll earn an average \$8,000 more each year than you would with just a high school diploma. Over the course of your career, this has a tremendous impact on your earning power-a difference of up to \$400,000. As a result, you'll have the chance to explore opportunities that are well worth the time you'll spend in class. Get started today. Call 888-IVY-LINE (888-489-5463 or visit IvyTech.edu/new-students.



OSHA CERTIFIED
Occupational Safety & Health

IF YOU'VE GOT QUESTIONS, WE'VE GOT ANSWERS.

FOR MORE INFORMATION:

School of Advanced Manufacturing, Engineering and Applied Science

765.269.5229



Ivy Tech Community College-Lafayette

HVAC

2018-2019

THE FOLLOWING SUGGESTED SEQUENCE INCLUDES ALL COURSE REQUIREMENTS FOR THIS DEGREE. YOU MUST CONSULT WITH AN ACADEMIC ADVISOR TO DETERMINE WHICH ELECTIVES BEST MEET YOUR CAREER GOALS.

CERTIFICATE PROFESSIONAL/TECHNICAL

| Course # | Title | Credit Hours |
|-------------------------------------|----------------------------------|--------------|
| HVAC 100 | Introduction to HVAC | 3 |
| HVAC 101 | Heating Fundamentals | 3 |
| HVAC 103 | Refrigeration I | 3 |
| HVAC 202 | Electrical Circuits and Controls | 3 |
| HVAC 208 | Heating Service | 3 |
| HVAC 211 | Refrigeration II | 3 |
| Choose ONE of the following: | | |
| BCTI 130 | Introduction to Electrical | 3-4 |
| INDT 113 | Basic Electricity | 3-4 |

Total Credit Hours: 21

TECHNICAL CERTIFICATE

Semester 1

| Course # | Title | Credit Hours |
|-------------------------------------|-------------------------------|--------------|
| HVAC 100 | Introduction to HVAC | 3 |
| HVAC 101 | Heating Fundamentals | 3 |
| HVAC 103 | Refrigeration I | 3 |
| IVYT 113 | Student Success in Technology | 1 |
| Choose ONE of the following: | | |
| BCTI 130 | Introduction to Electrical | 3-4 |
| INDT 113 | Basic Electricity | 3-4 |

Semester 2

| | | |
|----------|----------------------------------|---|
| HVAC 202 | Electrical Circuits and Controls | 3 |
| HVAC 208 | Heating Service | 3 |
| HVAC 211 | Refrigeration II | 3 |
| MATH 122 | Applied Technical Mathematics | 3 |

Semester 3

| | | |
|-------------------------------------|-----------------------------------|---|
| COMM 104 | Workplace Communication | 3 |
| Choose ONE of the following: | | |
| HVAC 107 | Duct Fabrication and Installation | 3 |
| HVAC 205 | Heat Pump Systems | 3 |

Total Credit Hours: 31

ASSOCIATE OF APPLIED SCIENCE

AFTER COMPLETING TECHNICAL CERTIFICATE

Semester 3 or 4

| Course # | Title | Credit Hours |
|-----------|---|--------------|
| ENGL 111 | English Composition | 3 |
| XXXX XXXX | Heating, Ventilation & Air Condit. Elective | 3 |
| XXXX XXX | Heating, Ventilation & Air Condit. Elective | 3 |
| XXXX XXX | Heating, Ventilation & Air Condit. Elective | 3 |
| XXXX XXX | Heating, Ventilation & Air Condit. Elective | 3 |

Semester 4 or 5

| | | |
|-------------------------------------|---|---|
| ^HVAC 279 | Green Awareness (Capstone) | 1 |
| XXXX XXXX | HUM/Social & Behavioral Sciences Elect. | 3 |
| XXXX XXX | Heating, Ventilation & Air Condit. Elective | 3 |
| XXXX XXX | Heating, Ventilation & Air Condit. Elective | 3 |
| Choose ONE of the following: | | |
| SCIN 101 | Science of Traditional & Alt. Energy | 4 |
| PHYS 100 | Introduction to Physics | 4 |

Total Credit Hours: 60

Ready to get started?

APPLY NOW FOR FREE

at IvyTech.edu/applynow

Symbol Key
^ Capstone Course

Our online application is FREE.
Why wait? Apply today! IvyTech.edu/applynow

