

# AIR CONDITIONING TECHNOLOGY



## WHAT IS AIR CONDITIONING TECHNOLOGY? Cool training for a hot career.

Do you enjoy working with your hands? Do you have a good mechanical sense? If so, you could do well in the Air Conditioning Technology Program at HCTC. It's an ideal way to learn the fundamentals of servicing and repairing heating, ventilation, air conditioning, and refrigeration systems. Become part of an increasingly important industry. Work for an established air conditioning and refrigeration service or start one of your own! The Air Conditioning Technology Program at HCTC teaches you how to operate, service, and repair air conditioning and refrigeration equipment, and more.

Heating and air-conditioning systems control the temperature, humidity, and the total air quality in residential, commercial, industrial, and other buildings. Refrigeration systems make it possible to store and transport food, medicine, and other perishable items and to maintain the way of life we've all come to expect.

## JOB OUTLOOK

Job prospects for heating, air-conditioning, and refrigeration mechanics and installers are expected to be excellent, particularly for those with training from an accredited technical school. Because of the increasing sophistication of heating, air-conditioning, and refrigeration systems, employers prefer to hire those with technical school training. A growing number of retirements of highly skilled technicians are expected to generate many job openings. In addition, employment of heating, air-conditioning, and refrigeration mechanics and installers is projected to increase faster than average for all occupations for many years to come. People and businesses depend on their climate-control systems and must keep them in good working order, regardless of economic conditions.

#GO2HCTC

One Community College Drive | Hazard, KY 41701 | (606) 436-5721 | [hazard.kctcs.edu](http://hazard.kctcs.edu)



*KCTCS is an equal educational and employment opportunity institution.*

KENTUCKY COMMUNITY AND TECHNICAL COLLEGE SYSTEM

# AIR CONDITIONING TECHNOLOGY

## CLASSES OFFERED

### AIR CONDITIONING TECHNOLOGY CREDENTIALS

Academic courses, theory courses, and laboratory experiences are designed to promote success in the air conditioning field.

#### DIPLOMA:

Heating, Ventilation, and Air Conditioning Mechanic

#### GENERAL EDUCATION:

Area 1 = Writing/Accessing Information, Oral Communications, Humanities/Heritage/ Foreign Language .....3  
Area 2 = Social Science, Behavioral Science, Natural/ Applied Science or Mathematics .....3  
Area 3 = Computer Literacy course or Demonstrated competency ..... 0-3  
**Subtotal Credits .....6-9**

ACR 100 Refrigeration Fundamentals.....3  
ACR 101 Refrigeration Fundamentals Lab .....2  
ACR 102 HVAC Electricity AND.....3  
ACR 103 HVAC Electricity Lab OR.....2  
Comparable Electrical Course\* ..... (4-5)

ACR 130 Electrical Components .....3  
ACR 131 Electrical Components Lab.....2  
ACR 170 Heat Load/Duct Design ..... 3  
ACR 250 Cooling and Dehumidification.....3  
ACR 251 Cooling and Dehumidification Lab .....2  
ACR 260 Heating and Humidification ..... 3  
ACR 261 Heating and Humidification Lab.....3  
ACR 270 Heat Pump Application .....3  
ACR 271 Heat Pump Application Lab.....2  
Electives\*\* .....8-11  
**Subtotal Credits .....41-45**  
**Total Credits .....47-54**

#### CERTIFICATE:

Environmental Control System Servicer  
Domestic Air Cond. and Furnace Installer  
Environmental System Repair Helper  
Refrigeration Mechanic

#### ASSOCIATE OF APPLIED SCIENCE DEGREE:

General Occupational/Technical Studies

#### Contact Information:

Program Coordinator Doug Adams  
(606) 487-3300 or (800) 246-7521, Ext. 73300  
adams.doug@kctcs.edu  
Revised: 8/11/2017

#GO2HCTC

One Community College Drive | Hazard, KY 41701 | (606) 436-5721 | hazard.kctcs.edu



Community & Technical College  
HIGHER EDUCATION BEGINS HERE

*KCTCS is an equal educational and employment opportunity institution.*