

# Heating & Refrigeration

Certificate

Program/CIP Code: HVAC.TCERTB/47.0201

Credits Required: 44

Division: TEC

Contact: [TEC@kckcc.edu](mailto:TEC@kckcc.edu)

HVAC training is comprised of heating, ventilation, air conditioning and refrigeration. Fundamentals are emphasized, along with specific studies in central and room systems. Silver brazing, electrical and mechanical troubleshooting, and sheet metal techniques are also practiced. The program is approved for EPA and R-401A refrigerant certification.

## Requirements for admission to the program:

- No requirements for admission to the program.
- Contact program for program-specific advising.

## Heating & Refrigeration Requirements\*

Course		Credit Hours	
HVAC 0100	Safety Orientation (OSHA 10)	1	
HVAC 0103	Refrigeration System Components I	2	
HVAC 0105	Electrical Theory I	2	
HVAC 0106	Electrical Theory (Electricity & Components)	2	
HVAC 0107	Basic Sheet Metal	2	
HVAC 0115	HVAC Fundamentals	4	
HVAC 0120	Heating System Fundamentals	3	
HVAC 0125	Electrical Fundamentals	4	
HVAC 0130	Workplace Skills	1	
HVAC 0203	Heat Pump Systems	3	
HVAC 0204	System Servicing and Troubleshooting	2	
HVAC 0220	EPA 608	1	
HVAC 0225	Heating-Electric	2	
HVAC 0226	Cooling I	3	
HVAC 0228	Refrigeration I	3	
<b>Electives (Selected by Instructor)</b>			
HVAC 0102	Refrigeration Theory I (1hr)	9	
HVAC 0104	Refrigeration System Components II (2hrs)		
HVAC 0108	Basic Sheet Metal Layout/Fabrications (2hrs)		
HVAC 0215	Heating & Refrigeration Internship (3hrs)		
HVAC 0221	R-410A Safety Certification (Green Technology) (1hr)		
HVAC 0227	Cooling II (3hrs)		
HVAC 0229	Refrigeration II (3hrs)		
HVAC 0230	Special Projects I (2hrs)		
HVAC 0231	Special Projects II (3hrs)		
HVAC 0232	Electrical Controls (Motors) I (1hr)		
HVAC 0233	Electrical Controls (Motors) II (2hrs)		
HVAC 0235	Heating Geothermal (Green Technology) (1hr)		
*See course syllabi for Heating & Refrigeration course prerequisites.			

<b>Total Hours for a Heating &amp; Refrigeration Certificate</b>	<b>44</b>
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