



Heating, Refrigeration, and Air Conditioning Technology 2024 – 2025 Associate of Applied Science Degree/Certificate Plan

A minimum 2.0 cumulative GPA is required for the degree. The residency requirement specifies that a minimum of 15 credit hours must be completed at Jefferson College. Courses with similar content may not both apply towards graduation. The computer literacy requirement must be completed with a grade of “C” or better. See a list of course options for each general education and institutional degree requirement below the degree plan. For a list of MOTR approved general education courses, visit the [MOTR webpage](#). This plan is not a substitute for meeting with an [Advising Specialist](#).

	Course Titles and General Education/Institutional Requirements	Course Number	Completed/ In Progress	Future	C1+	C2+	Degree+	
Core Requirements	Electricity for HVAC (5)	HRA101			X	X	X	
	Principles of Refrigeration (5)	HRA105			X	X	X	
	Refrigeration and A/C Mechanical Systems (5)	HRA125			X	X	X	
	Introduction to International Mechanical Code (3)	HRA135				X	X	
	Piping Design, Sizing, and Installation for HRA (3)	HRA145			X	X	X	
	Customer Relations and Record Keeping (2)	HRA150			X	X	X	
	Duct, Envelope Testing, and Leakage Detection (2)	HRA155				X	X	
	Sheet Metal Design, Sizing, and Installation for HRA (3)	HRA160			X	X	X	
	Residential Gas Heating Systems (4)	HRA205				X	X	
	Electric and Hydronic Heat (2)	HRA210				X	X	
	Residential Air Conditioning Systems (3)	HRA216				X	X	
	Advanced Electricity for HVAC (3)	HRA230				X	X	
	Heat Pumps and Mini-Splits (3)	HRA240				X	X	
	Commercial Refrigeration Systems (5)	HRA249				X	X	
Technical Internship (1-3 – optional)	INT191, 192, 193							
General Education and Institutional Requirements	Communications (3)	ENG101(H)					X	
	Communications OR Humanities (3)						X	
	Social and Behavioral Sciences (3)						X	
	Civics (3)						X	
	MO Civics Exam	PSC001					X	
	Mathematical Science AND/OR Natural Science (6)	MTH105^					X	X
								X
	Computer Literacy (3)						X	
First Year Experience (1)					X	X	X	
Total Credits					24	52	70	

General Education/ Institutional Requirements	Credits Required	Course Options
Communications	3	ENG101(H)
Communications OR Humanities	3	See MOTR webpage for a list of choices (cannot use Performance/Production of Creative Arts courses)
Social and Behavioral Sciences	6	See MOTR webpage for a list of choices
Civics	3	HST103(H), HST104(H), PSC102(H)
Mathematical Science AND/OR Natural Science	6	MTH105^ and MGT103^, MTH110^, MTH128^; See MOTR webpage for a list of choices*
Computer Literacy	3	CIS125^, EDU205^
First Year Experience	1	COL100^, COL101^, COL136^

^These courses listed in the General Education and Institutional Requirements are not part of the MOTR CORE42 general education program, and are not a guaranteed transfer to other institutions.

*MTH105 is required for Mathematical AND/OR Natural Science requirement.

+Heating, Refrigeration, and Air Conditioning Technology offers an Installer Certificate (C1) option, Technician Certificate (C2) option, and Heating, Refrigeration, and Air Conditioning Technology Degree option (Degree).