

Automotive Maintenance Technician

38-credit Technical Diploma

About the Program

Continual technological advances in the automotive industry translate to a steady need for highly skilled auto mechanics who are trained to work with safety refinements, pollution control, performance and comfort automotive issues. Students will learn to pinpoint automotive malfunctions, make quick and efficient repairs and perform routine preventative maintenance of domestic and foreign automobiles through classes on topics such as major engine repair, brakes, climate control, alignment and suspension, electrical systems, automotive welding and automotive diagnostics.

Potential Job Titles

- Auto Maintenance Technician
- Automotive Technician
- Auto Service Manager
- Lube Technician
- Mechanic/Technician

Admission Process

- Fill out a WCTC application
- Send \$30 non-refundable application fee
- Send high school transcript or GED/HSED
- Send any previous college transcripts
- Complete Skills Assessment test (COMPASS)
- Begin pursuing Financial Aid options
- Select high school courses may qualify the student for advance standing in this program
- Students are responsible to purchase and have available their own tools, toolboxes, safety glasses and safety shoes

For more information, call
262.691.5200.

Required Courses		Credits
First Semester		
404-321	Automotive Concepts	1
404-322	Major Engine Repair	3
404-323	Automatic Transmissions	3
404-324	Manual Tran/Drivelines	3
404-325	Automotive Brakes	3
804-304	Industrial Math I	2+
809-340	Applied Psychology	2
Total semester credits		17
Second Semester		
404-332	Automatic Electrical Systems	3
404-333	Automotive Elect Acc	3
404-334	Automotive Tune-Up/Diagnostics	3
404-335	Engine Performance/Emissions	3
442-316	Automotive Maintenance Welding	2
801-311	Communication in the Workplace	2+
Total semester credits		16
Summer Term		
404-327	Automotive Climate Control	2
404-329	Alignment and Suspension	3
Total semester credits		5
+ Proficiency exam available		
<i>Curriculum is current as of catalog printing. The most current curriculum requirements for graduation will be provided upon admission to program, or review at www.wctc.edu.</i>		

**Automotive Maintenance Technician
Required Courses**

404-321 Auto Service Concepts 1
Become familiar with the skills and concepts of basic automobile care through classroom activities that stress automotive fundamentals and theories. Practice basic servicing skills in the shop.

404-322 Major Engine Repair 3
Hone the skills needed for major engine repair. Disassemble, inspect, machine, and reassemble automotive engines.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-323 Automatic Transmissions 3
Study the basic skills required to repair automobile automatic transmissions. Disassemble, inspect, and reassemble transmissions used in both front and rear wheel drive automobiles.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-324 Manual Tran/Drivelines 3
Develop the skills and knowledge to repair automobile manual transmissions and drivelines. Disassemble, inspect, and reassemble transmissions, differentials, universal joints, and drive shafts from both front and rear wheel drive automobiles.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-325 Automotive Brakes 3
Learn to diagnose automobile drum and disc braking systems. Disassemble, inspect, and rebuild brake components.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-327 Automotive Climate Control 2
Learn to diagnose and repair automotive air conditioning and heating systems. Practice the diagnosis, systems check, and repair of the various systems.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-329 Alignment and Suspension 3
Gain the skills needed to perform front-end alignments and suspension system services. Work with standard ball joint type and McPherson strut type suspension.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-332 Automotive Electrical Systems 3
Explore the fundamental theories of electricity and electronics, and apply these in the operation of various automotive systems. Learn sound diagnostic procedures.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent)

404-333 Automotive Elect Acc 3
Gain a background in the operation, diagnosis, and repair of electronic accessories found in today's automobiles.
Prerequisites: 404-321 Auto Service Concepts (or concurrent) or 602-101 Introduction to Automotive (or concurrent) and 404-332 Automotive Electrical Systems (or concurrent)

404-334 Automotive Tune-Up/Diagnostics 3
Become familiar with engine operating principles and the systems that support engine operation and control emissions. Demonstrate engine maintenance and diagnostic procedures for systems related to engine mechanics, performance, and emission control. Focus on troubleshooting and the resolution of drivability complaints.
Prerequisites: 404-321 Auto Service Concepts or 602-101 Introduction to Automotive (or concurrent) and 404-332 Automotive Electrical Systems (or concurrent)

404-335 Engine Performance/Emissions 3
Use sophisticated diagnostic equipment and follow computerized engine control diagnostic procedures to diagnose and repair engine performance and emission failure problems.
Prerequisites: 404-321 Auto Service Concepts or 602-101 Introduction to Automotive (or concurrent) and 404-332 Automotive Electrical Systems (or concurrent) and 404-334 Automotive Tune-Up/Diagnostics (or concurrent)

442-316 Automotive Maintenance Welding 2
Study the various welding processes, positions, and materials involved the auto maintenance trades. Train in shielded metal arc welding (SMAW), oxy-fuel brazing (OFB), oxy-fuel cutting (OFC), plasma arc cutting (PAC), oxyacetylene welding (OAW), and gas metal arc welding (GMAW). Practice safe welding techniques.

801-311 Communication in the Workplace 2
Expand level of awareness and skill in interpersonal communications, both oral and written, while focusing on securing and maintaining a job. Develop competencies in the area of listening, sending, and employability skills.

804-304 Industrial Math I 2
Explore the topics of applied arithmetic and algebra during this individualized course. Study concepts related to measurement, fractions, decimals, percents, ratio and proportion, signed numbers, formula substitution, solutions to equations, tapers and gears.

809-340 Applied Psychology 2
Gain the skills needed to satisfy psychological needs, interact effectively with others, and achieve full potential for being productive in work and personal settings. Discuss topics such as learning and growth, motivation and productivity, stress management, self-concept and self-control, working with others, change in the workplace, and building stronger relationships.