



## 2011-2012 Career Planning Guide

### Automotive – Engine Specialist

**Shoreline Community College**  
**16101 Greenwood Avenue North**  
**Shoreline, Washington 98133**

Length of Program: 38 credits, 3 quarters  
Completion Award: Certificate of Completion  
Program Specific Advisors: See Jacquie Ogilvie for appropriate Program Advisor (206 546 5851)  
[jogilvie@shoreline.edu](mailto:jogilvie@shoreline.edu)   <http://www.shoreline.edu/auto>

#### **Approximate Quarterly Costs:**

Check quarterly class schedule for Tuition Table  
Parking and additional instructional fees per quarter: \$15  
Uniform Fee: \$62.95  
Book Costs: \$75 to \$150  
Tools and equipment: approximately \$4000 (Dealership experience only)  
Enrollment: Fall, Winter, Spring, Summer

#### **PROGRAM DESCRIPTION**

Shoreline Community College offers four Specialist Certificates of Completion for students who are interested in entering the automotive service industry. These certificates are only available to students in one of the manufacturer-specific programs. These programs include the General Motors (ASEP) Toyota (T-TEN), Honda (PACT), or Chrysler (CAP) programs. The Automotive Program provides students with the fundamental skills to succeed in the workplace along with valuable hands-on experience. Students alternate quarters between classroom instruction and paid dealership training. As students progress through the curriculum, they learn about the major automobile components and systems, including brakes, suspension, emissions, transmissions, electrical systems, heating and air conditioning, power trains and engine management systems. Students develop skills in automotive diagnostics, tune-ups and repairs. Students will also develop an understanding of automotive service business principles as they apply to the service technician. In their internship placement, students work under the guidance of a master technician at a sponsoring repair facility. These paid internships give students the opportunity to integrate their learning and further develop their skills in automotive service technology. Students will have to complete additional requirements in addition to completing all four automotive certificates in order to be awarded manufacturer-specific certification. These additional requirements are specific to the individual programs. This certificate requires that the student complete the on-campus classes followed by a qualifying co-op work experience.

#### **PROGRAM OUTCOMES**

Students who successfully complete this program should be able to:

1. Apply fundamentals of automotive service training, including the basics of automotive diagnostics and repair, pre-delivery inspection and warranty repair procedures.
2. Identify, inspect, disassemble and assemble basic components of automotive power plants.
3. Apply knowledge of the function, construction, operation, troubleshooting and servicing of disc, drum and ABS brake systems, steering, suspension and wheel alignment.
4. Use electronic engine analyzers and scanners to test and tune ignition, fuel injection and emission systems.
5. Apply understanding of electrical principles, semi-conductors, microprocessors and wiring diagrams to diagnose and repair malfunctions of automotive electrical systems.
6. Apply knowledge of the function, construction, operation, troubleshooting and service of front- and rear- wheel drive, manual and automatic transmissions and transaxles.
7. Test, service and repair heating and air-conditioning systems.

## Career Ladder Short-Term Programs

### Automotive Service Technology: Automotive – Engine Specialist

#### CAREER OPPORTUNITIES

The placement rate for this program is 100%. Upon completion, students are usually hired by their sponsoring dealership. The demand for dealer-trained technicians should remain strong over the next decade. For employment outlook, see the U.S. Dept. of Labor Occupation Outlook Handbook at [www.bls.gov/OCO/](http://www.bls.gov/OCO/).

#### POTENTIAL POSITIONS

Automotive Service Technician. With additional experience many technicians can become a Parts or Service Manager; some may seek positions in sales, management or open their own related business. Entry-level salaries range from \$ 24,000 to \$ 30,000 depending on location and the individual's production abilities.

#### PROGRAM PREREQUISITES

Minimum COMPASS Test Scores for Numerical Skills (34-45), Writing (45-54), Reading (44-53) or placement into ENGL& 101

Sponsorship by a Participating repair facility

Automotive Skills Test

Valid Driver's License

Proof of Insurability

Some Dealers Require Drug Testing

Instructor Interview

#### PROGRAM REQUIREMENTS

			<b>Cr.</b>	<b>Gr.</b>
AUTOT	161	Engine Repair	9	___
AUTOT	165	Engine MGMT/ Emission Sys	9	___
AUTOT	291	Coop Dealer Exper I	20	___
		<b>or</b>		
AUTOT	292	Coop Dealer Exper II		
		<b>or</b>		
AUTOT	293	Coop Dealer Exper III		
		<b>or</b>		
AUTOT	294	Coop Dealer Exper IV		
<b>Total Credits Required</b>			<b>38</b>	

COMMENTS: \_\_\_\_\_

Every effort has been made to ensure the accuracy of the information in this publication. However, the information is subject to change without notice, and final career decisions are the responsibility of the reader.