

# Washtenaw Community College Comprehensive Report

## ASV 270 Automotive Test and Development Conditional Approval Effective Term: Fall 2015

### Course Cover

**Division:** Advanced Technologies and Public Service Careers

**Department:** Automotive Services

**Discipline:** Auto Services

**Course Number:** 270

**Org Number:** 14100

**Full Course Title:** Automotive Test and Development

**Transcript Title:** Auto Test and Development

**Is Consultation with other department(s) required:** No

**Publish in the Following:** College Catalog , Time Schedule , Web Page

**Reason for Submission:** New Course

**Change Information:**

**Rationale:** This course is one of three new courses that support the Powertrain Development Technician and Automotive Test Technician programs.

**Proposed Start Semester:** Fall 2015

**Course Description:** In this course, students will learn about the application of automotive testing systems used during the development of automobiles. Students will learn the principles of component testing. The focus of this course allows students to gain practical experience in the laboratory utilizing a mapping test stand that will analyze an engine assembly for defects. The students will enter engine defects and collect data using commonly accepted test procedures to validate the testing process.

### Course Credit Hours

**Variable hours:** No

**Credits:** 4

**Lecture Hours: Instructor:** 60 **Student:** 60

**Lab: Instructor:** 45 **Student:** 45

**Clinical: Instructor:** 0 **Student:** 0

**Total Contact Hours: Instructor:** 105 **Student:** 105

**Repeatable for Credit:** YES

**Number of times the course can be repeated for credit:** 1

**Maximum Hours:** 8

**Grading Methods:** Letter Grades

**Are lectures, labs, or clinicals offered as separate sections?:** NO (same sections)

### College-Level Reading and Writing

College-level Reading & Writing

### College-Level Math

#### Requisites

**Prerequisite** minimum grade "C"

ASV131

**Prerequisite** minimum grade "C"

ASV132

## General Education

### Request Course Transfer

Proposed For:

### Student Learning Outcomes

1. Apply testing principles to determine defects using a project engine on a mapping stand.

#### **Assessment 1**

**Assessment Tool:** Project

**Assessment Date:** Fall 2016

**Assessment Cycle:** Every Three Years

**Course section(s)/other population:** All

**Number students to be assessed:** All

**How the assessment will be scored:** Departmentally-developed rubric

**Standard of success to be used for this assessment:** 75% of students will score 75% or better.

**Who will score and analyze the data:** ASV faculty

### Course Objectives

1. Recognize and apply automotive engine testing techniques including pressure signal limits and torque signal characteristics.

#### **Matched Outcomes**

### New Resources for Course

#### Course Textbooks/Resources

Textbooks

Manuals

Periodicals

Software

#### Equipment/Facilities

#### Reviewer

#### Action

#### Date

#### **Faculty Preparer:**

*Allen Day*

*Faculty Preparer*

*Apr 06, 2015*

#### **Department Chair/Area Director:**

*Allen Day*

*Recommend Approval*

*Apr 06, 2015*

#### **Dean:**

*Brandon Tucker*

*Recommend Approval*

*Apr 14, 2015*

#### **Vice President for Instruction:**

*Bill Abernethy*

*Conditional Approval*

*Apr 17, 2015*