

**Course Name: Automotive Tech II**

**Course #: 722    Grades: 10 – 12    Level: 0    Sem: 5X    Credits: 2.5**

**Prerequisite: Automotive Tech I**

**Course Description:** This course is designed to expose the student to such topics as the engine, transmission and axle. The information covered will include the theory and operations of the engine, transmission and axles. This course also provides the student with the essential aspect of hands-on training. This course contains 5 units.

Course Standards – NJ 2009 CCCS Standard 8 – 8.2.12.A1, 8.2.12.B3, 8.1.12.F2

**Course Proficiencies:** The following is a list of proficiencies the students are expected to know and be able to perform as a result of successfully completing this course.

1. Know emergency exits.
2. Demonstrate knowledge safety equipment and rules.
3. Demonstrate knowledge of safe and proper use of tools and equipment.
4. Differentiate between a job and a career.
5. Identify career paths in the automotive field.
6. Plan work within class period time constraints.
7. Describe safety rules pertaining to engine removal and disassemble.
8. Describe safety practices when cleaning parts.
9. Inspect, test and service engine valves and pistons.
10. Inspect and measure engine block and cylinder head.
11. Remove and replace a transmission.
12. Change automatic transmission fluid and filter.
13. Disassemble/Reassemble automatic transmission.
14. Identify major parts of a four-wheel drive vehicle.
15. Remove/Replace drive axles.
16. Check universal joint wear.
17. Disassemble/Reassemble rear differential.
18. Adjust ring and pinion gear
19. Disassemble/Reassemble transaxle.
20. Troubleshoot/Diagnose engine, transmission and axle problems.

**Assessment:** The evaluation of student achievement in this course is based on the following:

1. Tests are given at the end of the course. These generally require one to two periods to complete.
2. Performance based assessments to assess student demonstration of skills are included within each unit.
3. Class work will be efficient with safe use of time demonstrated each period.