Automotive Technology 7th Edition Chapter 88 – Hybrid and Electric Vehicle Maintenance Lesson Plan

CHAPTER SUMMARY:



- 1. Routine Service Procedures, and Placing the Hybrid Vehicle in Maintenance Mode
- 2. Oil and Filter Change and Engine Maintenance, and Braking System Service
- 3. Related Maintenance Items, and Diagnosis Procedures

OBJECTIVES:



- 1. Describe routine service procedures for both hybrid and electric vehicles.
- 2. Explain how to place a hybrid vehicle in maintenance mode.
- 3. Describe an oil and filter change and engine maintenance on a hybrid vehicle.
- 4. Explain how to service the base brake system on a hybrid or electric vehicle.
- 5. Discuss related maintenance items including battery air filter, A/C service, tires, auxiliary battery, and steering systems.
- 6. List diagnostic procedures for hybrid and electric vehicles.

RESOURCES: (All resources may be found at jameshalderman.com)

- 1. Task Sheet: EV and HEV Preventative Maintenance
- 2. Task Sheet: HEV Test and Replace Coolant
- 3. Crossword Puzzle and Word Search
- 4. Chapter PowerPoint
- 5. Videos: (L3) Light Duty Hybrid Electric Videos
- 6. Animations: (L3) Light Duty Hybrid Electric Animations

ACTIVITIES:



- 1. Task Sheet: EV and HEV Preventative Maintenance
- 2. Task Sheet: HEV Test and Replace Coolant
- 3. Crossword Puzzle and Word Search

ASSIGNMENTS:



- 1. Chapter crossword and word search puzzles from the website.
- 2. Complete end of chapter quiz from the textbook.
- 3. Complete multiple choice and short answer quizzes downloaded from the website.

CLASS DISCUSSION:



- 1. Review and group discussion chapter <u>Frequently Asked Questions</u> and <u>Tech Tips</u> sections.
- 2. Review and group discussion of the five (5) chapter Review Questions.

NOTES AND EVALUATION:



