

▶ TASK Diagnose (troubleshoot) charging system for the cause of undercharge, no-charge, and overcharge conditions.

AST
6D2

MAST
6D2

Time off _____

Time on _____

Total time _____

CDX Tasksheet Number: C316

1. Research the following specifications in the appropriate service information for the vehicle assigned.

NOTE Some charging systems use variable charging modes depending on the conditions present, such as battery temperature, driving condition, etc. Make sure you follow the manufacturer's specified testing procedures when testing these systems.

- a. **Rated output for the alternator being tested:** _____ **amps**
 - b. **Regulated voltage:** _____ **volts**
 - c. **How is the alternator full fielded on this vehicle?**
2. Install the exhaust hose(s) and wheel chocks, and set the parking brake.
 3. Connect the charging system tester as outlined in the appropriate service information.
 4. Test the maximum current output of the alternator. **List reading here:** _____ **amps**
 5. Using the diode/stator setting or AC ripple setting, test the integrity of the diodes and stator. **List the results:**
 6. Conduct the charging system regulated voltage test. Do this by measuring the maximum voltage that the charging system achieves while the engine runs at approximately 1500 rpm and waiting until the voltage doesn't rise any further. Do NOT allow the voltage to exceed 16 volts. **Regulated voltage:** _____ **V**
 7. Compare your results to the manufacturer's specifications. **List your observations:**

8. Determine any necessary action(s):

9. Have your supervisor/instructor verify satisfactory completion of this procedure, any observations found, and any necessary action(s) recommended.

Performance Rating

CDX Tasksheet Number: C316

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1

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3

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Supervisor/instructor signature _____ Date _____