

APPENDIX G

SMOKING VEHICLE TEST PROCEDURES

The following test procedures shall be used to validate repairs on vehicles that have been cited by law enforcement under Title 41-6a-1626 of the Motor Vehicle Act as having excessive visible emissions and issued a “fix it” ticket. These test procedures may also be used to determine whether or not a vehicle is in violation of state or local vehicle emission laws as a result of a smoking vehicle citizen complaint.

G-1.1 Gasoline Vehicles.

(1)(a) In accordance with Utah Code 41-6a-1626(2)(i) and State Code R-307-305-3 (2) a gasoline powered vehicle may not emit visible contaminants during operation. Steam emitted from the tailpipe of a vehicle during winter months is not considered a visible contaminant.

(1)(b) The Department shall use a smoke opacity meter or EPA method 9 to determine visual opacity. If no visible emissions are observed, the vehicle shall receive a two speed idle test as described in section 9.0 of this ordinance. A two speed idle test may be used on all vehicles regardless of model year when determining the presence of excess exhaust pollutants.

(1)(c) If the Department determines that testing in addition to subsection (1)(b) is necessary to make a final determination the vehicle shall be operated on a chassis dynamometer to simulate normal operating conditions ranging between 0 and 50 MPH.

(1)(d) If the vehicle is determined to have visual emissions after these tests are completed, additional repairs must be performed to correct the problem. The vehicle will also be prevented from being tested at any of the Utah County decentralized testing stations until proper repairs have been completed, and verified by the Department.

(1)(e) If it is determined that the vehicle has been sufficiently repaired or does not emit any visible emissions a certificate of compliance will be issued to the owner for use in satisfying the repair requirement of the “fix it” ticket.

G-1.2 Diesel Vehicles.

(2)(a) 1998 and newer diesel vehicles may be tested by the Department or one of the Utah County certified decentralized diesel inspection stations. All 1997 and older diesel vehicles must be tested at the Health Department Technical Center. The vehicle owner will be responsible to pay the posted inspection fee amount to the testing entity.

2)(b) In accordance with Utah Code 41-6a-1626 (3)(c) and State Code R-307-305-6 all emission control equipment that was originally installed on the vehicle must be properly maintained and operational at all times.

(2)(c) A diesel powered vehicle must pass a tampering inspection of the following applicable components:

1. (CAT) Catalytic Converter
2. (DPF) Diesel Particulate Filter
3. (SCR) Select Catalytic Reduction (diesel exhaust fluid)
4. (EGR) Exhaust Gas Recirculation
5. OBDII System

(2)(d) Vehicles 1997 and older will be tested for opacity with a smoke opacity meter or EPA Method 9 while being operated on a chassis dynamometer at a steady state speed of 50 MPH and at the maximum fuel delivery rate with the transmission in direct drive. The opacity limits listed in Utah Code Title 41-6a-1626 shall be used to determine a passing or failing result. The limits are:

For vehicles manufactured before January 1, 1973, and all non-turbocharged vehicles, visual contaminants shall not exceed 40% opacity.

For vehicles manufactured on or after January 1, 1973 visual contaminants shall not exceed 20% opacity.

(2)(e) Vehicles 1998 and newer will be tested using their OBDII system, if originally equipped by the manufacturer. If a vehicle was not originally equipped with OBDII technology when manufactured then the visual tampering portion of the inspection will be used to determine a passing or failing result. If OBDII test results have been determined to be inconclusive the vehicle may be tested for opacity using the test procedures outlined in (2)(d) above. The OBDII inspection will test the following items:

1. (MIL) Malfunction Indicator Lamp (must pass bulb check)
2. Readiness monitors (must all be set to ready)
3. (DTC) Diagnostic Trouble Codes (must not have any current codes)
4. MIL must not be illuminated, or commanded on, while running
5. The manufactures original computer program or an EPA or CARB (California Air Resources Board) approved aftermarket program.

(2)(f) Vehicles that have an off-road program installed or have had their OBDII system removed, illegally modified, or rendered inoperable will fail the OBDII System visual tampering portion of the inspection and must be repaired. If the Department does not recognize an aftermarket computer program as certified or approved it shall be the vehicle owner's responsibility to provide documented proof of certification by a recognized laboratory or regulatory agency.

(2)(g) If it is determined by testing that the vehicle fails the tampering inspection, exceeds the opacity standards or fails the OBDII test then additional repairs must be performed to correct the problem.

(2)(h) If it is determined by testing that the vehicle has been sufficiently repaired or passes these testing requirements a certificate of compliance will be issued to the owner for use in satisfying the repair portion of the "fix it" ticket.

(2)(i) Vehicles over 14,001 GVWR will be tested using a SAE (Society of Automotive Engineers) J1667 snap idle smoke test.