

Environmental Protection Agency

§ 89.108

(b) Engines are subject to recall testing for a period based on the rated power and rated speed of the engines. However, in a recall, engines in the subject class or category would be subject to recall regardless of actual years or hours of operation.

(1) For all engines rated under 19 kW, and for constant speed engines rated under 37 kW with rated speeds greater than or equal to 3,000 rpm, the engines are subject to recall testing for a period of 2,250 hours or four years of use, whichever first occurs.

(2) For all other engines rated at or above 19 kW and under 37 kW, the engines are subject to recall for a period of 3,750 hours or five years of use, whichever first occurs.

(3) For all engines rated at or above 37 kW, the engines are subject to recall for a period of 6,000 hours of operation or seven years of use, whichever first occurs.

(c) The warranty periods for warranties imposed by the Clean Air Act and § 89.1007 for all engines rated under 19 kW, and for constant speed engines rated under 37 kW with rated speeds greater than or equal to 3,000 rpm, are 1,500 hours of operation or two years of use, whichever first occurs. For all other engines, the warranty periods for warranties imposed by the Clean Air Act and § 89.1007 are 3,000 hours of operation or five years of use, whichever first occurs.

(d) Manufacturers may apply to the Administrator for approval for a shorter useful life period for engines that are subject to severe service in seasonal equipment, or are designed specifically for lower useful life hours to match equipment life. Such an application must be made prior to certification.

[59 FR 31335, June 17, 1994. Redesignated and amended at 63 FR 56995, 56998, Oct. 23, 1998]

§ 89.105 Certificate of conformity.

Every manufacturer of a new nonroad compression-ignition engine must obtain a certificate of conformity covering the engine family, as described in § 89.116. The certificate of conformity must be obtained from the Administrator prior to selling, offering for sale, introducing into commerce, or importing into the United States the

new nonroad compression-ignition engine for each model year.

[59 FR 31335, June 17, 1994. Redesignated at 63 FR 56995, Oct. 23, 1998]

§ 89.106 Prohibited controls.

(a) An engine may not be equipped with an emission control system for the purpose of complying with emission standards if such system will cause or contribute to an unreasonable risk to public health, welfare, or safety in its operation or function.

(b) An engine with an emission control system may not emit any noxious or toxic substance which would not be emitted in the operation of such engine in the absence of such system except as specifically permitted by regulation.

[59 FR 31335, June 17, 1994. Redesignated at 63 FR 56995, Oct. 23, 1998]

§ 89.107 Defeat devices.

(a) An engine may not be equipped with a defeat device.

(b) For purposes of this section, "defeat device" means any device, system, or element of design which senses operation outside normal emission test conditions and reduces emission control effectiveness.

(1) Defeat device includes any auxiliary emission control device (AECD) that reduces the effectiveness of the emission control system under conditions which may reasonably be expected to be encountered in normal operation and use unless such conditions are included in the test procedure.

(2) Defeat device does not include such items which either operate only during engine starting or are necessary to protect the engine (or equipment in which it is installed) against damage or accident during its operation.

[59 FR 31335, June 17, 1994. Redesignated at 63 FR 56995, Oct. 23, 1998]

§ 89.108 Adjustable parameters, requirements.

(a) Nonroad engines equipped with adjustable parameters must comply with all requirements of this subpart for any adjustment in the physically adjustable range.

(b) An operating parameter is not considered adjustable if it is permanently sealed or otherwise not normally accessible using ordinary tools.

(c) The Administrator may require that adjustable parameters be set to any specification within its adjustable range for certification, selective enforcement audit, or in-use testing to determine compliance with the requirements of this subpart.

[59 FR 31335, June 17, 1994. Redesignated at 63 FR 56995, Oct. 23, 1998]

§ 89.109 Maintenance instructions and minimum allowable maintenance intervals.

(a) The manufacturer must furnish or cause to be furnished to the ultimate purchaser of each new nonroad engine subject to standards under this part written instructions for the maintenance needed to ensure proper functioning of the emission control system. Paragraphs (b) through (h) of this section do not apply to Tier 1 engines with rated power at or above 37 kW.

(b) Maintenance performed on equipment, engines, subsystems or components used to determine exhaust emission deterioration factors is classified as either emission-related or nonemission-related and each of these can be classified as either scheduled or unscheduled. Further, some emission-related maintenance is also classified as critical emission-related maintenance.

(c) This paragraph (c) specifies emission-related scheduled maintenance for purposes of obtaining durability data for nonroad engines. The maintenance intervals specified below are minimum intervals:

(1) All emission-related scheduled maintenance for purposes of obtaining durability data must occur at the same or longer hours of use intervals as those specified in the manufacturer's maintenance instructions furnished to the ultimate purchaser of the engine under paragraph (a) of this section. This maintenance schedule may be updated as necessary throughout the testing of the engine, provided that no maintenance operation is deleted from the maintenance schedule after the operation has been performed on the test equipment or engine.

(2) Any emission-related maintenance which is performed on equipment, engines, subsystems, or components must be technologically necessary to ensure in-use compliance with the emission standards. The manufacturer must submit data which demonstrate to the Administrator that all of the emission-related scheduled maintenance which is to be performed is technologically necessary. Scheduled maintenance must be approved by the Administrator prior to being performed or being included in the maintenance instructions provided to the purchasers under paragraph (a) of this section.

(i) The Administrator may require longer maintenance intervals than those listed in paragraphs (c)(3) and (c)(4) of this section where the listed intervals are not technologically necessary.

(ii) The Administrator may allow manufacturers to specify shorter maintenance intervals than those listed in paragraphs (c)(3) and (c)(4) of this section where technologically necessary for engines rated under 19 kW, or for constant speed engines rated under 37 kW with rated speeds greater than or equal to 3,000 rpm.

(3) The adjustment, cleaning, repair, or replacement of items listed in paragraphs (c)(3)(i) through (c)(3)(iii) of this section shall occur at 1,500 hours of use and at 1,500-hour intervals thereafter.

(i) Exhaust gas recirculation system-related filters and coolers.

(ii) Positive crankcase ventilation valve.

(iii) Fuel injector tips (cleaning only).

(4) The adjustment, cleaning and repair of items in paragraphs (c)(4)(i) through (c)(4)(vii) of this section shall occur at 3,000 hours of use and at 3,000-hour intervals thereafter for nonroad compression-ignition engines rated under 130 kW, or at 4,500-hour intervals thereafter for nonroad compression-ignition engines rated at or above 130 kW.

(i) Fuel injectors.

(ii) Turbocharger.

(iii) Electronic engine control unit and its associated sensors and actuators.

(iv) Particulate trap or trap-oxidizer system (including related components).