

§ 21.97

14 CFR Ch. I (1–1–03 Edition)

§ 21.97 Approval of major changes in type design.

(a) In the case of a major change in type design, the applicant must submit substantiating data and necessary descriptive data for inclusion in the type design.

(b) Approval of a major change in the type design of an aircraft engine is limited to the specific engine configuration upon which the change is made unless the applicant identifies in the necessary descriptive data for inclusion in the type design the other configurations of the same engine type for which approval is requested and shows that the change is compatible with the other configurations.

[Amdt. 21–40, 39 FR 35459, Oct. 1, 1974]

§ 21.99 Required design changes.

(a) When an Airworthiness Directive is issued under Part 39 the holder of the type certificate for the product concerned must—

(1) If the Administrator finds that design changes are necessary to correct the unsafe condition of the product, and upon his request, submit appropriate design changes for approval; and

(2) Upon approval of the design changes, make available the descriptive data covering the changes to all operators of products previously certificated under the type certificate.

(b) In a case where there are no current unsafe conditions, but the Administrator or the holder of the type certificate finds through service experience that changes in type design will contribute to the safety of the product, the holder of the type certificate may submit appropriate design changes for approval. Upon approval of the changes, the manufacturer shall make information on the design changes available to all operators of the same type of product.

[Doc. No. 5085, 29 FR 14567, Oct. 24, 1964, as amended by Amdt. 21–3, 30 FR 8826, July 24, 1965]

§ 21.101 Designation of applicable regulations.

(a) An applicant for a change to a type certificate must show that the changed product complies with the airworthiness requirements applicable to

the category of the product in effect on the date of the application for the change and with parts 34 and 36 of this chapter. Exceptions are detailed in paragraphs (b) and (c) of this section.

(b) If paragraphs (b)(1), (2), or (3) of this section apply, an applicant may show that the changed product complies with an earlier amendment of a regulation required by paragraph (a) of this section, and of any other regulation the Administrator finds is directly related. However, the earlier amended regulation may not precede either the corresponding regulation incorporated by reference in the type certificate, or any regulation in §§ 23.2, 25.2, 27.2, or 29.2 of this chapter that is related to the change. The applicant may show compliance with an earlier amendment of a regulation for any of the following:

(1) A change that the Administrator finds not to be significant. In determining whether a specific change is significant, the Administrator considers the change in context with all previous relevant design changes and all related revisions to the applicable regulations incorporated in the type certificate for the product. Changes that meet one of the following criteria are automatically considered significant:

(i) The general configuration or the principles of construction are not retained.

(ii) The assumptions used for certification of the product to be changed do not remain valid.

(2) Each area, system, component, equipment, or appliance that the Administrator finds is not affected by the change.

(3) Each area, system, component, equipment, or appliance that is affected by the change, for which the Administrator finds that compliance with a regulation described in paragraph (a) of this section would not contribute materially to the level of safety of the changed product or would be impractical.

(c) An applicant for a change to an aircraft (other than a rotorcraft) of 6,000 pounds or less maximum weight, or to a non-turbine rotorcraft of 3,000 pounds or less maximum weight may show that the changed product complies with the regulations incorporated

by reference in the type certificate. However, if the Administrator finds that the change is significant in an area, the Administrator may designate compliance with an amendment to the regulation incorporated by reference in the type certificate that applies to the change and any regulation that the Administrator finds is directly related, unless the Administrator also finds that compliance with that amendment or regulation would not contribute materially to the level of safety of the changed product or would be impractical.

(d) If the Administrator finds that the regulations in effect on the date of the application for the change do not provide adequate standards with respect to the proposed change because of a novel or unusual design feature, the applicant must also comply with special conditions, and amendments to those special conditions, prescribed under the provisions of § 21.16, to provide a level of safety equal to that established by the regulations in effect on the date of the application for the change.

(e) An application for a change to a type certificate for a transport category aircraft is effective for 5 years, and an application for a change to any other type certificate is effective for 3 years. If the change has not been approved, or if it is clear that it will not be approved under the time limit established under this paragraph, the applicant may do either of the following:

(1) File a new application for a change to the type certificate and comply with all the provisions of paragraph (a) of this section applicable to an original application for a change.

(2) File for an extension of the original application and comply with the provisions of paragraph (a) of this section. The applicant must then select a new application date. The new application date may not precede the date the change is approved by more than the time period established under this paragraph (e).

(f) For aircraft certificated under §§ 21.17(b), 21.24, 21.25, and 21.27 the airworthiness requirements applicable to the category of the product in effect on the date of the application for the change include each airworthiness re-

quirement that the Administrator finds to be appropriate for the type certification of the aircraft in accordance with those sections.

[Doc. No. 28903, 65 FR 36266, June 7, 2000]

Subpart E—Supplemental Type Certificates

SOURCE: Docket No. 5085, 29 FR 14568, Oct. 24, 1964, unless otherwise noted.

§ 21.111 Applicability.

This subpart prescribes procedural requirements for the issue of supplemental type certificates.

§ 21.113 Requirement of supplemental type certificate.

Any person who alters a product by introducing a major change in type design, not great enough to require a new application for a type certificate under § 21.19, shall apply to the Administrator for a supplemental type certificate, except that the holder of a type certificate for the product may apply for amendment of the original type certificate. The application must be made in a form and manner prescribed by the Administrator.

§ 21.115 Applicable requirements.

(a) Each applicant for a supplemental type certificate must show that the altered product meets applicable requirements specified in § 21.101 and, in the case of an acoustical change described in § 21.93(b), show compliance with the applicable noise requirements of part 36 of this chapter and, in the case of an emissions change described in § 21.93(c), show compliance with the applicable fuel venting and exhaust emissions requirements of part 34 of this chapter.

(b) Each applicant for a supplemental type certificate must meet §§ 21.33 and 21.53 with respect to each change in the type design.

[Amdt. 21-17, 32 FR 14927, Oct. 28, 1967, as amended by Amdt. 21-42, 40 FR 1033, Jan. 6, 1975; Amdt. 21-52A, 45 FR 79009, Nov. 28, 1980; Amdt. 21-61, 53 FR 3540, Feb. 5, 1988; Amdt. 21-68, 55 FR 32860, Aug. 10, 1990; Amdt. 21-71, 57 FR 42854, Sept. 16, 1992; Amdt. 21-77, 65 FR 36266, June 7, 2000]