

*CAA Library*

UNITED STATES OF AMERICA  
CIVIL AERONAUTICS BOARD  
WASHINGTON, D. C.

Civil Air Regulations Amendment 40-5

Effective: April 1, 1954

Adopted: March 31, 1954

SCHEDULED INTERSTATE AIR CARRIER CERTIFICATION AND OPERATION RULES

EXTENSION OF EFFECTIVE DATE OF REQUIREMENT FOR  
CHOP MARKS ON AIRPLANE EXTERIORS

Revised Part 40 was adopted by the Civil Aeronautics Board April 13, 1953, and is to become effective April 1, 1954. Section 40.178 (b) of this part requires that the exterior area of the fuselage of an airplane be marked to indicate the location of mechanisms of access and areas suitable for cutting to facilitate the escape and rescue of occupants in the event of an accident. Marks indicating areas suitable for cutting are commonly known as "chop marks".

In Civil Air Regulations Draft Release No. 53-26, dated November 17, 1953, it was proposed that § 40.178 (b) be amended by extending the effective date for its compliance therewith until March 1, 1954. The comment received in response to this draft release indicated general concurrence with this proposal. Since the effective date of revised Part 40 was subsequently extended to April 1, 1954, it became unnecessary to include this amendment in Civil Air Regulations Amendment 40-3, adopted on March 11, 1954.

During the period allotted for comment on Draft Release 53-26, however, a proposal was received for the elimination of this requirement on the grounds that airplane fuselages, particularly those of modern pressurized airplanes, are so strongly resistant to chopping or cutting by means of such devices as axes, as to render questionable the justification for this requirement. It was agreed to consider this proposal further in order to determine whether any additional modifications should be made to this section in the future. The Board is advised that certain air carriers misunderstood the result of this exchange of views, and believed that the requirement was to be postponed indefinitely. Accordingly, they made no effort to apply the markings required by this regulation. The Board is of the opinion that this assumption was unwarranted, since the Board cannot, consistent with proper rule-making procedures, commit itself in advance to any course of action, and moreover in this instance there was no more than an agreement to reconsider.

The Board intends that any "chop marks" appearing on airplane exteriors should be applied on the basis of a sound engineering analysis of the airplane structure involved, and that such marks reflect a valid determination that the areas so marked be truly suitable for cutting. In view of the lack of time available prior to the effective date of revised Part 40 it appears that air carriers who have not yet made such an engin-

APR 16 1954

earing analysis will be unable to apply "chop marks" at the proper places on their airplanes. "Chop marks" applied on the basis of other than a proper analysis may mislead rescue crews to attempt to enter a cabin at a strong structural member. The Board considers that such "chop marks" would create a more hazardous condition than the complete absence of "chop marks". It appears advisable, therefore, to extend the effective date of that portion of § 40.178 (b) which relates to areas suitable for cutting, to allow all carriers to apply "chop marks" on the basis of a proper study. The portion of § 40.178 (b), however, on marking which indicates the location of mechanisms of access will become effective on April 1, 1954, in accordance with the current requirement.

Since this amendment is minor in nature and imposes no additional burden on any person, it may be made effective without prior notice.

In consideration of the foregoing, the Civil Aeronautics Board hereby amends Part 40 of the Civil Air Regulations, (14 CFR, Part 40, as amended) effective April 1, 1954:

By adding to the end of § 40.178 (b) the following: "Provided, That marking of areas suitable for cutting need not be applied prior to October 1, 1954."

(Sec. 205 (a), 52 Stat. 984; 49 U.S.C. 425 (a). Interpret or apply secs. 601, 604, 52 Stat. 1007, 1010, as amended; 49 U.S.C. 551, 554)

By the Civil Aeronautics Board:

/s/ M. C. Mulligan

M. C. Mulligan  
Secretary

(SEAL)

---

This is the fifth amendment to the Part 40 adopted by the Board on April 13, 1953, which was originally to have become effective on October 1, 1953, but which now takes effect on April 1, 1954.