



**EMBRAER**

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CACC

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**Empresa Brasileira**  
**de Aeronáutica S.A.**

U.S. Department of Transportation Dockets  
Docket No. FAA-I 999-5401  
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Subject: Docket No. FAA-1999-5401.- 30  
Aging Airplanes

ORIGINAL

DEPT. OF TRANSPORTATION  
DOCKETS  
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Dear Sirs,

Since the expected fleet in operation by December 2010 will have a substantial residual life as per the original certification criteria, we figure that the proposed rule would cause a significant impact to both operators and manufacturers and would lead a sizable portion of the EMB-1 10 fleet to an economically impracticable situation, unless some specific, simplified methodology is made available by the FAA.

As the thresholds proposed by the NPRM are 3 to 10 years as from the date of issuance of the final rule, we deem that a further detailing of the intended program before its final approval, aiming at the inclusion of alternate means of compliance - namely in what concerns the required damage-tolerance based maintenance programs to be developed for aircraft which were originally designed under other criteria considered at the time the state of the art - is of paramount importance to the industry as a whole.

In view of the above, we would appreciate that the determination of the December 20, 2010 as final date for the compliance of such rule (or 4 years after the issuance of the rule) for affected aircraft be reconsidered.

We would also like to propose the implementation of a Corrosion Prevention and Control Program (CPCP), to be developed jointly by certification authorities, operator and manufacturers, in order to guarantee the control of the corrosion effect in airplanes that did not reach their design life. And, consequently, the applicability of this rule be enforced after the design life goal is reached.

While we welcome FAA's effort in publishing an advisory circular to this purpose and the undertaking of a research program to develop a simplified damage-tolerance based methodology directly applicable to commuter sized aircraft, EMBRAER considers essential that the issuance of the rule be postponed until all ongoing



studies to simplify the requirements and the prescription of acceptable means of compliance be concluded.

EMBRAER is willing to participate, in any joint discussions with the industry and the FAA aimed at the development or the identification of any possible simplified methodologies to enable compliance with the purpose intended by the NPRM before the final rule is issued. We feel that the adoption of such measure would enrich the methodology as defined by the rule, therefore alleviating the financial burdens of all concerned.

We do understand that the particular characteristics of each aircraft design will be taken into consideration in the elaboration of the rule, to allow alternative courses of action to meet its intended purpose. Thus, in the case of the EMB-1 IO, for instance, the fact that it is not a pressurized aircraft - contrary to the statement of page 16303 (third column) of the referred NPRM - as well as the availability of a service bulletin which permits the extension of the design service goal from 30,000 to 45,000 flight hours are facts that must be taken into account.

EMBRAER also considers extremely important that the texts of the final rule exclude all aircraft certified under damage tolerance design, as per:

- FAR Part-23 paragraph 23.573 (Amendment 23-45 or subsequent amendments),  
or
- FAR Part-25 paragraph 25.571 (Amendment 25-45 or subsequent amendments).

This is in accordance with page 16301 (second and third columns) of Federal Register of April 2, 1999.

In what refers to paragraphs 121.370a(b)(1), 129.16(c)( 1) and 135.168(c)(1), "Supplemental Inspections", the statement "if the time in service of the airplane reaches the design-life goal . . .before [4 years after the effective date of the rule], the certificate holder may operate the airplane until [4 years after the effective date of the rule]" seems to us to be in contradiction to the safe-life philosophy.

Sincerely,

*Paulo C. Olenscki*  
Certification Manager