

UNITED STATES OF AMERICA
FEDERAL AVIATION ADMINISTRATION
DEPARTMENT OF TRANSPORTATION
WASHINGTON, D.C. 20591

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In the matter of the petition of *
*
HAWK INDUSTRIES, INC. *
* Regulatory Docket No. 18260
for an exemption from Section 1.1 *
of Part 1 of the Federal Aviation *
Regulations *
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* * * * *

DENIAL OF EXEMPTION

By letters dated June 5, 1978, and August 4, 1978, Hawk Industries, Inc., 57430 Aviation Drive, Yucca Valley, California 92284, petitioned for an exemption from Federal Aviation Regulations (FAR), Part 1, Section 1.1, to permit the certification of its single-engine GAF-Hawk #125 airplane which has a maximum takeoff weight of 14,500 pounds under Part 23 of the FAR.

Section 23.1 limits the applicability of the airworthiness standards of Part 23 to small airplanes. Small airplanes are defined by Section 1.1 as airplanes of 12,500 pounds or less maximum certificated takeoff weight. Airplanes of more than 12,500 pounds takeoff weight are defined by Section 1.1 as large aircraft and must meet the requirements of Part 25. The petitioner's request is therefore, in effect, a petition for exemption from Section 23.1 to permit certification under Part 23 rather than an exemption from the Part 1 definition of "small aircraft."

In support of its request, the petitioner states that:
(1) a single-engine (wide body), turboprop, all-freight airplane with a useful load of approximately 8,000 pounds can operate near one-half the ton-mile cost of a twin; (2) the engine chosen is very reliable having 25,000,000 flying hours documented for this type; (3) the wing loading, a modern camber airfoil, and full span flaps provide excellent short field capability; (4) the airplane will be more fuel efficient than any current twin or piston-powered aircraft; and (5) the current rule appears arbitrary and obsolete.

The petitioner proposes to restrict the airplane use to freight only as a compensating safety factor for the increased takeoff weight.

It is a longstanding requirement that aircraft in excess of 12,000 pounds must have one-engine inoperative climb performance which has been provided by multiengine installations. This requirement reduces the risk of exposure to a forced landing. A single-engine airplane which has an engine shutdown will be making a forced landing. The forced landing of an aircraft in excess of 12,000 pounds is considered very hazardous and exposes the public to a higher risk than the forced landing of a small aircraft because of the increased mass and greater volume of fuel.

The petitioner has indicated the aircraft will have additional features which increase safety; e.g., excellent short-field capability and operations restricted to freight only. These characteristics by themselves do not prevent the potentially catastrophic results of a forced landing. The petitioner has not shown that a grant of the requested exemption would provide a level of safety equal to that provided by the rule from which exemption is sought.

The petitioner also requested consideration be given to a rule change to Section 1.1 extending the definition of small aircraft to include 14,500 pounds. The FAA will consider this request in a separate action and advise the petitioner of its disposition at a later date.

In consideration of the foregoing, I find that a grant of exemption requested by the petitioner would not be in the public interest. Therefore, pursuant to the authority contained in Sections 313(a) and 601(c) of the Federal Aviation Act of 1958, which has been delegated to me by the Administrator (14 CFR 11.53), the Hawk Industries, Inc., is denied an exemption from Section 23.1 of the Federal Aviation Regulations.

/s/ M. C. Beard
Director
Office of Airworthiness

Issued in Washington, D.C., on
September 19, 1979.