Federal Aviation Agency Washington, D.C.

Civil Aeronautics Manual 43

General Operation Rules

Supplement No 4, CAM 43 dated Sept. 1959

Aug. 15, 1961

SUBJECT: Revisions to CAM 43.

This supplement is issued to incorporate in CAM 43 Civil Air Regulations Amendment 43–14 and Special Civil Air Regulations Nos. SR-399D and SR-425C.

Amendment 43-14 concerns the use of private pilots in charity airlifts.

Special regulation SR-399D concerns provisional maximum certificated weights for certain airplanes operated by Alaskan air carriers, air taxi operators in Alaska, and the Department of the Interior. It was issued June 20, 1961, to become effective June 24, 1961, and supersedes Special Civil Air Regulation No. SR-399C.

Special regulation SR-425C concerns provisional certification and operation of aircraft. It was issued May 31, 1961, to become effective June 6, 1961, and supersedes Special Civil Air Regulation No. SR-425B.

New or revised material is enclosed in black brackets on the pages submitted with this supplement, except Special Civil Air Regulations Nos. SR-399D and SR-425C, and the pages in the addendum containing the preambles to amendments.

Remove the following pages:

III and IV 9 and 10

29 and 30

73 through 82

Insert the following new pages:

III and IV

9 through 10-1

29 and 30 73 through 81

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George C. Prill, Director,

Flight Standards Service.

Attachments.

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- 43.46-3 Certificate conditions (FAA policies which apply to sec. 43.46). A Certificate of Waiver or Authorization for towing objects by aircraft will be issued subject to the following conditions and limitations:
- (a) Operations authorized. Operations will be limited to those specified on the certificate. No authorization will be issued unless the operation:
- (1) Will not create a hazard to other air traffic, or persons or property on the ground.
- (2) In a control zone, can be controlled by air traffic control, or other air traffic can be advised of the operation.
- (3) On airways, or in the vicinity of busy airports, can be made known to affected air traffic.
- (4) Can be conducted in accordance with such special provisions which the approving agent deems necessary.
- (b) Duration. The certificate will contain an expiration date which will allow ample time to complete the operation, but may be surrendered by the holder or cancelled by the Administrator at any time.
- (c) Special provisions. The certificate will contain such special provisions as the approving agent may deem necessary in the interest of safety. Examples illustrating such provisions are:
- (1) A thorough inspection of the aircraft, engine, and special equipment shall be made prior to each day's operations.
- (2) A planned course of action shall be followed with emphasis on selection of available emergency landing areas.
- (3) A capable and experienced pilot holding at least a commercial rating will be used.
- (4) Air traffic control and appropriate officials of the community shall be notified prior to beginning operations.
- (5) Any other specific precaution the agent may assign.

(Published in 18 F.R. 6872, Oct. 31, 1953, effective Nov. 25, 1953.)

43.47 Dropping objects or persons.

(a) No person piloting an aircraft shall permit any object to be dropped from such aircraft in flight which creates a hazard to persons or property.

Note: This rule prohibits neither aerial application operations, such as seeding, spraying or dusting, nor the dropping of newspapers, periodicals, circulars, or objects of any other kind, provided reasonable precautions are taken to avoid injury or damage to persons or property.

- (b) No person piloting an aircraft shall permit a parachute jump to be made from such aircraft over congested areas of cities, towns, or settlements, or an open air assembly of persons except in an emergency or except under the terms of an authorization issued by the Administrator.
- 43.48 Aerobatic flight. No pilot shall intentionally fly an aircraft in aerobatic flight carrying passengers unless all occupants are equipped with approved parachutes.
- 43.48-1 Aerobatic flight (FAA interpretations which apply to sec. 43.48). Aerobatic flight, insofar as it concerns the wearing of parachutes, must be deemed to exist when any maneuver intentionally performed results in the following:
- (a) A bank in excess of 60° relative to the horizon, or
- (b) A nose up or nose down attitude in excess of 30° relative to the horizon.

An example of the application of this interpretation is that parachutes are not required when stalls, lazy eights, etc., are performed within these limits, while these same maneuvers performed with attitudes in excess of the limits would require the wearing of parachutes. Stalls as practiced for the private pilot flight test normally would not exceed the prescribed limits.

Consideration must be given to the fact that these limits are not intended to insure that all maneuvers which could be performed within them are also within the safe operating limits of the aircraft. It is reasonably certain that a prolonged full power descent in a nose down attitude of less than 30° would exceed placarded speeds, and that sudden full application of elevators at cruising speed could produce stresses sufficient to cause structural failure.

This interpretation is intended only to define the circumstances under which parachutes must be worn in accordance with section 43.48, and does not in any way modify the definition of aerobatic flight as it applies to other sections of the Civil Air Regulations.

(Published in 15 F.R. 5843, Aug. 30, 1950, effective Aug. 30, 1950.)

- 43.49 Parachutes. No pilot shall carry on an aircraft a parachute which is available for emergency use unless:
- (a) It is an approved chair-type (canopy in back) parachute which has been packed by a qualified parachute rigger within the preceding 120 days; or
- (b) It is an approved-type, other than a chair-type (canopy in back) parachute which has been packed by a qualified parachute rigger within the preceding 60 days.
- 43.50 Transportation of explosives and other dangerous articles. No person piloting an aircraft shall permit explosives or other dangerous articles such as inflammable liquids or solids, oxidizing material, corrosive liquid, inflammable or noninflammable compressed gas, poison gas or liquid, poisonous liquid or solid, or tear gas to be carried in aircraft, except as provided for in Part 49 of this chapter. Small arms ammunition for personal use, necessary aircraft signaling devices, and equipment necessary to safe operation of the aircraft are permitted.
- 43.51 Fuel supply. Aircraft operated under IFR conditions shall carry sufficient fuel, considering weather reports and forecasts of wind and other weather conditions, to complete the flight to the point of first intended landing, to fly from there to the alternate airport, and to fly thereafter for 45 minutes at normal cruising speed.

Student Pilot Limitations

- 43.52 General limitations. No student pilot shall pilot an aircraft carrying a passenger, or on an international flight, or for compensation or hire, or in furtherance of a business.
- 43.55. Aircraft limitations. A student shall not pilot an aircraft other than that of the make and model which has been endorsed

on his student pilot certificate by a flight instructor.

(Amendment 43-12, published in 24 F.R. 9418, Nov. 24, 1959, effective Dec. 29, 1959.)

43.56 Recent experience. A student who has not piloted a powered aircraft within 90 days shall not pilot such aircraft in solo flight until he has passed a flight check given by a flight instructor and that fact has been endorsed by such instructor in the student pilot logbook.

Private and Commercial Pilot Privileges and Limitations

- 43.60 Private pilot. [A private pilot shall not pilot aircraft for compensation or hire, except as provided in paragraphs (a) through (c) of this section.
- **[**(a) A private pilot may pilot aircraft in connection with any business or employment, if the flight is merely incidental thereto and does not involve the carriage of persons or property for compensation or hire.
- **(b)** An aircraft salesman holding a private pilot certificate may demonstrate aircraft in flight to a prospective purchaser if he has at least 200 hours of flight time credited in accordance with the provisions of Part 20 of this chapter.
- **[**(c) Subject to the provisions of subparagraphs (1) through (6) of this paragraph, a private pilot may pilot an aircraft used in a passenger-carrying airlift sponsored by a charitable organization, where the passengers make a donation to the organization for such carriage.

ENote: For the purpose of this regulation, charitable organizations are those listed in Publication No. 78 of the U.S. Treasury Department entitled "Cumulative List, Organizations Described in Section 170(c) of the Internal Revenue Code of 1954," and additions thereto. This list is compiled by the Internal Revenue Service and is issued by the Superintendent of Documents, Government Printing Office, Washington 25, D.C., and is available for reference at District Offices of the Internal Revenue Service.

[(1) The sponsor of the airlift shall notify the FAA General Aviation District Office having jurisdiction over the area concerned, at least 7 days in advance, and shall furnish that office with any essential information regarding the airlift, on request.

- **(2)** All flights shall be conducted from public airports adequate for the aircraft used, or from other airports that have been approved for the operation by an FAA inspector.
- [(3) Each participating private pilot shall have logged at least 200 hours of flight time credited in accordance with the provisions of Part 20 of this chapter.
- [(4) No acrobatic or formation flights shall be conducted.
- **(**5) Each aircraft used shall be certificated in the standard category, and shall comply with the 100-hour inspection requirement of section 43.22.
- [(6) All flights shall be conducted in conformity with visual flight rules and during daylight hours.
- [(Amendment 43-14, published in 26 F.R. 7122, Aug. 9, 1961, effective Aug. 9, 1961 effective Aug. 9, 1961.)]
 - 43.61 Commercial pilot. A commercial

- pilot may pilot aircraft for hire. A commercial glider pilot may give flight instruction in gliders.
- 43.62 Airline transport pilot. An airline transport pilot may exercise the privileges of a commercial pilot with an instrument rating.
- 43.63 Rating requirements. A private or commercial pilot shall not serve as pilot in command of an aircraft carrying passengers or operated for remuneration other than in aircraft of the category and class for which he is rated. After May 1, 1953, a private or commercial pilot shall not serve as pilot in command of aircraft exceeding 12,500 pounds maximum certificated weight when carrying passengers or operated for remuneration unless, in addition to proper category and class ratings, he also holds an appropriate type rating. Upon application to the Administrator prior to May 1, 1953, by the

SPECIAL CIVIL AIR REGULATION NO. SR-399D

Effective: June 24, 1961 Adopted: June 20, 1961 Published: June 24, 1961 (26 F.R. 5673)

Provisional Maximum Certificated Weights for Certain Airplanes Operated by Alaskan Air Carriers, Air Taxi Operators in Alaska, and the Department of the Interior

Special Civil Air Regulation No. SR-399C, effective October 26, 1960 (25 F.R. 10423), authorized the Director, Bureau of Flight Standards, and his designated representative to establish increased maximum weights for certain airplanes of 12,500 pounds or less operated entirely within Alaska by Alaskan air carriers and Alaskan air taxi operators pursuant to Parts 292 and 293 of the Civil Aeronautics Board's Economic Regulations or by the United States Department of the Interior.

Effective January 1, 1961, the Civil Aeronautics Board rescinded Part 293 (25 F.R. 12908) which applied to Alaskan air taxi operators and concurrently adopted revised Part 298 (25 F.R. 12909) which applies to air taxi operators generally. Accordingly, the reference in SR-399C to Part 293 of the Civil Aeronautics Board's Economic Regulations is no longer appropriate.

Under Part 293, Alaskan air taxi operators were not permitted to operate aircraft weighing more than 7,900 pounds at increased maximum weights, notwithstanding the 12,500-pound limit in SR-399C. Although the action taken by the Board, i.e., the repeal of Part 293 and amendment of Part 298, no longer imposes the 7,900-pound limit, it is noteworthy that current Alaskan law does.

Since this regulatory action involves only a minor editorial change and imposes no additional burden upon any person, notice and public procedure hereon are unnecessary, and it may be made effective on less than 30 days' notice.

In consideration of the foregoing, the following Special Civil Air Regulation is hereby adopted to become effective June 24, 1961:

- 1. Notwithstanding any contrary provisions of the Civil Air Regulations, the Director, Bureau of Flight Standards, and any employee of such administrative unit as he shall designate may increase the maximum certificated weight for airplanes which are:
- (a) Operated entirely within the State of Alaska by an Alaskan air carrier or an air taxi operator pursuant to Parts 292 and 298, respectively, of the Civil Aeronautics Board's Economic Regulations, or by the United States Department of the Interior in the conduct of its game and fish law enforcement activities and its management, fire detection, and fire suppression activities concerning public lands; and

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- (b) Type certificated under the provisions of Aeronautics Bulletin No. 7-A of the Aeronautics Branch of the United States Department of Commerce dated January 1, 1931, as amended, or under the normal category of Part 4a of the Civil Air Regulations.
- 2. The maximum certificated weight herein referred to shall not exceed any of the following:
 - (a) 12.500 pounds.
- (b) 115 percent of the maximum weight listed in the FAA Aircraft Specification,
- (c) The weight at which the airplane meets the positive maneuvering load factor requirement for the normal category specified in section 3.186 of the Civil Air Regulations, or
- (d) The weight at which the airplane meets the climb performance requirements under which it was type certificated.
- 3. In determining the maximum certificated weight the structural soundness of the airplane and the terrain to be traversed in the operation will be considered.
- 4. The maximum certificated weight so determined will be added to the airplane's operation limitations and identified as the maximum weight authorized for operations within the State of Alaska.

This regulation supersedes Special Civil Air Regulation No. SR-399C, and shall terminate on October 25, 1965, unless sooner superseded or rescinded.

provisional amendments to type certificates, shall be submitted to the Chief, Flight Standards Division, FAA, of the Regional Office in which the manufacturer or air carrier is located and shall be accompanied by the pertinent information specified in this regulation.

- 4. Duration. Unless sooner surrendered, superseded, revoked, or otherwise terminated, certificates and amendments thereto, shall have periods of duration in accordance with paragraphs (a) through (f) of this section.
- (a) A Class I provisional type certificate shall remain in effect for 24 months after the date of its issuance or until the date of issuance of the corresponding type or supplemental type certificate, whichever occurs first.
- (b) A Class I provisional type certificate shall expire immediately upon issuance of a Class II provisional type certificate for aircraft of the same type design.
- (c) A Class II provisional type certificate shall remain in effect for 6 months after the date of its issuance or 60 days after the date of issuance of the corresponding type certificate, whichever occurs first.
- (d) An amendment to a Class I or a Class II provisional type certificate shall remain in effect for the duration of the corresponding provisional type certificate.
- (e) A provisional amendment to a type certificate shall remain in effect for 6 months after its approval or until the amendment to the type certificate is approved, whichever occurs first.
- (f) Provisional airworthiness certificates shall remain in effect for the duration of the corresponding provisional type certificate, amendment to a provisional type certificate, or a provisional amendment to the type certificate.
- 5. Transferability of certificates. Certificates issued pursuant to this regulation are not transferable except that a Class II provisional airworthiness certificate may be transferred to an air carrier eligible to apply for such certificate under section 2 of this regulation.
- 6. Display of certificates and markings. A provisional airworthiness certificate shall be prominently displayed in the aircraft for which it is issued. The words "Provisional Airworthiness" shall be painted in letters not less than 2 inches high on the exterior of such aircraft adjacent to each entrance to the cabin and cockpit of the aircraft.

REQUIREMENTS FOR ISSUANCE

7. Class I provisional type certificates. A Class I provisional type certificate and amendments thereto will be issued for a particular type design when the eligible aircraft or engine manufacturer shows compliance with the provisions of paragraphs (a) through (f) of this section, and an authorized representative of the Administrator finds, on the basis of information submitted to him by the manufacturer in compliance with the provisions of this section and of other relevant information, that there is no feature, characteristic, or condition which would render the aircraft unsafe when operated in accordance with the limitations established in paragraph (d) of this section and in section 13 of this regulation.

- (a) The manufacturer has applied for the issuance of a type or supplemental type certificate for the aircraft.
- (b) The manufacturer certifies that the aircraft has met the provisions of subparagraphs (1) through (3) of this paragraph.
- (1) The aircraft has been designed and constructed in accordance with the airworthiness requirements applicable to the issuance of the type or supplemental type certificate for the aircraft;
- (2) The aircraft substantially complies with the applicable flight characteristics requirements for the type or supplemental type certificate:
- (3) The aircraft can be operated safely under the appropriate operating limitations specified in this regulation.
- (c) The manufacturer has submitted a report showing that the aircraft had been flown in all maneuvers necessary to show compliance with the flight requirements for the issuance of the type or supplemental type certificate and to establish that the aircraft can be operated safely in accordance with the limitations specified in this regulation.
- (d) The manufacturer has established limitations with respect to weights, speeds, flight maneuvers, loading, operation of controls and equipment, and all other relevant factors. The limitations shall include all the limitations required for the issuance of a type or supplemental type certificate for the aircraft: *Provided*, That, where such limitations have not been established, appropriate restrictions on the operation of the aircraft shall be established.
- (e) The manufacturer has established an inspection and maintenance program for the continued airworthiness of the aircraft.
- (f) A prototype aircraft has been flown by the manufacturer for at least 50 hours pursuant to the authority of an experimental certificate issued under Part 1 of the Civil Air Regulations or under the auspices of a United States military service: *Provided*, That the number of flight hours may be reduced by the authorized representative of the Administrator in the case of an amendment to a provisional type certificate.
- 8. Class I provisional airworthiness certificates. Except as provided in section 12 of this regulation, a Class I provisional airworthiness certificate will be issued for an aircraft, for which a Class I provisional type certificate is in effect, when the eligible aircraft or engine manufacturer shows compliance with the provisions of paragraphs (a) through (d) of this section, and an authorized representative of the Administrator finds that there is no feature, characteristic, or condition of the aircraft which would render the aircraft unsafe when operated in accordance with the limitations established in sections 7(d) and 13 of this regulation.
- (a) The manufacturer is the holder of the provisional type certificate for the aircraft.
- (b) The manufacturer submits a statement that the aircraft conforms to the type design corresponding with the provisional type certificate and has been found by him to be in safe operating condition under the applicable limitations.
- (c) The aircraft has been flown at least 5 hours by the manufacturer.

- (d) The aircraft has been supplied with a provisional aircraft flight manual or other document and appropriate placards containing the limitations required by sections 7(d) and 13 of this regulation.
- 9. Class II provisional type certificates. A Class II provisional type certificate and amendments thereto will be issued for a particular transport category type design when the manufacturer of the aircraft shows compliance with the provisions of paragraphs (a) through (h) of this section, and an authorized representative of the Administrator finds, on the basis of information submitted to him by the manufacturer in compliance with the provisions of this section and of other relevant information, that there is no feature, characteristic, or condition which would render the aircraft unsafe when operated in accordance with the limitations established in paragraph (f) of this section and in sections 13 and 14 of this regulation.
- (a) The manufacturer has applied for the issuance of a transport category type certificate for the aircraft.
- (b) The manufacturer holds a type certificate and a currently effective production certificate for at least one other aircraft in the same transport category as the subject aircraft.
- (c) The Agency's official flight test program with respect to the issuance of a type certificate for the aircraft is in progress.
- (d) The manufacturer certifies that the aircraft has met the provisions of subparagraphs (1) through (3) of this paragraph.
- (1) The aircraft has been designed and constructed in accordance with the airworthiness requirements applicable to the issuance of the type certificate for the aircraft;
- (2) The aircraft substantially complies with the applicable flight characteristics requirements for the type certificate;
- (3) The aircraft can be operated safely under the appropriate operating limitations specified in this regulation.
- (e) The manufacturer has submitted a report showing that the aircraft had been flown in all maneuvers necessary to show compliance with the flight requirements for the issuance of the type certificate and to establish that the aircraft can be operated safely in accordance with the limitations specified in this regulation.
- (f) The manufacturer has prepared a provisional aircraft flight manual which includes limitations with respect to weights, speeds, flight maneuvers, loading, operation of controls and equipment, and all other relevant factors. The limitations shall include all the limitations required for the issuance of a type certificate for the aircraft: *Provided*, That, where such limitations have not been established, the provisional flight manual shall contain appropriate restrictions on the operation of the aircraft.
- (g) The manufacturer has established an inspection and maintenance program for the continued airworthiness of the aircraft.
- (h) A prototype aircraft has been flown by the manufacturer for at least 100 hours pursuant to the authority of either an experimental certificate issued under Part 1 of the Civil Air Regulations or a Class I provisional airworthiness certificate: *Provided*, That the number of flight hours may be reduced by the authorized representative of the Administrator in the case of an amendment to a provisional type certificate.

- 10. Class II provisional airworthiness certificates. Except as provided in section 12 of this regulation, a Class II provisional airworthiness certificate will be issued for an aircraft, for which a Class II provisional type certificate is in effect, when the applicant shows compliance with the provisions of paragraphs (a) through (e) of this section, and an authorized representative of the Administrator finds that there is no feature, characteristic, or condition of the aircraft which would render the aircraft unsafe when operated in accordance with the limitations established in sections 9(f), 13, and 14 of this regulation.
- (a) The applicant submits evidence that a Class II provisional type certificate for the aircraft has been issued to the manufacturer.
- (b) The applicant submits a statement by the manufacturer that the aircraft has been manufactured under a quality control system adequate to insure that the aircraft conforms to the type design corresponding with the provisional type certificate.
- (c) The applicant submits a statement that the aircraft has been found by him to be in a safe operating condition under the applicable limitations.
- (d) The applicant submits a statement that the aircraft has been flown at least 5 hours by the manufacturer.
- (e) The aircraft has been supplied with a provisional aircraft flight manual containing the limitations required by sections 9(f), 13, and 14 of this regulation.
- 11. Provisional amendments to type certificate. A provisional amendment to a type certificate will be approved when the manufacturer of the type certificated aircraft shows compliance with the provisions of paragraphs (a) through (g) of this section, and an authorized representative of the Administrator finds, on the basis of information submitted to him by the manufacturer in compliance with the provisions of this section and of other relevant information, that there is no feature, characteristic, or condition which would render the aircraft unsafe when operated in accordance with the limitations established in paragraph (e) of this section, and section 13 and, if applicable, section 14 of this regulation.
- (a) The manufacturer has applied for an amendment to the type certificate.
- (b) The Agency's official flight test program with respect to the amendment of the type certificate is in progress.
- (c) The manufacturer certifies that the aircraft has met the provisions of subparagraphs (1) through (3) of this paragraph.
- (1) The modification involved in the amendment to the type certificate has been designed and constructed in accordance with the airworthiness requirements applicable to the issuance of the type certificate for the aircraft;
- (2) The aircraft substantially complies with the applicable flight characteristics requirements for the type certificate;
- (3) The aircraft can be operated safely under the appropriate operating limitations specified in this regulation.
- (d) The manufacturer has submitted a report showing that the aircraft incorporating the modifications involved had been flown in all maneuvers necessary to show compliance with the flight require-

ments applicable to these modifications and to establish that the aircraft can be operated safely in accordance with the limitations specified in this regulation.

- (e) The manufacturer has established, in a provisional aircraft flight manual or other document and appropriate placards, limitations with respect to weights, speeds, flight maneuvers, loading, operation of controls and equipment, and all other relevant factors. The limitations shall include all the limitations required for the issuance of a type certificate for the aircraft: *Provided*, That, where such limitations have not been established, appropriate restrictions on the operation of the aircraft shall be established.
- (f) The manufacturer has established an inspection and maintenance program for the continued airworthiness of the aircraft.
- (g) An aircraft modified in accordance with the corresponding amendment to the type certificate has been flown by the manufacturer for the number of hours found necessary by the authorized representative of the Administrator, such flights having been conducted pursuant to the authority of an experimental certificate issued under Part 1 of the Civil Air Regulations.
- 12. Provisional airworthiness certificates corresponding with provisional amendment to type certificate. A Class I or a Class II provisional airworthiness certificate, as specified in section 2 of this regulation, will be issued for an aircraft, for which a provisional amendment to the type certificate has been issued, when the applicant shows compliance with the provisions of paragraphs (a) through (e) of this section, and an authorized representative of the Administrator finds that there is no feature, characteristic, or condition of the aircraft, as modified in accordance with the provisionally amended type certificate, which would render the aircraft unsafe when operated in accordance with the limitations established in sections 11(e) and 13 and, if applicable, section 14 of this regulation.
- (a) The applicant submits evidence that approval has been obtained for the relevant provisional amendment to the type certificate for the aircraft.
- (b) The applicant submits evidence that the modification to the aircraft was accomplished under a quality control system adequate to insure that the modification conforms to the provisionally amended type certificate.
- (c) The applicant submits a statement that the aircraft has been found by him to be in a safe operating condition under the applicable limitations.
- (d) The applicant submits a statement that the aircraft has been flown at least 5 hours by the manufacturer.
- (e) The aircraft has been supplied with a provisional aircraft flight manual or other document and appropriate placards containing the limitations required by sections 11(e) and 13 and, if applicable, section 14 of this regulation.

OPERATING LIMITATIONS

13. Operation of provisionally certificated aircraft. An aircraft for which a provisional airworthiness certificate has been issued shall

be operated only by a person eligible to apply for a provisional airworthiness certificate in accordance with section 2 of this regulation. Operations shall be in compliance with paragraphs (a) through (j) of this section.

- (a) The aircraft shall not be operated in air transportation unless so authorized in a particular case by the Director, Bureau of Flight Standards.
- (b) Operations shall be restricted to the United States, its Territories and possessions.
- (c) The aircraft shall be limited to the types of operations listed in subparagraphs (1) through (7) of this paragraph.
- (1) Flights conducted by the aircraft or engine manufacturer in direct conjunction with the type or supplemental type certification of the aircraft:
- (2) Training of flight crews, including simulated air carrier operations;
- (3) Demonstration flights conducted by the manufacturer for prospective purchasers;
 - (4) Market surveys by the manufacturer;
- (5) Flight checking of instruments, accessories, and equipment, the functioning of which does not adversely affect the basic airworthiness of the aircraft;
 - (6) Service testing of the aircraft;
- (7) Such additional operations as may be specifically authorized by the authorized representative of the Administrator.
- (d) All operations shall be conducted within the prescribed limitations displayed in the aircraft or set forth in the provisional aircraft flight manual or other document containing the limitations for the safe operation of the aircraft: *Provided*, That operations conducted in direct conjunction with the type or supplemental type certification of the aircraft shall be subject to the experimental aircraft limitations of section 1.74 of Part 1 of the Civil Air Regulations, and all "flight tests" as defined in section 60.60 of the Civil Air Regulations shall be conducted in accordance with the requirements of section 60.24 of that part.
- (e) The operator shall establish procedures for the use and guidance of flight and ground personnel in the conduct of operations under this section. Specific procedures shall be established for operations from and into airports where the runways require takeoffs or approaches over populated areas. All procedures shall be approved by an authorized representative of the Administrator. All operations shall be conducted in accordance with such approved procedures.
- (f) The operator shall insure that each flight crewmember is properly certificated and possesses adequate knowledge of, and familiarity with, the aircraft and the procedures to be used by him.
- (g) The aircraft shall be maintained in accordance with applicable Civil Air Regulations, with the inspection and maintenance program established in accordance with this regulation, and with any special inspections and maintenance conditions prescribed by an authorized representative of the Administrator.
- (h) No aircraft shall be operated under authority of a provisional airworthiness certificate if the manufacturer or the authorized

representative of the Administrator determines that a change in design, construction, or operation is necessary to insure safe operation, until such change is made and approved by the authorized representative of the Administrator. Section 1.24 of Part 1 of the Civil Air Regulations shall be applicable to operations under this section.

- (i) Only those persons who have a bona fide interest in the operations permitted under this section or who are specifically authorized by both the manufacturer and the authorized representative of the Administrator may be carried in provisionally certificated aircraft: *Provided*, That they have been advised by the operator of the provisional certification status of the aircraft.
- (j) The authorized representative of the Administrator may prescribe such additional limitations or procedures as he finds necessary. This shall include limitations on the number of persons who may be carried aboard the aircraft.
- 14. Additional limitations to operations by air carriers. In addition to the limitations in section 13 of this regulation, operations by air carriers shall be subject to the provisions of paragraphs (a) through (d) of this section.
- (a) In addition to crewmembers, the aircraft may carry only those persons who are listed in section 40.356(c) of Part 40 of the Civil Air Regulations or who are specifically authorized by both the air carrier and the authorized representative of the Administrator.
- (b) The air carrier shall maintain current records for each flight crewmember. These records shall include such information as is necessary to show that each flight crewmember is properly trained and qualified to perform his assigned duties.
- (c) The appropriate instructor, supervisor, or check airman shall certify to the proficiency of each flight crewmember and such certification shall become a part of the flight crewmember's record.
- (d) A log of all flights conducted under this regulation, and accurate and complete records of inspections made and maintenance accomplished, shall be kept by the air carrier and made available to the manufacturer and to an authorized representative of the Administrator.
- 15. Other operations. The Director, Bureau of Flight Standards, may credit toward the aircraft proving test requirements of the applicable air carrier regulations such operations conducted pursuant to this special regulation as he finds have met the applicable aircraft proving test requirements: *Provided*, That he also finds that there is no significant difference between the provisionally certificated aircraft and the aircraft for which application is made for operation pursuant to an air carrier operating certificate.

CERTIFICATES ISSUED UNDER SR-425A AND SR-425B

16. Duration. Currently valid provisional type and airworthiness certificates issued in accordance with Special Civil Air Regulations Nos. SR-425A and SR-425B shall remain in effect for the durations and under the conditions prescribed in those regulations.

This special regulation supersedes Special Civil Air Regulation No. SR-425B and shall terminate on June 30, 1963, unless sooner superseded, rescinded, or otherwise terminated.

SPECIAL CIVIL AIR REGULATION NO. SR-446A

Effective: May 25, 1962 Adopted: May 22, 1962 Published: May 25, 1962

(27 F.R. 4906)

Use of Portable Frequency Modulation (FM) Type Radio Receivers on Aircraft
During Flight

In 1961, during tests conducted by the Federal Aviation Agency's Aviation Research and Development Service, it was found that radio receivers having local oscillators operating within or near the VHF omnirange (VOR) frequency band (108 to 118 Mcs.) cause interference which adversely affects the operation of an aircraft's VOR navigational system. Various types of portable radio receivers (i.e., radio receivers capable of being carried aboard an aircraft by a passenger) were used in these tests to determine which would produce interference to the VOR equipment. It was determined that the portable frequency modulation (FM) radio receiver is the only type radio receiver, which is commonly used by the general public, that would create this unwanted interference. Therefore, it was found that immediate regulatory action was necessary in order to provide adequately for safety in air commerce.

Accordingly, on May 4, 1961, the Federal Aviation Agency issued Special Civil Air Regulation No. SR-446 (26 F.R. 4011) to become effective May 25, 1961. This regulation, which will expire May 24, 1962, prohibits the operation of portable FM radio receivers during flight on all civil aircraft of the United States operated by an air carrier or a commercial operator. It also prohibits the operation of portable FM radio receivers on all other VOR-equipped civil aircraft of the United States while such VOR equipment is being used for navigational purposes. The added restriction in the case of aircraft operated by an air carrier or a commercial operator was necessary since most of these aircraft are equipped with VOR navigational equipment and it would be difficult, if not impossible, for a passenger to know when the pilot in command was depending upon this equipment for navigational purposes. In addition, although not all portable FM radio receivers utilize local oscillators which will create interference, it was necessary to make the rule applicable to all portable FM radio receivers since it would not be feasible to expect the general public, airline personnel, or air crewmembers to distinguish which will cause this interference.

The tests which disclosed the interference problems caused by FM radio receivers were not completed at the time SR-446 was issued in 1961. Therefore, to simplify revision of the rule if additional interference problems were found by the tests, SR-446 was issued as a temporary rule, effective for a 1-year period. When SR-446 was issued, the Agency had intended, prior to its expiration, to incorporate the provisions of the rule into the applicable operating parts, i.e., Parts 40, 41, 42, 43, 45, and 46.

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APPENDIX CAM 43

However, since the final evaluation of these tests by all interested industry parties has not been completed, this action has not been taken. Accordingly, since the conditions under which SR-446 was issued still exist, it is necessary, in order to provide adequately for safety in air commerce, to extend the provisions of that rule for a period of one year.

Since this regulation extends the provisions of a currently effective regulation which expires on May 24, 1962, and a lapse in the effectiveness of the regulation would endanger safety in air commerce, I find that notice and public procedure hereon would be contrary to the public interest, and that good cause exists for making it effective on less than 30 days' notice.

In consideration of the foregoing, Special Civil Air Regulation No. SR-446 is superseded by the following Special Civil Air Regulation which is hereby adopted to become effective on May 25, 1962:

No person shall operate, nor shall any operator or pilot in command of an aircraft permit the operation of, a portable frequency modulation (FM) radio receiver on the following civil aircraft of the United States while such aircraft are engaged in flight in air commerce: (a) Aircraft operated by an air carrier or commercial operator; and (b) any other aircraft equipped with VHF omnirange (VOR) navigational equipment while such VOR equipment is being used for navigational purposes.

This special regulation supersedes Special Civil Air Regulation No. SR-446 and shall remain in effect for one year unless sooner superseded or rescinded by the Federal Aviation Agency.

86 (Rev. 6/1/62)

ADDENDUM

Amendment 43-14

Use of Private Pilots in Charity Airlifts Adopted: Aug. 1, 1961 Effective: Aug. 9, 1961 Published; Aug. 9, 1961 (26 F.R. 7122)

Section 43.60 of the Civil Air Regulations provides that a private pilot shall not pilot aircraft for compensation or hire. However, this regulation also provides that a private pilot may pilot aircraft in connection with a business if the flight is merely incidental thereto; and that an aircraft salesman holding a private pilot certificate may demonstrate aircraft in flight to a prospective purchaser if he has logged 200 hours of pilot flight time.

For many years charitable organizations used the "Charity Airlift" as a means of raising funds. In such an airlift, the charitable organization offered an airplane ride in exchange for a personal donation. Many of the rides were given in aircraft furnished and operated by private pilots who provided their services without compensation. The money donated by the passengers was retained by the charitable organization, and no payment for the service rendered was made to the pilot or aircraft owner; however, in some cases the organization paid for or supplied the fuel and oil consumed during the flights.

Shortly before the Federal Aviation Agency was established, Civil Aeronautics Board Examiners rendered several opinions on violation cases involving private pilots who had donated their services for fund-raising flights. The Examiners concluded that section 43.60 required pilots engaging in such flights to hold commercial pilot certificates. For some time thereafter, the Federal Aviation Agency permitted the operation of charity airlifts using private pilots, by issuing an individual exemption to the sponsor of each airlift. These exemptions specified safety requirements believed necessary for the particular airlift being conducted. This procedure was discontinued in June 1960 on the premise that passengers who receive rides because of charitable donations are entitled to fly with pilots who meet commercial pilot standards.

In May of 1961, the National Foundation (March of Dimes) petitioned the Federal Aviation Agency to reconsider the matter of charity airlifts involving private pilot participation. The Foundation pointed out that the prohibition against the use of private pilots for such airlifts had adversely affected fund-raising efforts and that the practical effect had been to reduce pilot participation in the 1961 March of Dimes airlifts by nearly 75 percent. They suggested an amendment to the regulations with the incorporation of special provisions as necessary, which would permit private pilots to participate in charity airlifts.

Consideration has been given to their petition. We have determined that (1) the use of private pilots operating under reasonable restrictions and with adequate supervision should provide a level of safety comparable to that expected of a commercial operation; (2) the heavy administrative burden formerly associated with the issuance of specific exemptions would be eliminated by an appropriate amendment to Part 43 of the Civil Air Regulations; and (3) private pilot participation in charity airlifts, with suitable safety provisions, is in the public interest.

Since this amendment relieves a restriction and delay in extending such relief would impose an unnecessary burden on certain persons, the Administrator for good cause finds that notice and public procedure hereon would be contrary to the public interest and may be omitted, and that this amendment may be made effective on less than 30 days' notice.

Amendment revised section 43.60.