# § 121.293 Special airworthiness requirements for nontransport category airplanes type certificated after December 31, 1964.

No certificate holder may operate a nontransport category airplane manufactured after December 20, 1999 unless the airplane contains a takeoff warning system that meets the requirements of 14 CFR 25.703. However, the takeoff warning system does not have to cover any device for which it has been demonstrated that takeoff with that device in the most adverse position would not create a hazardous condition.

[Doc. No. 28154, 60 FR 65929, Dec. 20, 1995]

#### § 121.295 Location for a suspect device.

After November 28, 2009, all airplanes with a maximum certificated passenger seating capacity of more than 60 persons must have a location where a suspected explosive or incendiary device found in flight can be placed to minimize the risk to the airplane.

[Doc. No. FAA-2006-26722, 73 FR 63880, Oct. 28, 2008]

# Subpart K—Instrument and Equipment Requirements

SOURCE: Docket No. 6258, 29 FR 19205, Dec. 31, 1964, unless otherwise noted.

#### §121.301 Applicability.

This subpart prescribes instrument and equipment requirements for all certificate holders.

## § 121.303 Airplane instruments and equipment.

- (a) Unless otherwise specified, the instrument and equipment requirements of this subpart apply to all operations under this part.
- (b) Instruments and equipment required by §§ 121.305 through 121.359 and 121.803 must be approved and installed in accordance with the airworthiness requirements applicable to them.
- (c) Each airspeed indicator must be calibrated in knots, and each airspeed limitation and item of related information in the Airplane Flight Manual and pertinent placards must be expressed in knots.
- (d) Except as provided in §§ 121.627(b) and 121.628, no person may take off any

airplane unless the following instruments and equipment are in operable condition:

- (1) Instruments and equipment required to comply with airworthiness requirements under which the airplane is type certificated and as required by §§ 121.213 through 121.283 and 121.289.
- (2) Instruments and equipment specified in §§121.305 through 121.321, 121.359, 121.360, and 121.803 for all operations, and the instruments and equipment specified in §§121.323 through 121.351 for the kind of operation indicated, wherever these items are not already required by paragraph (d)(1) of this section.

[Doc. No. 6258, 29 FR 19202, Dec. 31, 1964, as amended by Amdt. 121–44, 33 FR 14406, Sept. 25, 1968; Amdt. 121–65, 35 FR 12709, Aug. 11, 1970; Amdt. 121–114, 39 FR 44440, Dec. 24, 1974; Amdt. 121–126, 40 FR 55314, Nov. 28, 1975; Amdt. 121–222, 56 FR 12310, Mar. 22, 1991; Amdt. 121–253, 61 FR 2611, Jan. 26, 1996; Amdt. 121–281, 66 FR 19043, Apr. 12, 2001]

## § 121.305 Flight and navigational equipment.

No person may operate an airplane unless it is equipped with the following flight and navigational instruments and equipment:

- (a) An airspeed indicating system with heated pitot tube or equivalent means for preventing malfunctioning due to icing.
  - (b) A sensitive altimeter.
- (c) A sweep-second hand clock (or approved equivalent).
  - (d) A free-air temperature indicator.
- (e) A gyroscopic bank and pitch indicator (artificial horizon).
- (f) A gyroscopic rate-of-turn indicator combined with an integral slipskid indicator (turn-and-bank indicator) except that only a slip-skid indicator is required when a third attitude instrument system usable through flight attitudes of 360° of pitch and roll is installed in accordance with paragraph (k) of this section.
- (g) A gyroscopic direction indicator (directional gyro or equivalent).
  - (h) A magnetic compass.
- (i) A vertical speed indicator (rate-of-climb indicator).