## § 25.865

- (3) Possible ignition sources, including electrical faults, overheating of equipment, and malfunctioning of protective devices.
- (4) Means available for controlling or extinguishing a fire, such as stopping flow of fluids, shutting down equipment, fireproof containment, or use of extinguishing agents.
- (5) Ability of airplane components that are critical to safety of flight to withstand fire and heat.
- (c) If action by the flight crew is required to prevent or counteract a fluid fire (e.g., equipment shutdown or actuation of a fire extinguisher) quick acting means must be provided to alert the crew.
- (d) Each area where flammable fluids or vapors might escape by leakage of a fluid system must be identified and defined.

[Amdt. 25–23, 35 FR 5676, Apr. 8, 1970, as amended by Amdt. 25–46, 43 FR 50597, Oct. 30, 1978]

#### § 25.865 Fire protection of flight controls, engine mounts, and other flight structure.

Essential flight controls, engine mounts, and other flight structures located in designated fire zones or in adjacent areas which would be subjected to the effects of fire in the fire zone must be constructed of fireproof material or shielded so that they are capable of withstanding the effects of fire.

[Amdt. 25-23, 35 FR 5676, Apr. 8, 1970]

# § 25.867 Fire protection: other components.

- (a) Surfaces to the rear of the nacelles, within one nacelle diameter of the nacelle centerline, must be at least fire-resistant.
- (b) Paragraph (a) of this section does not apply to tail surfaces to the rear of the nacelles that could not be readily affected by heat, flames, or sparks coming from a designated fire zone or engine compartment of any nacelle.

[Amdt. 25-23, 35 FR 5676, Apr. 8, 1970]

## § 25.869 Fire protection: systems.

- (a) Electrical system components:
- (1) Components of the electrical system must meet the applicable fire and

smoke protection requirements of §§ 25.831(c) and 25.863.

- (2) Equipment that is located in designated fire zones and is used during emergency procedures must be at least fire resistant.
- (3) EWIS components must meet the requirements of §25.1713.
- (b) Each vacuum air system line and fitting on the discharge side of the pump that might contain flammable vapors or fluids must meet the requirements of §25.1183 if the line or fitting is in a designated fire zone. Other vacuum air systems components in designated fire zones must be at least fire resistant.
- (c) Oxygen equipment and lines must—
- (1) Not be located in any designated fire zone,
- (2) Be protected from heat that may be generated in, or escape from, any designated fire zone, and
- (3) Be installed so that escaping oxygen cannot cause ignition of grease, fluid, or vapor accumulations that are present in normal operation or as a result of failure or malfunction of any system.

[Amdt. 25–72, 55 FR 29784, July 20, 1990, as amended by Amdt. 25–113, 69 FR 12530, Mar. 16, 2004; Amdt. 25–123, 72 FR 63405, Nov. 8, 2007]

# MISCELLANEOUS

### §25.871 Leveling means.

There must be means for determining when the airplane is in a level position on the ground.

[Amdt. 25-23, 35 FR 5676, Apr. 8, 1970]

#### § 25.875 Reinforcement near propellers.

- (a) Each part of the airplane near the propeller tips must be strong and stiff enough to withstand the effects of the induced vibration and of ice thrown from the propeller.
- (b) No window may be near the propeller tips unless it can withstand the most severe ice impact likely to occur.