

§ 80.876 VHF radiotelephone antenna system.

A vertically polarized nondirectional antenna must be provided for VHF radiotelephone installations. The construction and installation of this antenna must insure proper operation in an emergency.

§ 80.877 Controls and indicators required for VHF radiotelephone installation.

The controls and indicators used on equipment of the VHF radiotelephone installation must meet the following standards:

(a) The size of controls must easily permit normal adjustment. The function and the setting of the controls must be clearly indicated.

(b) Controls must be illuminated to permit satisfactory operation of the equipment.

(c) Means must be provided to reduce to extinction any light output from the equipment which could affect safety of navigation.

(d) An on/off switch must be provided for the entire installation with a visual indication that the installation is switched on.

(e) The equipment must indicate the channel number, as given in the Radio Regulations, to which it is tuned. It must allow the determination of the channel number under all conditions of external lighting. Channel 16 must be distinctively marked.

(f) The receiver must have a manual volume control and a squelch control.

(g) If the external controls are on a separate control unit and more than one such control unit is provided, the one on the bridge must have priority over the others. When there is more than one control unit, indication must be given to the other(s) that the transmitter is in operation.

§ 80.879 Radar installation requirements and specifications.

Ships of 500 gross tons and upwards that are constructed on or after September 1, 1984, must comply with the radar installation requirements and specifications contained in § 80.825 of this part.

[52 FR 35246, Sept. 18, 1987]

Subpart S—Compulsory Radiotelephone Installations for Small Passenger Boats**§ 80.901 Applicability.**

The provisions of Part III of Title III of the Communication Act require United States vessels which transport more than six passengers for hire while such vessels are being navigated on any tidewater within the jurisdiction of the United States adjacent or contiguous to the open sea, or in the open sea to carry a radiotelephone installation complying with this subpart. The provisions of Part III do not apply to vessels which are equipped with a radio installation for compliance with Part II of Title III of the Act, or for compliance with the Safety Convention, or to vessels navigating on the Great Lakes.

§ 80.903 Inspection of radiotelephone installation.

Every vessel subject to Part III of Title III of the Communications Act must have a detailed inspection of the radio installation by an FCC-licensed technician in accordance with § 80.59 once every five years. The FCC-licensed technician must use the latest FCC Information Bulletin, *How to Conduct an Inspection of a Small Passenger Vessel*. If the ship passes the inspection, the technician will issue a Communications Act Safety Radiotelephony Certificate. Communications Act Radiotelephony Certificates may be obtained from the Commission's National Call Center—(888) 225-5322—or from its forms contractor.

[63 FR 29660, June 1, 1998]

§ 80.905 Vessel radio equipment.

(a) Vessels subject to part III of title III of the Communications Act that operate in the waters described in § 80.901 of this section must, at a minimum, be equipped as follows:

(1) Vessels operated solely within the communications range of a VHF public coast station or U.S. Coast Guard station that maintains a watch on 156.800 MHz while the vessel is navigated must be equipped with a VHF radiotelephone installation. Vessels in this category must not operate more than 20 nautical miles from land.

(2) Vessels operated beyond the 20 nautical mile limitation specified in paragraph (a)(1) of this section, but not more than 100 nautical miles from the nearest land, must be equipped with a medium frequency transmitter capable of transmitting J3E emission and a receiver capable of reception of J3E emission within the band 1710 to 2850 kHz, in addition to the VHF radiotelephone installation required by paragraph (a)(1) of this section. The medium frequency transmitter and receiver must be capable of operation on 2670 kHz.

(3) Vessels operated more than 100 nautical miles but not more than 200 nautical miles from the nearest land must:

(i) Be equipped with a VHF radiotelephone installation;

(ii) Be equipped with an MF radiotelephone transmitter and receiver meeting the requirements of paragraph (a)(2) of this section; and

(iii) Be equipped with either:

(A) a single sideband radiotelephone capable of operating on all distress and safety frequencies in the medium frequency and high frequency bands listed in §§ 80.369 (a) and (b), on all the ship-to-shore calling frequencies in the high frequency bands listed in § 80.369(d), and on at least four of the automated mutual-assistance vessel rescue (AMVER) system HF duplex channels (this requirement may be met by the addition of such frequencies to the radiotelephone installation required by paragraph (a)(2) of this section); or

(B) if operated in an area within the coverage of an INMARSAT maritime mobile geostationary satellite in which continuous alerting is available, an INMARSAT ship earth station meeting the equipment authorization rules of parts 2 and 80 of this chapter;

(iv) Be equipped with a reserve power supply meeting the requirements of §§ 80.917(b), 80.919, and 80.921, and capable of powering the single sideband radiotelephone or the ship earth station (including associated peripheral equipment) required by paragraph (a)(3)(iii) of this section;

(v) Be equipped with a NAVTEX receiver conforming to the following performance standards: IMO Resolution A.525(13) and CCIR Recommendation 540;

(vi) Be equipped with a Category I, 406 MHz satellite emergency position-indicating radiobeacon (EPIRB) meeting the requirements of § 80.1061; and,

(vii) Participate in the AMVER system while engaged on any voyage where the vessel is navigated in the open sea for more than 24 hours. Copies of the AMVER Bulletin are available at: AMVER Maritime Relations (GNRS-3/AMR), U.S. Coast Guard, Building 110, Box 26, Governor's Island, N.Y. 10004-5034, telephone number (212) 668-7764.

(4) Vessels operated more than 200 nautical miles from the nearest land must:

(i) Be equipped with two VHF radiotelephone installations;

(ii) Be equipped with an MF radiotelephone transmitter and receiver meeting the requirements of paragraph (a)(2) of this section;

(iii) Be equipped with either:

(A) an independent single sideband radiotelephone capable of operating on all distress and safety frequencies in the medium frequency and high frequency bands listed in §§ 80.369(a) and (b), on all of the ship-to-shore calling frequencies in the high frequency bands listed in § 80.369(d), and on at least four of the automated mutual-assistance vessel rescue (AMVER) system HF duplex channels; or

(B) If operated in an area within the coverage of an INMARSAT maritime mobile geostationary satellite in which continuous alerting is available, an INMARSAT ship earth station meeting the equipment authorization rules of parts 2 and 80 of this chapter;

(iv) Be equipped with a reserve power supply meeting the requirements of §§ 80.917(b), 80.919, and 80.921, and capable of powering the single sideband radiotelephone or the ship earth station (including associated peripheral equipment) required by paragraph (a)(4)(iii) of this section;

(v) Be equipped with a NAVTEX receiver conforming to the following performance standards: IMO Resolution A.525(13) and CCIR Recommendation 540;

(vi) Be equipped with a Category I, 406 MHz satellite emergency position-indicating radiobeacon (EPIRB) meeting the requirements of § 80.1061;

(vii) Be equipped with a radiotelephone distress frequency watch receiver meeting the requirements of §80.269;

(viii) Be equipped with an automatic radiotelephone alarm signal generator meeting the requirements of §80.221; and

(ix) Participate in the AMVER system while engaged on any voyage where the vessel is navigated in the open sea for more than 24 hours. Copies of the AMVER Bulletin are available at: AMVER Maritime Relations (GNRS-3/AMR), U.S. Coast Guard, Building 110, Box 26, Governor's Island, N.Y. 10004-5034, telephone number (212) 668-7764.

(b) For a vessel that is navigated within the communication range of a VHF public coast station or U.S. Coast Guard station, but beyond the 20-nautical mile limitation specified in paragraph (a)(1) of this section, an exemption from the band 1605 to 2850 kHz installation requirements may be granted if the vessel is equipped with a VHF transmitter and receiver. An application for exemption must include a chart showing the route of the voyage or the area of operation of the vessel, and the receiving service area of the VHF public coast or U.S. Coast Guard station. The coverage area of the U.S. Coast Guard station must be based on written information from the District Commander, U.S. Coast Guard, a copy of which must be furnished with the application. The coverage area of a public coast station must be computed by the method specified in subpart P of this part.

(c) The radiotelephone installation must be installed to insure safe operation of the equipment and to facilitate repair. It must be protected against the vibration, moisture, temperature, and excessive currents and voltages.

(d) A VHF radiotelephone installation or a remote unit must be located at each steering station except those auxiliary steering stations which are used only during brief periods for docking or for close-in maneuvering. A single portable radiotelephone set meets the requirements of this paragraph if adequate permanent mounting arrangements with suitable power provi-

sion and antenna feed are installed at each operator steering station. Additionally, for vessels of more than 100 gross tons, the radiotelephone installation must be located at the level of the main wheelhouse or at least one deck above the vessel's main deck.

[51 FR 31213, Sept. 2, 1986, as amended at 56 FR 19301, Apr. 26, 1991; 57 FR 34262, Aug. 4, 1992]

§ 80.907 Principal operating position.

The principal operating position of the radiotelephone installation on vessels over 100 gross tons must be in the room from which the vessel is normally steered while at sea. If the station can be operated from any location other than the principal operating position, a positive means must be provided at the principal operating position to take full control of the station.

§ 80.909 Radiotelephone transmitter.

(a) The medium frequency transmitter must have a peak envelope output power of at least 60 watts for J3E emission on 2182 kHz and at least one ship-to-shore working frequency within the band 1605 to 2850 kHz enabling communication with a public coast station if the region in which the vessel is navigated is served by a public coast station operating in this band.

(b) The single sideband radiotelephone must be capable of operating on maritime frequencies in the band 1710 to 27500 kHz with a peak envelope output power of at least 120 watts for J3E emission and H3E emission on 2182 kHz and J3E emission on the distress and safety frequencies listed in §80.369(b). Single sideband radios installed on or before February 2, 1992, may be used until February 2, 1997, provided such radios are capable of operating on the frequencies listed in §§80.369 (a) and (b), and at least half of the frequencies listed in §80.369(d).

(c) The transmitter complies with the power output requirements specified in paragraphs (a) or (b) of this section when:

(1) The transmitter can be adjusted for efficient use with an actual ship station transmitting antenna meeting the requirements of §80.923 of this part; and