

TABLE 1 TO § 90.210—APPLICABLE EMISSION MASKS—Continued

Frequency band (MHz)	Mask for equipment with audio low pass filter	Mask for equipment without audio low pass filter
220–222	F	F
421–512 ^{2, 5}	B, D, or E	C, D, or E
450 paging only	B	G
806–809/851–854 ⁶	B	H
809–824/854–869 ^{3, 5}	B, D	D, G.
896–901/935–940	I	J
902–928	K	K
929–930	B	G
4940–4990 MHz	L or M	L or M
5850–5925 ⁴		
All other bands	B	C

¹ Equipment using single sideband J3E emission must meet the requirements of Emission Mask A. Equipment using other emissions must meet the requirements of Emission Mask B or C, as applicable.
² Equipment designed to operate with a 25 kHz channel bandwidth must meet the requirements of Emission Mask B or C, as applicable. Equipment designed to operate with a 12.5 kHz channel bandwidth must meet the requirements of Emission Mask D, and equipment designed to operate with a 6.25 kHz channel bandwidth must meet the requirements of Emission Mask E.
³ Equipment used in this licensed to EA or non-EA systems shall comply with the emission mask provisions of § 90.691 of this chapter.
⁴ DSRCS Roadside Units equipment in the 5850–5925 MHz band is governed under subpart M of this part.
⁵ Equipment designed to operate on 25 kilohertz bandwidth channels must meet the requirements of either Emission Mask B or G, whichever is applicable, while equipment designed to operate on 12.5 kilohertz bandwidth channels must meet the requirements of Emission Mask D. Equipment designed to operate on 25 kilohertz bandwidth channels may alternatively meet the Adjacent Channel Power limits of § 90.221.
⁶ Transmitters utilizing analog emissions that are equipped with an audio low-pass filter must meet Emission Mask B. All transmitters utilizing digital emissions and those transmitters using analog emissions without an audio low-pass filter must meet Emission Mask H.

[60 FR 37264, July 19, 1995]

EDITORIAL NOTES: 1. For FEDERAL REGISTER citations affecting § 90.210, see the List of CFR Sections Affected, which appears in the Finding Aids section of the printed volume and at www.govinfo.gov.

2. At 85 FR 43139, July 16, 2020, § 90.610 was amended in the table by adding an entry in numerical order for “896–901/935–940”, however due to an inaccurate amendatory instruction, this amendment could not be incorporated.

§ 90.212 Provisions relating to the use of scrambling devices and digital voice modulation.

(a) Analog scrambling techniques may be employed at any station authorized the use of A3E, F3E, or G3E emission, subject to the provision of paragraph (d) of this section.

(b) The use of digital scrambling techniques or digital voice modulation requires the specific authorization of F1E or G1E emission, and these emissions will only be authorized subject to the provisions of paragraph (d) of this section.

(c) The transmission of any non-voice information or data under the authorization of F1E or G1E emission is prohibited. However, stations authorized the use of F1E or G1E emission may also be authorized F1D, F2D, G1D or

G2D emission for non-voice communication purposes, pursuant to § 90.207(l).

(d) Station identification shall be transmitted in the unscrambled analog mode (clear voice) or Morse code in accordance with the provisions of § 90.425. All digital encoding and digital modulation shall be disabled during station identification.

[43 FR 54791, Nov. 22, 1978, as amended at 47 FR 15340, Apr. 9, 1982; 49 FR 48711, Dec. 14, 1984; 72 FR 35195, June 27, 2007]

§ 90.213 Frequency stability.

(a) Unless noted elsewhere, transmitters used in the services governed by this part must have a minimum frequency stability as specified in the following table.

TABLE 1 TO § 90.213(a)—MINIMUM FREQUENCY STABILITY
 [Parts per million (ppm)]

Frequency range (MHz)	Fixed and base stations	Mobile stations	
		Over 2 watts output power	2 watts or less output power
Below 25	1 ^{2, 3} 100	100	200
25–50	20	20	50
72–76	5	50
150–174	5 ^{11, 5}	6 ⁵	4 ⁶ 50
216–220	1.0	1.0