

automatic character delineation when the individual control of character foreground, background and edge is not supported.

(s) *Service synchronization.* Service Input Buffers must be at least 128 bytes in size. Caption providers must keep this lower limit in mind when following Delay commands with other commands and window text. In other words, no more than 128 bytes of DTVCC commands and text should be transmitted (encoded) before a pending Delay command's delay interval expires.

(t) *Settings.* Decoders must include an option that permits a viewer to choose a setting that will display captions as intended by the caption provider (a default). Decoders must also include an option that allows a viewer's chosen settings to remain until the viewer chooses to alter these settings, including periods when the television is turned off.

[65 FR 58471, Sept. 29, 2000, as amended at 69 FR 2849, Jan. 21, 2004]

§ 15.123 Labeling of digital cable ready products.

(a) The requirements of this section shall apply to unidirectional digital cable products. Unidirectional digital cable products are one-way devices that accept a Point of Deployment module (POD) and which include, but are not limited to televisions, set-top-boxes and recording devices connected to digital cable systems. Unidirectional digital cable products do not include interactive two-way digital television products.

(b) A unidirectional digital cable product may not be labeled with or marketed using the term "digital cable ready," or other terminology that describes the device as "cable ready" or "cable compatible," or otherwise indicates that the device accepts a POD or conveys the impression that the device is compatible with digital cable service unless it implements at a minimum the following features:

(1) Tunes NTSC analog channels transmitted in-the-clear.

(2) Tunes digital channels that are transmitted in compliance with SCTE 40 2003 (formerly DVS 313): "Digital Cable Network Interface Standard" (in-

corporated by reference, *see* §15.38), provided, however, that with respect to Table B.11 of that standard, the phase noise requirement shall be -86 dB/Hz including both in-the-clear channels and channels that are subject to conditional access.

(3) Allows navigation of channels based on channel information (virtual channel map and source names) provided through the cable system in compliance with ANSI/SCTE 65 2002 (formerly DVS 234): "Service Information Delivered Out-of-Band for Digital Cable Television" (incorporated by reference, *see* §15.38), and/or PSIP-enabled navigation (ANSI/SCTE 54 2003 (formerly DVS 241): "Digital Video Service Multiplex and Transport System Standard for Cable Television" (incorporated by reference, *see* §15.38)).

(4) Includes the POD-Host Interface specified in SCTE 28 2003 (formerly DVS 295): "Host-POD Interface Standard" (incorporated by reference, *see* §15.38), and SCTE 41 2003 (formerly DVS 301): "POD Copy Protection System" (incorporated by reference, *see* §15.38), or implementation of a more advanced POD-Host Interface based on successor standards. Support for Internet protocol flows is not required.

(5) Responds to emergency alerts that are transmitted in compliance with ANSI/SCTE 54 2003 (formerly DVS 241): "Digital Video Service Multiplex and Transport System Standard for Cable Television" (incorporated by reference, *see* §15.38).

(6) In addition to the requirements of paragraphs (b)(1) through (5) of this section, a unidirectional digital cable television may not be labeled or marketed as digital cable ready or with other terminology as described in paragraph (b) of this section, unless it includes a DTV broadcast tuner as set forth in §15.117(i) and employs at least one specified interface in accordance with the following schedule:

(i) For 480p grade unidirectional digital cable televisions, either a DVI/HDCP, HDMI/HDCP, or 480p Y,Pb,Pr interface:

(A) Models with screen sizes 36 inches and above: 50% of a manufacturer's or importer's models manufactured or imported after July 1, 2004; 100% of such

models manufactured or imported after July 1, 2005.

(B) Models with screen sizes 32 to 35 inches: 50% of a manufacturer's or importer's models manufactured or imported after July 1, 2005; 100% of such models manufactured or imported after July 1, 2006.

(ii) For 720p/1080i grade unidirectional digital cable televisions, either a DVI/HDCP or HDMI/HDCP interface:

(A) Models with screen sizes 36 inches and above: 50% of a manufacturer's or importer's models manufactured or imported after July 1, 2004; 100% of such models manufactured or imported after July 1, 2005.

(B) Models with screen sizes 25 to 35 inches: 50% of a manufacturer's or importer's models manufactured or imported after July 1, 2005; 100% of such models manufactured or imported after July 1, 2006.

(C) Models with screen sizes 13 to 24 inches: 100% of a manufacturer's or importer's models manufactured or imported after July 1, 2007.

(c) Before a manufacturer's or importer's first unidirectional digital cable product may be labeled or marketed as digital cable ready or with other terminology as described in paragraph (b) of this section, the manufacturer or importer shall verify the device as follows:

(1) The manufacturer or importer shall have a sample of its first model of a unidirectional digital cable product tested to show compliance with the procedures set forth in Uni-Dir-PICS-I01-030903: "Uni-Directional Receiving Device: Conformance Checklist: PICS Proforma" (incorporated by reference, *see* § 15.38) at a qualified test facility. The manufacturer or importer shall have any modifications to the product to correct failures of the procedures in Uni-Dir-PICS-I01-030903: "Uni-Directional Receiving Device: Conformance Checklist: PICS Proforma" (incorporated by reference, *see* § 15.38) retested at a qualified test facility.

(2) A qualified test facility is a facility representing cable television system operators serving a majority of the cable television subscribers in the United States or an independent laboratory with personnel knowledgeable

with respect to the standards referenced in paragraph (b) of this section concerning the procedures set forth in Uni-Dir-PICS-I01-030903: "Uni-Directional Receiving Device: Conformance Checklist: PICS Proforma" (incorporated by reference, *see* § 15.38).

(3) Subsequent to the testing of its initial unidirectional digital cable product model, a manufacturer or importer is not required to have other models of unidirectional digital cable products tested at a qualified test facility for compliance with the procedures of Uni-Dir-PICS-I01-030903: "Uni-Directional Receiving Device: Conformance Checklist: PICS Proforma" (incorporated by reference, *see* § 15.38). However, the manufacturer or importer shall ensure that all subsequent models of unidirectional digital cable products comply with the procedures in the Uni-Dir-PICS-I01-030903: "Uni-Directional Receiving Device: Conformance Checklist: PICS Proforma" (incorporated by reference, *see* § 15.38) and all other applicable rules and standards. The manufacturer or importer shall maintain records indicating such compliance in accordance with the verification procedure requirements in part 2, subpart J of this chapter. The manufacturer or importer shall further submit documentation verifying compliance with the procedures in the Uni-Dir-PICS-I01-030903: "Uni-Directional Receiving Device: Conformance Checklist: PICS Proforma" (incorporated by reference, *see* § 15.38) to a facility representing cable television system operators serving a majority of the cable television subscribers in the United States.

(d) Manufacturers and importers shall provide in appropriate post-sale material that describes the features and functionality of the product, such as the owner's guide, the following language: "This digital television is capable of receiving analog basic, digital basic and digital premium cable television programming by direct connection to a cable system providing such programming. A security card provided by your cable operator is required to view encrypted digital programming.

Certain advanced and interactive digital cable services such as video-on-demand, a cable operator's enhanced program guide and data-enhanced television services may require the use of a set-top box. For more information call your local cable operator."

[68 FR 66733, Nov. 28, 2003]

Subpart C—Intentional Radiators

§ 15.201 Equipment authorization requirement.

(a) Intentional radiators operated as carrier current systems, devices operated under the provisions of §§ 15.211, 15.213, and 15.221, and devices operating below 490 kHz in which all emissions are at least 40 dB below the limits in § 15.209 shall be verified pursuant to the procedures in Subpart J of part 2 of this chapter prior to marketing.

(b) Except as otherwise exempted in paragraph (c) of this section and in § 15.23 of this part, all intentional radiators operating under the provisions of this part shall be certificated by the Commission pursuant to the procedures in subpart J of part 2 of this chapter prior to marketing.

(c) For devices such as perimeter protection systems which, in accordance with § 15.31(d), are required to be measured at the installation site, each application for certification must be accompanied by a statement indicating that the system has been tested at three installations and found to comply at each installation. Until such time as certification is granted, a given installation of a system that was measured for the submission for certification will be considered to be in compliance with the provisions of this chapter, including the marketing regulations in subpart I of part 2 of this chapter, if tests at that installation show the system to be in compliance with the relevant technical requirements. Similarly, where measurements must be performed on site for equipment subject to verification, a given installation that has been verified to demonstrate compliance with the applicable standards will be considered to be in compliance with the provisions of this chapter, including the marketing regulations in subpart I of part 2 of this chapter.

(d) For perimeter protection systems operating in the frequency bands allocated to television broadcast stations operating under part 73 of this chapter, the holder of the grant of certification must test each installation prior to initiation of normal operation to verify compliance with the technical standards and must maintain a list of all installations and records of measurements. For perimeter protection systems operating outside of the frequency bands allocated to television broadcast stations, upon receipt of a grant of certification, further testing of the same or similar type of system or installation is not required.

[54 FR 17714, Apr. 25, 1989, as amended at 68 FR 68546, Dec. 9, 2003]

§ 15.203 Antenna requirement.

An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the provisions of this section. The manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited. This requirement does not apply to carrier current devices or to devices operated under the provisions of § 15.211, § 15.213, § 15.217, § 15.219, or § 15.221. Further, this requirement does not apply to intentional radiators that must be professionally installed, such as perimeter protection systems and some field disturbance sensors, or to other intentional radiators which, in accordance with § 15.31(d), must be measured at the installation site. However, the installer shall be responsible for ensuring that the proper antenna is employed so that the limits in this part are not exceeded.

[54 FR 17714, Apr. 25, 1989, as amended at 55 FR 28762, July 13, 1990]

§ 15.204 External radio frequency power amplifiers and antenna modifications.

(a) Except as otherwise described in paragraph (b) of this section, no person