

**Before the  
Federal Communications Commission  
Washington, D.C. 20554**

In the Matter of )  
 )  
Technical Requirements to Enable Blocking of )  
Video Programming based on Program Ratings ) ET Docket No. 97-206  
 )  
Implementation of Sections 551(c), (d), and (e) )  
of the Telecommunications Act of 1996 )  
 )

**REPORT AND ORDER**

**Adopted: March 12, 1998**

**Released: March 13, 1998**

By the Commission: Commissioner Tristani issuing a statement.

**I. INTRODUCTION**

1. By this action, we are amending Part 15 of our rules to require that television signal receivers with picture screens 33 cm (13 inches) or greater ("covered television receivers") be equipped with technological features to allow parents to block the display of violent, sexual, or other programming they believe is harmful to their children.<sup>1</sup> These features are commonly referred to as "v-chip" technology. We are requiring that covered television receivers respond to ratings based on a system of voluntary parental guidelines ("*TV Parental Guidelines*") developed jointly by the National Association of Broadcasters, the National Cable Television Association, and the Motion Picture Association of America (the "Industry").<sup>2</sup> We take this action in response to the Parental Choice in Television Programming requirements contained in Sections 551(c), (d), and (e) of the Telecommunications Act of 1996 (the "1996 Act"),<sup>3</sup> which amended Sections 303 and 330 of the Communications Act of 1934.<sup>4</sup>

---

<sup>1</sup> These regulations are applicable to all television signal receiving devices as defined in Section 15.3(w) of the Commission's rules. See 47 C.F.R. § 15.3(w). The mere fact that a computer system can display video programming transmitted over the Internet (or stored on CD-ROMs) does not subject it to these regulations.

<sup>2</sup> However manufacturers are not prevented from making television receivers that respond to additional rating systems on an optional basis.

<sup>3</sup> Pub. L. No. 104-104, 110 Stat. 56, (1996). Section 551 of the 1996 Act amends Sections 303 and 330 of the Communications Act of 1934. See 47 U.S.C. §§ 303 and 330.

<sup>4</sup> See 47 U.S.C. §§ 303 and 330.

## II. BACKGROUND

2. In the 1996 Act, Congress determined that parents should be provided "with timely information about the nature of upcoming video programming and with the technological tools that allow them easily to block violent, sexual, or other programming that they believe harmful to their children . . . ." <sup>5</sup> Section 551(c) directs the Commission to adopt rules requiring that any "apparatus designed to receive television signals that are shipped in interstate commerce or manufactured in the United States and that have a picture screen 13 inches or greater in size (measured diagonally) . . . be equipped with a feature designed to enable viewers to block display of all programs with a common rating . . . ." <sup>6</sup> Section 551(d) states that the Commission must "require that all such apparatus be able to receive the rating signals which have been transmitted by way of line 21 of the vertical blanking interval . . . ." <sup>7</sup> That provision also instructs the Commission to oversee "the adoption of standards by industry for blocking technology," and to ensure that blocking capability continues to be available to consumers as technology advances. <sup>8</sup>

3. On September 26, 1997, the Commission released a *Notice of Proposed Rule Making* ("*Notice*") in this proceeding which began the process of fulfilling the requirements of Section 551. <sup>9</sup> In the *Notice* we proposed to rely on industry standard EIA-608 to provide the methodology for television receivers to decode rating information transmitted on line 21 of the vertical blanking interval ("VBI"). We further proposed that television manufacturers be required to provide blocking technology on at least half of their product models with a picture screen 33 cm (13 inches) or greater in size by July 1, 1998, with the remainder to have blocking technology by July 1, 1999. We also proposed to require that cable television systems, television broadcast stations, MDS, DBS, and other service operators that may deliver video programming to the home must not delete or modify program rating information carried on line 21 of the VBI. A total of 26 parties filed comments, and 13 parties filed replies to comments in response to this *Notice*. A list of commenters is attached as Appendix B.

## III. DISCUSSION

4. Blocking Technology Standard. The 1996 Act requires that we adopt rules to require television receivers to block programming that contains sexual, violent, or other material parents find objectionable by decoding rating information transmitted via line 21 of the television vertical

---

<sup>5</sup> Pub. L. No. 104-104, *supra*, at § 551(a)(9).

<sup>6</sup> *Id.* at 551(c), codified at 47 U.S.C. § 303(x).

<sup>7</sup> *Id.* at 551(d), codified at 47 U.S.C. § 330(c).

<sup>8</sup> *Id.*

<sup>9</sup> See *Notice of Proposed Rulemaking* in ET Docket 97-206, 12 FCC Rcd 15573 (1997).

blanking interval. Line 21 of the VBI is currently used primarily for transmission of closed captions that allow persons with hearing disabilities and other viewers to read a visual depiction of the information simultaneously being presented on the aural channel.<sup>10</sup> On a secondary, space-available basis, line 21 field 2 may also be used to transmit other data information.<sup>11</sup>

5. We currently rely upon an industry standard adopted by the Electronics Industry Association (EIA), EIA-608, "Recommended Practice for Line 21 Data Service," which contains information on data formats and specific data packets that may be sent using line 21 to specify how line 21 information should be transmitted and used for closed captioning and other services.<sup>12</sup> EIA-608 has provided television programmers, closed-captioning service providers and television receiver manufacturers with a standard method for transmitting and using data information transmitted on line 21. It ensures compatibility between the various uses of this information and minimizes the need for government regulation in this area. In the *Notice* we recognized the broad acceptance of EIA-608 for transmission of data on line 21. Accordingly, we proposed to amend our rules to require that covered television receivers receive program rating information transmitted pursuant to EIA-608 and block video programming based on a rating level specified by the user. To accomplish this, we proposed to incorporate the appropriate provisions of EIA-608 into our regulations.

6. In making this proposal, we noted that EIA was, at that time, still working on a standard to supplement EIA-608 to provide specific information regarding the transmission of program ratings. We invited comment on whether other technical standards for blocking technology were being developed or have been developed, and whether they should be used instead of or in addition to EIA-608. In October 1997, after the release of our Notice, EIA adopted a new standard, EIA-744, "Transport of Content Advisory Information Using Extended Data Service (XDS)," which provides specific guidance on how rating information should be transmitted on line 21. EIA plans to incorporate EIA-744 into the next edition of EIA-608, which is expected to be numbered EIA-608-B. However, this is not expected to occur until after the Commission has acted on the rating system and TV receiver requirements.

7. Commenters were uniform in their support of our proposal to adopt EIA-608 and EIA-

---

<sup>10</sup> See 47 C.F.R. § 73.682(a)(22).

<sup>11</sup> See Amendment of the rules relating to permissible uses of the vertical blanking interval of broadcast television signals, Report and Order, MM Docket No. 92-305, 8 FCC Rcd 3613 (1993).

<sup>12</sup> See note in 47 C.F.R. § 73.682(a)(22)(i)(B). Part 15 of our Rules contains specific requirements on how television receivers must respond to closed captioning information transmitted on line 21 of the VBI. 47 C.F.R. § 15.119. EIA-608 supplements these requirements by providing information on how line 21 can be used to transmit optional caption features, text-mode data, and extended data services that can provide information about current and future programming.

744 as the transmission standards for program rating information.<sup>13</sup> No commenters suggested other transmission standards that the Commission should consider. We continue to believe that EIA-608 provides an appropriate means of transmitting program rating information on line 21. Therefore, we are amending our rules to require that all television receivers with picture screens 33 cm (13 inches) or larger, measured diagonally, shipped in interstate commerce or manufactured in the United States, receive program ratings transmitted pursuant to industry standards EIA-608 and EIA-744 and block both the video and the associated audio on the main and second audio program (SAP) channels, based on a rating level specified by the user of the television receiver. By adopting EIA-608 and EIA-744 we are fulfilling our mandate under Section 551(d) to oversee the adoption of standards by industry for blocking technology. We are incorporating EIA-608 and EIA-744 into our rules by reference. We are also hereby authorizing the Chief of the Office of Engineering and Technology to replace the reference to EIA-608 and EIA-744 with the reference to EIA-608-B once it becomes available as long as no other changes are made to the standards that would necessitate a further rule making before adoption.

8. Multiple Rating Systems. In the *Notice*, we observed that several parties filed comments in CS Docket No. 97-55 suggesting that the Commission adopt open standards and regulatory policies that would allow for the development and use of multiple rating systems. We noted that some of these parties have also indicated that they are developing their own rating systems that they would like to make available for general use. We indicated that we prefer an open, flexible approach to the development of industry standards and regulations that would accommodate the possible development of multiple rating systems. We suggested that such an approach could give parents the flexibility to choose a rating system that best meets their needs. Accordingly, we invited comments on the feasibility of accommodating additional rating systems.

9. Several parties request that we require TV receivers to accommodate additional rating systems.<sup>14</sup> These parties contend that such action is necessary to ensure backward compatibility should video distributors later choose to use supplemental rating systems in addition to, or instead of, the industry rating system approved by the Commission. For example, OKTV states that it would like to offer parents an independent rating service based on medical and social research concerning the risks of harm to children in each stage of development.<sup>15</sup> The majority of the commenters, however, oppose mandatory compatibility with multiple rating systems. They recommend instead that the marketplace determine whether there is a need or demand for TV receivers to accommodate supplemental rating systems.<sup>16</sup> Opponents of the supplemental rating

---

<sup>13</sup> See, for example, comments filed by CEMA, MECA, NAB, Philips, Sanyo, Thomson, Toshiba and Zenith.

<sup>14</sup> See, for example, comments filed in ET Docket No. 97-206 by AACAP, Livingstone, Institute, and OKTV.

<sup>15</sup> See OKTV comments.

<sup>16</sup> See, for example, comments filed in ET Docket No. 97-206 by CME, CEMA, ITI, EEG, MECCA, the Industry, Philips, Soundview, Thomson, and WCA.

systems also argue that a mandatory requirement to provide for additional rating systems would pose serious technical and functional problems. For example, Thomson states that multiple rating systems would make parental operation of program blocking technology unacceptably confusing and that it would also slow the delivery and decoding of ratings data to receivers.<sup>17</sup> MECA contends that such a requirement would impose an extraordinary burden on manufacturers, add significant costs and complexity to television receivers, and potentially frustrate consumers in understanding or using the new content rating system.<sup>18</sup>

10. In our companion proceeding, CS Docket 97-55, we have found that the *TV Parental Guidelines* rating system proposed by the Industry establishes acceptable voluntary rating guidelines.<sup>19</sup> We have declined to address the acceptability of any additional rating systems because we believe that the legislative history of Section 551 makes clear Congress intended that we evaluate one system of rules established through industry consensus on a voluntary system.<sup>20</sup> With respect to blocking technology, we are persuaded by TV manufacturers that a mandatory requirement to provide for possible future additional rating systems would complicate receiver design, increase costs, and make it confusing for parents to program TV receivers to block undesired programs.

11. We observe that the *TV Parental Guidelines* will apply to all television programming except for news, sports, and unedited Motion Picture Association of America (MPAA) rated movies on premium cable channels. Unedited movies that are typically shown on premium cable channels will carry their original MPAA ratings. We also note that EIA-608 provides for program blocking based on the *TV Parental Guidelines* as well as the MPAA ratings. Accordingly, we are requiring that TV receivers include program blocking technology that responds to the *TV Parental Guidelines* rating system and the MPAA rating system. We appreciate OKTV's endeavor to provide an alternative rating service that may be desirable for some consumers. However, we believe it is beyond the scope of our mandate under Section 551 to require that TV manufacturers accommodate alternative systems. Although we are not mandating that TV receiver manufacturers provide for alternative rating systems, we encourage manufacturers to design TV receivers to provide for additional rating systems to the extent practical. We believe that manufacturers will be driven by the marketplace to meet any consumer demands to accommodate additional rating systems. We also note that supplemental rating services can be accommodated by use of set-top boxes and other non-Line 21 services.

---

<sup>17</sup> See Thomson reply comments.

<sup>18</sup> See MECCA comments at 9.

<sup>19</sup> The *TV Parental Guidelines* consist of the age-based categories TV-Y (all children), TV-Y7 (children 7 and older), TV-G (all ages), TV-PG (parental guidance suggested), TV-14 (children 14 and over), and TV-MA (mature audiences only). Additionally, content indicators FV (fantasy violence), V (violence), S (sexual situations), L (language), and D (dialogue), are used in conjunction with the age-based ratings, as needed.

<sup>20</sup> See *Report and Order* in CS Docket 97-55 at para. 25.

12. In the *Notice*, we recognized that it may not be practical or desirable for all rating information to be transmitted only via line 21 of the VBI.<sup>21</sup> We noted that some television receivers and video cassette recorders (VCRs) incorporate the ability to block video programming on a date/time/channel basis. That is, the user can program the television receiver not to receive a specific program that occurs at a specific time, or on a specific date or channel. Such date/time/channel blocking (D/T/C) capability could facilitate the use of alternative rating systems that are not distributed by line 21. Section 330(c)(4) of the Communications Act, as added by Section 551(d) of the 1996 Act, directs the Commission to consider the existence of appropriate alternative blocking technologies and to permit use of a technology that: 1) "enables parents to block programming based on identifying programs without ratings"; 2) "is available to consumers at a cost which is comparable" to the cost of ratings-based technology; and 3) "will allow parents to block a broad range of programs on a multichannel system as effectively and as easily" as ratings-based technology. We sought comment on whether D/T/C blocking capability would meet the requirements of Section 330(c)(4) and should be allowed as an alternative to blocking technology based on line 21. Additionally, we sought comment on: 1) whether ratings are likely to be distributed via means other than line 21; 2) whether we have the legal authority, and whether there is a compelling public interest, to require both line 21 and D/T/C blocking; and 3) whether there are alternative program blocking technologies that should be accommodated under our rules. In order to evaluate possible alternative blocking technologies, we requested information regarding the cost of any alternative blocking technology.

13. Both Philips and Thomson argue that the Commission should allow, but not require, alternative blocking technologies such as D/T/C.<sup>22</sup> They contend that Section 330(c)(4) was intended to provide manufacturers with a choice of blocking systems but it does not authorize the Commission to require that more than one such system be built into television receivers. CME and IPPV state that D/T/C blocking is not an acceptable alternative to blocking technology based on line 21. However, CME asserts that the Commission should encourage D/T/C blocking use as an additional tool. Toshiba contends that the Commission should not require both types of blocking, but that D/T/C should be allowed as an alternative to line 21-based blocking.

14. We note that D/T/C blocking is inherently more time consuming than line 21-based program blocking because it forces parents to review program listings in advance and then set up the TV receiver to block individual undesired programs. This can be problematic, particularly where an undesired program is unexpectedly shifted to a different date, time or channel. In contrast, line 21-based blocking will be easier to use because it can be set up once to block all programs of a particular rating, irrespective of when the program is shown. Accordingly, we determine that D/T/C blocking does not meet the requirements of Section 551(d) because it does not "allow parents to block a broad range of programs on a multichannel system as effectively and

---

<sup>21</sup> For example, some rating services might prefer to deliver their ratings information on paper or via an electronic media, such as the Internet or diskettes.

<sup>22</sup> See Philips at 8, Thomson at 20.

as easily" as ratings-based technology.

15. Furthermore, we are aware that D/T/C blocking was offered as an option in some television receivers prior to the enactment of the 1996 Act. Had Congress considered its use to be as effective and easy as line 21-based technology, it could have been mandated along with, or instead of v-chip technology. For all these reasons, we conclude that date/time/channel blocking can not be considered an appropriate alternative to line 21 blocking technology. However, this capability may, in some instances, be a desirable feature and we encourage manufacturers to continue including this technology in their devices.

16. User Interface. In the *Notice*, we tentatively concluded that the program blocking technology should be as "user friendly" as possible. We observed that parents should be able to program their television receivers easily to block categories of programs they do not want their children to see. We proposed that, if a rating system contains more than one rating category, such as age-based ratings and content-based ratings, users should be able to block programming using either or both categories. We also stated that program blocking technology should provide sufficient security to ensure that children can not easily override their parents' blocking considerations. We requested comment on whether we should request that EIA include guidance in EIA-608 on how to achieve these objectives. We also asked whether such guidance should be included in our rules. Finally, we invited comments on other requirements that may be necessary for us to implement.

17. Several commenters suggest that the Commission's rules should provide specific guidance on how program blocking technology must function in television sets. The Industry states that if the *TV Parental Guidelines* are to be effective in providing parents with a useful means of controlling their children's television viewing, not only must there be a generally understandable rating system, but television sets must also react to ratings in a consistent manner. The Industry notes that along with EIA-744, EIA has also released document CEB1, "Recommended Practice for the Content Advisory Extended Data Service (XDS) Packet," which provides basic guidance on how television receivers should respond when set up to block programs based on ratings.<sup>23</sup> According to the Industry, if parents choose to block certain age or content program categories, all television models should block the same set of programs. Additionally, the Industry states that the v-chip should provide options for blocking programming in the two children's categories separately from programming in the general audience categories. In this way, parents will have the option of blocking specific children's programming without automatically blocking other categories. OKTV suggests the Commission set requirements to ensure the ability to block programs based on different content levels within each age-based classification. Furthermore, CME contends that program blocking should function in a hierarchial manner. In particular, CME recommends that all programs that have a higher rating than the one selected should also be blocked. CME states that, "[I]f a viewer programs the V-Chip to block

---

<sup>23</sup> See EIA Engineering Bulletin CEB1, "Recommended Practice for the Content Advisory Extended Data Service (XDS) Packet," October 1997.

shows rated TV-PG-V, the V-Chip should block automatically shows with the more restrictive rating of TV-14-V and TV-MA-V."<sup>24</sup> OKTV and the Industry contend that program rating information should be displayable on-screen at any time a viewer chooses.<sup>25</sup> The Industry states that the Commission's rules should ensure that unrated programs are not blocked, while CME asserts that parents should have the option to block all unrated programs.<sup>26</sup>

18. We believe that certain basic functions are essential to fulfill the objectives of the 1996 Act and to ensure the successful implementation of program blocking technology. Accordingly, we will amend our television receiver rules as follows. We are requiring that program blocking occur as soon as a program rating packet is received. We also believe it is necessary to specify that when a program is blocked the program audio must be muted, the video must go black or be otherwise indecipherable, and program captions must be eliminated. The default state of a receiver (i.e., as provided to the consumer) should not block unrated programs, so that parental blocking technology does not disrupt the normal operation of television receivers. However, we will not prohibit features that allow the user to reprogram the receiver to block programs that are not rated. In addition, we are requiring that receivers not display, via picture-in-picture capability, programs that would otherwise be blocked.

19. We are also requiring that receivers have the capability to block programming based on the age based ratings, the content based ratings, or a combination of the two. This requirement is necessary to ensure that parents have the freedom to take full advantage of the TV Parental Guidelines rating system to block programs having particular types of ratings. We generally agree with the Industry's assertion that television receivers should respond to program ratings in a similar manner. As suggested by CME, we are requiring that, once a rating has been selected, consumers must have the ability to automatically block programs with more restrictive ratings. For example, if all shows with an age-based rating of TV-PG have been selected for blocking, the consumer should be able to automatically block programs with the more restrictive ratings of TV-14 and TV-MA. Similarly, where shows rated TV-PG-V have been selected for blocking, the v-chip should have the capability to block automatically shows with the more restrictive ratings of TV-14-V and TV-MA-V. The consumer should also have the capability of overriding the automatic blocking selections. We believe these requirements are necessary to ensure that the v-chip can be programmed in a consistent, easy-to-use, and intuitive manner. We caution that consumers may not realize that, by selecting only content indicators (V,S,L, or D), certain programs may not be blocked, i.e., those delivered by program sources that do not rate programs using V, S, L, or D. Therefore, we urge, but do not require, receiver manufacturers to provide an on-screen advisory when V,S,L, or D has been selected (without an age-based category) that some program sources may not be blocked.

---

<sup>24</sup> CME at 3.

<sup>25</sup> OKTV at 2, the Industry at 7.

<sup>26</sup> The Industry at 5, CME at 4.

20. We do not find it necessary to regulate other aspects of TV receiver design with regard to program ratings, such as security features, or the ability to display ratings upon demand. Manufacturers have every incentive to design their receivers to best meet consumers needs and offer unique combinations of display and functionality that will differentiate their products from competitors. Many retail stores allow consumers to evaluate such features themselves by trying out the receiver before making a purchase. While we are not mandating additional receiver requirements, we strongly encourage television manufacturers to review CEB1 and incorporate other recommended functionality in covered television receivers to the fullest extent possible.

21. Timing. In the *Notice* we proposed to require television manufacturers to include blocking technology on at least half of their product models with a picture screen 33 cm (13 inches) or greater in size by July 1, 1998. The remainder of the models would be required to contain blocking technology by July 1, 1999. While all commenters agree that program blocking technology should be made available to the public as soon as possible, television manufacturers contend that the deadlines proposed by the Commission are impossible to meet.

22. CEMA states that the design cycle for a television receiver model takes approximately 18-24 months. According to CEMA, "The cycle generally begins in January, and leads to product introduction the summer of the following year in time for the holiday buying season."<sup>27</sup> Other commenters state that this production cycle can not be compressed without creating the possibility of releasing an inferior product to the market.<sup>28</sup> Additionally, CEMA, Philips, and Thomson also state that the Commission must release final rules in both this proceeding and CS Docket 97-55 before the production cycle may begin for v-chip equipped televisions. They request that the Commission delay the implementation deadline for at least one year subsequent to the release of rules in these proceedings.

23. After reviewing all of the comments filed in this proceeding, we conclude that it is appropriate to delay our implementation deadlines. Manufacturers were consistent in describing typical design and production schedules for TV receivers.<sup>29</sup> We believe that our rules should conform with these schedules and provide a smooth transition for product introduction. We realize that, given these schedules, manufacturers are well into the production phase of sets that will be released in July 1998. Therefore, we will not require that these sets contain blocking technology. Furthermore, it would be detrimental to consumer confidence if forced compression of manufacturer design schedules resulted in the release of an unsatisfactory product. With the issuance of final rules in these proceedings, we remove uncertainty with respect to the transmission standard and rating system to be used with this technology. This provides manufacturers with assurance that any equipment made will not become obsolete once rules are

---

<sup>27</sup> CEMA at 5.

<sup>28</sup> See Philips at 3, Thomson at 7.

<sup>29</sup> See, for example, comments filed by MECA, Philips, Thomson, Toshiba, and Zenith.

adopted. Accordingly, we are revising the implementation schedule proposed in the *Notice* to require that television manufacturers include blocking technology on at least half of their new product models with a picture screen 33 cm (13 inches) or greater in size by July 1, 1999. The remainder of the models would be required to contain blocking technology by January 1, 2000. Although the latter date does not conform with manufacturers' stated design cycle, we believe that this revised schedule is desirable to ensure that all new televisions are equipped with v-chip technology as soon as possible. This deadline should be achievable because the blocking standard has now been finalized and manufacturers will have nearly two years to plan for implementation of blocking technology in all production. We also note that this deadline should cause little disruption because it applies to the date the receivers are produced, which would normally occur well before the time when new models are made available in the summer of each year.

24. We do not believe that the new implementation deadlines will cause significant delays in the availability of v-chip technology. We note that set-top program blocking converter boxes may be available soon after release of this item. Since these boxes serve only one purpose, to decode and respond to program rating information, they can be produced in a relatively short period of time. Indeed, Soundview states that it plans to have converter boxes for sale "within a few months" after our rules are released.<sup>30</sup>

25. Digital Television and other Future Systems. In the *Notice* we stated that digital television is likely to provide additional capability for implementing program blocking systems because it has been designed to support the transmission of a large amount of data compared to today's television. However, we recognized that the DTV transmission standard does not provide for transmitting program ratings information. We noted that the Advanced Television Systems Committee (ATSC) had adopted a standard for transmitting a DTV program guide that also includes provisions for transmitting program ratings.<sup>31</sup> According to this standard, program guide information would be transmitted on a sporadic basis. ATSC had also begun development of standards that would accommodate the transmission of rating and other program information more regularly.<sup>32</sup>

26. We acknowledged that it was difficult to determine when standards related to DTV program blocking would be completed. Therefore, it would be difficult to forecast when DTV receiver manufacturers would be able to provide program blocking capabilities within a DTV receiver. Regardless, we concluded that DTV receivers should include blocking technology within a short period after final rules are released in this proceeding. Accordingly, we proposed that all DTV receivers with picture screens 33 cm (13 inches) or larger be required to include program blocking capabilities within a relatively short period of time, e.g., within 180 days, after

---

<sup>30</sup> Soundview at 1.

<sup>31</sup> See "Program Guide For Digital Television", ATSC Standard, Doc. A/55, 3 January 1996.

<sup>32</sup> ATSC T3/S8 Doc. 193, "Program and System Information Protocol for Terrestrial Broadcast and Cable."

rules are adopted in this proceeding.<sup>33</sup>

27. Several commenters expressed concerns that, given that a final version of the transmission standard for program information has not yet been issued, it would be premature to impose any blocking requirement deadlines at this time. CEMA, the Industry, and Philips all contend that the Commission should defer action on implementation of blocking technology in digital televisions until a transmission standard for ratings information is endorsed. Commenters also argue that the proposed schedule is unreasonably short for digital televisions. According to MECA, "[R]eceiver manufacturers have already finalized their first generation digital receiver specifications. Because both the transmission standard and the rating system are not yet final, these first receivers cannot include the proposed blocking technology."<sup>34</sup> MECA proposes that the Commission change its rules to specify an effective date 18 months after final approval of the digital transmission standard for program blocking.

28. We understand that ATSC has now finalized Doc. 193 which includes provisions for transmitting program related information such as program rating. The document was approved as an ATSC Standard and assigned the number A/65. We recognize that the ATSC standard includes elements aside from program ratings that may be considered further by various DTV interests. Also, we understand that the ATSC standard may be submitted to the Commission for incorporation by reference in the rules. Nevertheless, we expect that manufacturers will soon begin to design their televisions to accommodate the reception of program ratings pursuant to the existing ATSC Standard A/65 or subsequent revisions thereof. Accordingly, we now believe that the time is appropriate to specify implementation deadlines for the inclusion of program blocking technology in digital televisions.

29. In light of the above, we will revise the proposed implementation schedule for program blocking technology in digital televisions to mirror that of analog televisions. We will require that digital television manufacturers include blocking technology on at least half of their new product models with a picture screen 33 cm (13 inches) or greater in size by July 1, 1999. The remainder of the models will be required to contain blocking technology by January 1, 2000. We note that DTV receivers will not receive analog information carried on line 21 of the VBI. However, we will require digital televisions to react in a similar manner as analog televisions when programmed to block specific rating categories.

30. Distribution of Ratings Information. In the *Notice* we proposed to amend Parts 73 and 76 of our rules to require that both cable television systems and television broadcast stations must not delete or modify program ratings information carried on line 21 of the VBI. We also noted that video programming can originate and be transmitted through other sources including MDS systems, Multichannel MDS (MMDS) systems, satellite master antenna television

---

<sup>33</sup> See *Notice* at 19.

<sup>34</sup> MECA at 14.

(SMATV) systems, and DBS systems. Like DTV, some of these distribution methods use digital techniques to deliver the video programming and will therefore not carry the analog line 21 signal intact. In order to preserve the information carried on line 21, these systems must decode the digital information to retrieve the original line 21 information before delivering the signal to the television receiver. For blocking technology to function properly, the program ratings information must be properly encoded into the video programming and the distribution system must not adversely affect the ratings information. We therefore tentatively concluded that distribution services should be barred from deleting rating information for programs that have been rated.

31. In our companion TV ratings item being adopted today, we have found that, in accordance with Section 551(e)(1)(A) of the 1996 Act, distributors of video programming have established acceptable voluntary rules for rating video programming. The industry proposal includes commitments from programmers, as well as distributors of programming, to implement the *TV Parental Guidelines*. We note that both the cable and broadcast industries, through their trade associations, have almost universally agreed to participate in the *TV Parental Guidelines* rating system.<sup>35</sup> We continue to believe that, in order for blocking technology to function satisfactorily, it is essential that rating information is delivered and decoded properly. However, because video program distributors have voluntarily agreed to ensure transmission of the rating information, we find that it is not necessary for the Commission to require that distributors not delete rating information for programs that have been rated.

32. Other TV Receiving Apparatus. In the *Notice* we stated that the program blocking requirements should apply to any television receiver meeting the screen size requirements regardless of the medium of programming distribution. We stated that these requirements would apply to any computer sold with TV receiver capability and a monitor that has a viewable picture size of 13 inches or larger.

33. Several parties misinterpreted our proposal as extending program blocking technology requirements to computers used to display video programming downloaded from the Internet. However, it was never the Commission's intention to set blocking requirements for such computers. Instead, we only seek to ensure that computer systems used to view NTSC-formatted television signals, whether received over the air, through cable television systems, or from MDS or DBS systems, are also capable of blocking programming that parents do not want their children to view. As stated in the *Notice*, these requirements are similar to the Commission's policy on closed captioning circuitry with respect to computer systems used as television receivers.<sup>36</sup>

---

<sup>35</sup> The television industry has pledged to voluntarily transmit the *TV Parental Guidelines* information on line 21 of the VBI. See Letter of August 1, 1997 to the Commission from the Industry.

<sup>36</sup> See FCC Public Notice, "Closed Captioning Requirements for Computer Systems Used as Television Receivers", DA 95-581, March 22, 1995 ("March 22, 1995 Public Notice"). Traditionally, the picture sizes of computer monitors and television receivers have been measured differently: computer monitors are generally

34. Section 551 of the 1996 Act instructs the Commission to require "apparatus designed to receive television signals . . . that have a picture screen 13 inches or greater" to include program blocking technology. Additionally, the Commission must "require that all such apparatus be able to receive the rating signals which have been transmitted by way of line 21 of the vertical blanking interval . . ." <sup>37</sup> Only computer systems sold with television tuners and a picture screen larger than 13 inches fall into both of these categories. The proposed rules were not intended to apply to computers receiving video transmissions over the Internet or via computer networks. Indeed, V-chip technology is not compatible with the signal formats normally used for transmitting video information over the Internet, and such programming will not be encoded with the *TV Parental Guidelines*. However, we continue to believe that computer systems that contain an NTSC television tuner and an appropriately sized monitor should be included in our rules. Therefore, we will require that all such apparatus include program blocking technology for use in conjunction with NTSC-formatted video signals. Similarly, we will require that computer systems sold with an appropriately sized monitor and the capability of receiving DTV signals should also be included in our rules. Accordingly, we will require that such apparatus also include blocking technology.

35. In the *Notice* we stated that plug-in tuner boards that allow personal computers to act as DTV receivers will likely be available. We stated that program blocking capability could be included in these tuner boards quickly and relatively inexpensively. Therefore we proposed to require that all DTV receiver boards include program blocking capability, regardless of whether they are sold with a computer monitor with a viewable picture size of thirteen inches or larger. <sup>38</sup> BSA asserts that the Commission has no authority to impose such regulations on DTV receiver boards because the boards do not fall under the scope of Section 551(c); specifically, the boards do not have a picture screen thirteen inches or greater in size. Furthermore, BSA states that the Commission has not justified the need for a special rule for DTV receiver boards. Similarly, CEMA argues that DTV receiver boards be exempt from program blocking regulations unless sold with a television monitor.

36. In view of the arguments raised, we agree that separately sold plug-in DTV tuner boards do not meet the criteria for inclusion in the category of devices covered under the Communications Act. In order to maintain consistency in the interpretation of our rules we believe that these DTV tuner boards should be treated in a similar manner as plug-in analog tuner

---

measured based on the overall size of the picture tube while television receivers are measured based on viewable picture size. As indicated in the Public Notice, the Commission applies its closed captioning requirements for computer systems based, in part, on the viewable picture size of the computer monitor. We are proposing to apply the program blocking requirements similarly in this proceeding.

<sup>37</sup> Section 551(d).

<sup>38</sup> *Notice* at 23.

boards.<sup>39</sup> Therefore, we will not require these components to include program blocking circuitry.

37. Finally, we invited comment on whether VCRs, cable decoder boxes, DBS converter boxes, or other commercially-available devices may be used to defeat blocking technology. Although most commenters agree that such devices are not capable of bypassing blocking technology, Wilson stated that VCRs and other devices with television tuners should include blocking technology.<sup>40</sup> Wilson contends that, in the future "a significant possibility exists that the home entertainment system will consist of various elements . . . . Since the monitor may well be separated from the television receiver, it is important that devices including the television receiver also include the blocking technology."<sup>41</sup> IPPV stated that, because VCRs have a baseband output, they could be used to delete rating information and view programming that would otherwise be blocked.<sup>42</sup> Therefore, according to IPPV, all VCRs should be required to pass through line 21.

38. We are concerned about the possible future separation of tuners and monitors into distinct components. At this time, we will adopt a rule similar to our interpretation of the closed captioning rules with respect to computer systems. A covered "apparatus" for purposes of Section 551 will include either a single unit with tuner and monitor in the same enclosure, or a separate tuner and monitor sold together as part of the same transaction. If this rule proves insufficient to ensure the continued availability of v-chip technology, the Commission will re-evaluate the rules and address the situation at the appropriate time. With regard to VCRs, cable decoder boxes, DBS converter boxes or similar devices it appears that these devices already pass line 21 of the vertical blanking interval intact. Therefore, we do not believe a requirement for these devices to include program blocking technology is necessary or appropriate.

39. Other Issues. Philips asks that we exempt institutional TV receivers used outside of the home from blocking technology requirements. Philips states that these particular sets are for use in hospitals, hotels, schools, airports, and various business environments such as bars and restaurants. It further states that these sets are used to receive both standard programming such as over-the-air and cable programming as well as internal programming or information such as airline departure/arrival information or hotel checkouts. Philips states that there is no evidence

---

<sup>39</sup> See March 22, 1995 Public Notice. As indicated in the Public Notice, the Commission interprets its closed captioning requirements to apply to computer systems that have the capability to receive TV broadcast signals and include a monitor that has a viewable picture size of 33 cm (13 inches) or larger. For the purpose of the interpretation, a computer "system" was defined as either a single unit with computer and monitor in the same housing or separate computer and monitor sold together as part of the same business transaction. The closed captioning requirements do not apply to separately sold plug-in tuner boards which provide television receiver capability.

<sup>40</sup> Wilson at 2.

<sup>41</sup> Id.

<sup>42</sup> IPPV at 6.

that Congress, in enacting the 1996 Act, intended for these institutional receivers be equipped with V-chip technology. Philips contends that V-chip technology is unnecessary when TV receivers are used for internal programming. It further contends that V-chip technology may result in chaos if a hotel room TV receiver programmed by one guest to block certain categories needs to be re-programmed by the next.

40. We are not adopting Philips' request to exempt certain categories of TVs from our blocking requirements. The 1996 Act does not provide for exemptions for certain classes of TV receivers, other than for those receivers that have a display size less than 33 cm (13 inches). Further, Philips' has not provided any evidence to support its assertion that Congress did not intend for V-chip technology to be included in TV receivers intended for institutional use.

41. Finally, Toshiba states that the Commission should examine patents required for channel blocking and if possible preempt them. Regarding the intellectual property rights concerning the data format used in EIA-744, we understand that EIA investigated the packet structure recommended in the standard and did not find an existing patent. EIA requires participants, in EIA's standards development process, to agree to licensing any incorporated property rights in a non-discriminatory and equitable manner.

42. The Commission did not receive other comments concerning intellectual property rights for implementing of television ratings information. We recognize the possibility of existing patents, but we find that this does not inherently conflict with the rules adopted in this proceeding since no evidence has been presented of unreasonable royalty or licensing policies. At this time, we intend to allow the market to decide or innovate which implementation technologies will be used.

**PROCEDURAL MATTERS**

43. Final Regulatory Flexibility Analysis. The Final Regulatory Flexibility Analysis, required by Section 603 of the Regulatory Flexibility Act, as amended by the Contract with America Advancement Act of 1996, Pub. L. No. 104-121, 110 Stat. 847 (1996), is contained in Appendix A.

**ORDERING CLAUSES**

44. Accordingly, IT IS ORDERED that Parts 15 and 73 Commission's Rules and Regulations ARE AMENDED as specified in Appendix B. This action is taken pursuant to the authority contained in Sections 4(i), 303(f), 303(r), 303(v), 303(w), 303(x), and 330(c) of the Communications Act of 1934 as amended, 47 U.S.C. Sections 154(i), 303(f), 303(r), 303(v), 303(w), 303(x), and 330(c).

45. For further information regarding this Report and Order, contact Neal McNeil, Office of Engineering and Technology, (202) 418-2408, TTY (202) 418-2989, e-mail nmcneil@fcc.gov.

FEDERAL COMMUNICATIONS COMMISSION

Magalie Roman Salas  
Secretary

March 12, 1998

SEPARATE STATEMENT OF COMMISSIONER GLORIA TRISTANI

In the Matter of Implementation of Section 551 of the Telecommunications Act of 1996, Video Programming Ratings, CS Docket No. 97-55, and In the Matter of Technical Requirements to Enable Blocking of Video Programming Based on Program Ratings, Implementation of Sections 551(c), (d) and (e) of the Telecommunications Act of 1996, ET Docket No. 97-206

As I travel around the country, I hear again and again from parents who are concerned about what their children are being exposed to on TV. The facts support their concern. Children spend about 25 hours a week watching TV, more time each year than they spend in the classroom. And much of what they are watching is violent. By the time they complete elementary school, children have witnessed about 8,000 murders and 100,000 acts of violence.

Parents want to protect their children from violent and other kinds of programming that they consider harmful. But the task is daunting. Nowadays there aren't just three channels to monitor, there are dozens. No parent can possibly know what's on all of them all of the time. And in this age of single parent families and families in which both parents must work to make ends meet, it simply isn't possible for parents to always be at home to monitor what their children are watching. These parents want and deserve the ability to protect their children as much as parents who are able to closely monitor their children's viewing habits.

Today's actions will give parents a modern tool to help raise their children in the modern world. Under the voluntary Industry rating system we have found acceptable, parents should be able to receive the information they need in order to determine whether an upcoming program contains sex, violence, offensive language or suggestive dialogue. When used in conjunction with the V-chip, parents will be able to prevent their children from viewing programming that they consider harmful, even when they cannot be home.

The V-chip will not relieve parents of the responsibility of determining what their children watch on TV. It will help them fulfill that responsibility. Those who urge parents to simply turn off the shows they do not want their children to see should welcome the V-chip. The V-chip is essentially a remote control device with a longer range. It allows parents to "turn off" programs that they believe are harmful to their children while they are at work, at a PTA meeting, or at a Saturday night movie. It will not be a substitute for parents; it will help parents do their jobs.

I commend the Industry for developing an Industry-wide consensus on its voluntary ratings proposal. I also commend the Industry for its willingness to broaden this consensus by addressing some of the concerns that the public raised regarding its initial proposal. I note that there are still some entities, such as NBC and BET, whose decision not to participate in the current ratings system will make it more difficult for parents to program the V-chip using the

Industry proposal. I am especially concerned that many parents might not realize that NBC -- one of the major networks with some of the highest-rated programming on television -- does not apply content-based indicators. Such a parent, for example, may attempt to block violent programming using the "v" content-based indicator without realizing that they may also have to select an entire age-based category in order to block violent shows on NBC. Once a parent selects an entire age-based category, however, he or she loses the ability to establish different age-based categories for different types of content (e.g., the ability to restrict violence to a TV-PG level while permitting sexual content up to a TV-14 level). In this way, a parent who attempts to compensate for the NBC approach by blocking out an entire age-based category may be unable to take full advantage of the Industry system. As parents begin using the V-chip, I am hopeful that all video programming distributors will perceive the public interest in making the V-chip a more effective and easy-to-use tool for parents to block programming that they deem harmful to their children.

## APPENDIX A

### FINAL REGULATORY FLEXIBILITY ANALYSIS

As required by the Regulatory Flexibility Act ("RFA"),<sup>1</sup> an Initial Regulatory Flexibility Analysis ("IRFA") was incorporated in the *Notice of Proposed Rule Making (Notice)*.<sup>2</sup> The Commission sought written public comment on the proposals in the Notice, including comment on the IRFA. The Commission's Final Regulatory Flexibility Analysis ("FRFA") in this Report and Order conforms to the RFA.<sup>3</sup>

#### A. Need for and Objective of the Rules.

The rules adopted in this Report and Order are intended to give parents the ability to block video programming that they do not want their children to watch. This action is taken in response to the Parental Choice in Television Programming requirements contained in Sections 551(c), (d), and (e) of the Telecommunications Act of 1996 (the "1996 Act").<sup>4</sup> As described in the present Notice, Congress determined that parents should be provided "with timely information about the nature of upcoming video programming and with the technological tools that allow them to block violent, sexual, or other programming that they believe harmful to children." Section 551(c) of the 1996 Act directs the Commission to adopt rules requiring that any "apparatus designed to receive television signals that are shipped in interstate commerce or manufactured in the United States and that have a picture screen 13 inches or greater in size (measured diagonally) ...be equipped with a feature designed to enable viewers to block display of all programs with a common rating." Section 551(d) states that the Commission must "require that all such apparatus be able to receive the rating signals which have been transmitted by way of line 21 of the vertical blanking interval." That provision also instructs the Commission to oversee "the adoption of standards by industry for blocking technology," and to ensure that blocking capability continues to be available to consumers as technology advances.

---

<sup>1</sup> See 5 U.S.C. § 603. The RFA, see 5 U.S.C. § 601 *et. seq.*, has been amended by the Contract with America Advancement Act of 1996, Public Law 104-121, 110 Stat 847 (1996) (CWAAA). Title II of the CWAAA is the Small Business Regulatory Enforcement Fairness Act of 1996 (SBREFA).

<sup>2</sup> See ET Docket 97-206, 12 FCC Rcd 15573 (1997), Appendix A.

<sup>3</sup> See 5 U.S.C. § 604.

<sup>4</sup> Pub. L. No. 104-104, 111 Stat. 56 (1996).

## **B. Summary of Significant Issues Raised by Public Comments in Response to the IRFA.**

No comments were filed in direct response to the IRFA. Commenters, including possible small entity commenters, wrote general comments regarding the deadlines for compliance with the blocking technology rules.<sup>5</sup>

## **C. Description and Estimate of the Number of Small Entities to Which the Rules Will Apply.**

This action requires television manufacturers to include program blocking technology in television receivers that have a display size of 33 cm (13 inches) or larger. Personal computers that have a display size of 33 cm (13 inches) or larger and include the ability to receive NTSC or DTV TV signals (i.e., television broadcasting) are also subject to the requirement to include program blocking technology. The requirements do not apply to video signals transmitted over the Internet.

The RFA generally defines the term "small entity" as having the same meaning as the terms "small business" "small organization," and "small governmental jurisdictions." In addition, the term "small business" has the same meaning as the term "small business concern" under the Small Business Act, 15 U.S.C. § 632, unless the Commission has developed one or more definitions that are appropriate to its activities.<sup>6</sup> Under the Small Business Act, a "small business concern" is one that: (1) is independently owned and operated; (2) is not dominant in its field of operation; and (3) meets any additional criteria established by the Small Business Administration (SBA).<sup>7</sup>

The Commission has not developed a definition of small entities applicable to V-chip technology. Therefore, we will utilize the SBA definition applicable to manufacturers of Radio and Television Broadcasting and Communications Equipment. According to the SBA's regulations, television equipment manufacturers must have 750 or fewer employees in order to qualify as a small business concern.<sup>8</sup> Census Bureau data indicates that there are 858 U.S. companies that manufacture radio and television broadcasting and communications equipment, and that 778 of these firms have fewer than 750 employees and would be classified as small

---

<sup>5</sup> See FRFA Section E, *infra*, "Steps Taken to Minimize Significant Economic Impact on Small Entities and Significant Alternatives Considered."

<sup>6</sup> See 5 U.S.C. § 601(3).

<sup>7</sup> 15 U.S.C. § 632.

<sup>8</sup> 13 C.F.R. § 121.201, (SIC) Code 3663.

entities.<sup>9</sup> The Census Bureau category is very broad, and specific figures are not available as to how many of these firms are manufacturers of television equipment. However, we believe that many of the companies that manufacture television equipment may qualify as small entities.

According to SBA regulations, a computer manufacturer must have 1,000 or fewer employees in order to qualify as a small entity.<sup>10</sup> Census Bureau data indicates that there are 716 firms that manufacture electronic computers. Of those, 659 have fewer than 500 employees and qualify as small entities.<sup>11</sup> The remaining 57 firms have 500 or more employees; however, we are unable to determine how many of those have 1,000 or fewer employees and therefore also qualify as small entities under the SBA definition.

#### **D. Description of Projected Reporting, Recordkeeping and Other Compliance Requirements.**

The Commission's rules require television receivers to be verified for compliance with applicable FCC technical requirements. See 47 C.F.R. Sections 15.101, 15.117, and 2.951, *et seq.* Documentation concerning the verification must be kept by the manufacturer or importer. The rules adopted in this proceeding require that television receivers comply with industry-developed standards for blocking display of video programming based on program ratings. However, verification testing regarding program blocking is not necessary because compliance with the industry-developed standards, and the associated Commission rules, can be determined easily during the television receiver design process. The Commission may, of course, ask manufacturers and importers to document upon occasion how a particular television receiver complies with the program blocking requirements.

#### **E. Steps Taken to Minimize Significant Economic Impact on Small Entities and Significant Alternatives Considered.**

In the Notice we invited comment regarding the existence of such alternate blocking technologies and whether it would be appropriate to permit them at this time in lieu of ratings-based blocking technology. In order to evaluate possible alternative blocking technologies, we solicited information regarding the cost of any alternative blocking technology as well as the cost of implementing ratings-based technology pursuant to EIA-608.

---

<sup>9</sup> U.S. Department of Commerce, 1992 Census of Transportation, Communications, and Utilities, SIC Code 3663 (issued May 1995).

<sup>10</sup> 13 C.F.R. 121.201. (SIC) Code 3571.

<sup>11</sup> U.S. Small Business Administration 1995 Economic Census Industry and Enterprise Report, Table 3, SIC Code 3571. (Bureau of the Census data adapted by the Office of Advocacy of the U.S. Small Business Administration).

EIA-608 has provided television programmers, closed-captioning service providers and television receiver manufacturers with a standard method for transmitting and using data information transmitted on line 21. It ensures compatibility between the various uses of this information and minimizes the need for government regulation in this area. In the *Notice* we recognized the broad acceptance of EIA-608 for transmission of data on line 21. Accordingly, we proposed to amend our rules to require that most television receivers receive program ratings information transmitted pursuant to EIA-608 and block video programming based on a ratings level specified by the user. To accomplish this, we proposed to incorporate the appropriate provisions of EIA-608 into our regulations. We invited comment on whether other technical standards for blocking technology were being developed or have been developed, and whether they should be used instead of or in addition to EIA-608.

Commenters were uniform in their support of our proposal to adopt EIA-608 as the transmission standard for program ratings information.<sup>12</sup> No commenters suggested other transmission standards that the Commission should consider.<sup>13</sup> We continue to believe that EIA-608 provides an appropriate means of transmitting program ratings information on line 21. Therefore, we are amending our rules to require that all television receivers with picture screens 33 cm (13 inches) or larger, measured diagonally, shipped in interstate commerce or manufactured in the United States, receive program ratings transmitted pursuant to industry standard EIA-608 and block both the video and the associated audio on the main and second audio program (SAP) channels, based on a ratings level specified by the user of the television receiver. We are also incorporating the relevant parts of EIA-608 into our rules, along with EIA-744 which contains a proposed amendment to EIA-608 that will include pertinent information on transmission of program ratings information.

In the *Notice* we also proposed to require television manufacturers to include blocking technology on at least half of their product models with a picture screen 33 cm (13 inches) or greater in size by July 1, 1998. The remainder of the models would be required to contain blocking technology by July 1, 1999. While all commenters agree that program blocking technology should be made available to the public as soon as possible, television manufacturers contend that the deadlines proposed by the Commission are impossible to meet.

CEMA states that the design cycle for a television receiver model takes approximately 18-24 months. According to CEMA, "The cycle generally begins in January, and leads to product introduction the summer of the following year in time for the holiday buying season."<sup>14</sup> Other commenters state that this production cycle can not be compressed without creating the

---

<sup>12</sup> See in general comments filed by Philips and Thomson.

<sup>13</sup> OKTV has proposed a revision of EIA-744 which would allow the standard to accommodate up to seven additional independent rating systems. See comments of OKTV at Appendix A.

<sup>14</sup> CEMA at 5.

possibility of releasing an inferior product to the market.<sup>15</sup> Additionally, CEMA, Philips, and Thomson also state that the Commission must release final rules in both this proceeding and CS Docket 97-55 before the production cycle may begin for v-chip equipped televisions. They request that the Commission delay the implementation deadline for at least one year subsequent to the release of rules in these proceedings.

After reviewing all of the comments filed in this proceeding, we conclude that it is appropriate to delay our implementation deadlines. Manufacturers were consistent in describing typical design and production schedules for TV receivers.<sup>16</sup> We believe that our rules should conform with these schedules and provide a smooth transition for product introduction. We realize that, given these schedules, manufacturers are well into the production phase of sets that will be released in July 1998. Therefore, it would be infeasible to demand that these sets contain blocking technology. Furthermore, it would be detrimental to consumer confidence if forced compression of manufacturer design schedules resulted in the release of an unsatisfactory product. Accordingly, we are revising the implementation schedule proposed in the *Notice* to require that television manufacturers include blocking technology on at least half of their new product models with a picture screen 33 cm (13 inches) or greater in size by July 1, 1999. The remainder of the models would be required to contain blocking technology by January 1, 2000.

**Report to Congress:** The Commission will send a copy of the Report and Order, including this FRFA, in a report to Congress pursuant to the Small Business Regulatory Enforcement Fairness Act of 1996, see 5 U.S.C. § 801(a)(1)(A). A copy of the Report and Order and this FRFA (or summary thereof) will also be published in the Federal Register, see 5 U.S.C. § 604(b), and will be sent to the Chief Counsel for Advocacy of the Small Business Administration.

---

<sup>15</sup> See Philips at 3, Thomson at 7.

<sup>16</sup> See, for example, comments filed by MECA, Philips, Thomson, Toshiba, and Zenith.

**APPENDIX B****Commenting Parties**

## Parties Filing Comments:

1. Action Group on Violence on TV (AGVOT)
2. American Academy of Child & Adolescent Psychiatry (AACAP)
3. American Civil Liberties Union (ACLU)
4. Business Software Alliance (BSA)
5. Center For Media Education, American Medical Association, American Academy of Pediatrics, American Psychological Association, Children's Defense Fund, Children Now, National Association of Elementary School Principals, National Education Association, National Parent Teacher Association (CME, *et al*)
6. Consumer Electronics Manufacturers Association (CEMA)
7. EEG Enterprises, Inc. (EEG)
8. Electronic Frontier Foundation (EFF)
9. Information Technology Industry Council (ITI)
10. IPPV Enterprises (IPPV)
11. John B. Livingstone (Livingstone)
12. Matsushita Electronic Corporation of America (MECA)
13. Media Access Project and the Center for Democracy and Technology
14. National Association of Broadcasters, National Cable Television Association, Motion Picture Association of America (the Industry)
15. National Institute on Media and the Family (Institute)
16. OKTV (Our Kids TV)
17. Philips Electronics North America Corporation (Philips)
18. Public Broadcasting Service (PBS)
19. Sanyo
20. Soundview Technologies (Soundview)
21. TechnoTeacher, Inc. (TTI)
22. Thomson Consumer Electronics, Inc. (Thomson)
23. Tim Collings, et al
24. Toshiba
25. Wilson Sonsini Goodrich & Rosati (Wilson)
27. Wireless Cable Association International, Inc. (WCA)
28. Zenith Electronics Corporation (Zenith)

Parties Filing Reply Comments:

1. America Online, Inc. (AOL)
2. Ameritech
3. CME
4. CEMA
5. John B. Livingstone
6. The Industry
7. OKTV
8. People for the American Way Action Fund
9. Philips
10. Reporters Committee for Freedom of the Press
11. Soundview
12. Thomson
13. University of Wisconsin - Madison

**APPENDIX C**

A. Title 47 of the Code of Federal Regulations, Part 15, is amended as follows:

A new Section 15.120 is added to read as follows:

Section 15.120 Program blocking technology requirements for television receivers.

(a) Effective July 1, 1999, manufacturers of television broadcast receivers as defined in Section 15.3(w) of this chapter, including personal computer systems meeting that definition, must ensure that one-half of their product models with picture screens 33 cm (13 in) or larger in diameter shipped in interstate commerce or manufactured in the United States complies with the provision of paragraphs (c), (d), and (e) of this section.

NOTE: This paragraph places no restrictions on the shipping or sale of television receivers that were manufactured before July, 1999.

(b) Effective January 1, 2000, all TV broadcast receivers as defined in Section 15.3(w) of this chapter, including personal computer systems meeting that definition, with picture screens 33 cm (13 in) or larger in diameter shipped in interstate commerce or manufactured in the United States shall comply with the provisions of paragraphs (c), (d), and (e) of this section.

(c) Transmission Format.

(1) Analog television program rating information shall be transmitted on line 21 of field 2 of the vertical blanking interval of television signals, in accordance with § 73.682(a)(22) of this chapter.

(2) [Reserved]

(d) Operation.

(1) Analog television receivers will receive program ratings transmitted pursuant to industry standard EIA-744 "Transport of Content Advisory Information Using Extended Data Service (XDS)" and EIA-608 "Recommended Practice for Line 21 Data Service". This incorporation by reference was approved by the Director of the Federal Register in accordance with 5 U.S.C. 522(a) and 1 CFR Part 51. Blocking of programming shall occur when a program rating is received that meets the pre-determined user requirements. Copies of EIA-744 and EIA-608 may be obtained from: Global Engineering Documents, 15 Inverness Way East, Englewood, Co 80112-5704. Copies of EIA-744 may be inspected during normal business hours at the following locations: Federal Communications Commission, 2000 M Street, NW, Technical Information Center (Suite 230), Washington, DC, or the Office of the Federal Register, 800 North Capitol Street, NW, suite 700 Washington, DC.

(2) Digital television receivers shall react in a similar manner as analog televisions when programmed to block specific rating categories.

(e) All television receivers as described in paragraph (a) of this section shall block programming as follows:

(1) Channel Blocking. Channel Blocking should occur as soon as a program rating packet with the appropriate Content Advisory or MPAA rating level is received. Program blocking is described as a receiver performing all of the following:

- ! Muting the program audio
- ! Rendering the video black or otherwise indecipherable
- ! Eliminating program-related captions

(2) Default State. The default state of a receiver (i.e., as provided to the consumer) should not block unrated programs. However, it is permissible to include features that allow the user to reprogram the receiver to block programs that are not rated.

(3) Picture-In-Picture (PIP). If a receiver has the ability to decode program-related rating information for the Picture-In-Picture (PIP) video signal, then it should block the PIP channel in the same manner as the main channel. If the receiver does not have the ability to decode PIP program-related rating information, then it should block or otherwise disable the PIP if the viewer has enabled program blocking.

(4) Selection of Ratings. Each television receiver, in accordance with user input, shall block programming based on the age based ratings, the content based ratings, or a combination of the two.

(i) If the user chooses to block programming according to its age based rating level, the receiver must have the ability to automatically block programs with a more restrictive age based rating. For example, if all shows with an age-based rating of TV-PG have been selected for blocking, the user should be able to automatically block programs with the more restrictive ratings of TV-14 and TV-MA.

(ii) If the user chooses to block programming according to a combination of age based and content based ratings the receiver must have the ability to automatically block programming with a more restrictive age rating but a similar content rating. For example, if all shows rated TV-PG-V have been selected for blocking, the user should be able to block automatically shows with the more restrictive ratings of TV-14-V and TV-MA-V.

(iii) The user should have the capability of overriding the automatic blocking described in paragraphs (4)(i) and (4)(ii) of this section.

B. Title 47 of the Code of Federal Regulations, Part 73, is amended as follows:

Section 73.682 is amended by revising paragraphs (a)(22)(i) and (a)(24)(iii)(A) to read as follows:

Section 73.682 TV transmission standards.

(a) \* \* \*

\* \* \* \* \*

(22)(i) Line 21, in each field, may be used for the transmission of a program-related data signal which, when decoded, provides a visual depiction of information simultaneously being presented on the aural channel (captions). Line 21, field 2 may be used for transmission of a program-related data signal which, when decoded, identifies a rating level associated with the current program. Such data signals shall conform to the format described in figure 17 of § 73.699 and may be transmitted during all periods of regular operation. On a space available basis, line 21 field 2 may also be used for text-mode data and extended data service information.

\* \* \* \* \*

(24)(iii)(A) The use of such signals shall not result in significant degradation to any portion of the visual, aural, or program-related data signals of the television broadcast station;