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Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554

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In the Matter of	)	
	)	
Closed Captioning and Video Description of Video Programming	)	
	)	MM Docket No. 95-176
Implementation of Section 305 of the Telecommunications Act of 1996	)	
	)	
Video Programming Accessibility	)	

NOTICE OF PROPOSED RULEMAKING

Adopted: **January 9, 1997** **Released:** **January 17, 1997**

By the Commission:

Comment Date: **February 28, 1997**
Reply Comment Date: **March 24, 1997**

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I. INTRODUCTION

1. Closed captioning is an assistive technology designed to provide access to television for persons with hearing disabilities. Closed captioning is similar to subtitles in that it displays the audio portion of a television signal as printed words on the television screen.[1] To assist viewers with hearing disabilities, captions may also identify speakers, sound effects, music and laughter. Section 305 of the Telecommunications Act of 1996 ("1996 Act") added a new Section 713, Video Programming Accessibility, to the Communications Act of 1934, as amended ("Communications Act").[2] Section 713 requires the Commission to prescribe, by August 8, 1997, rules and implementation schedules for captioning of video programming.[3] In enacting Section 713, Congress generally required that video programming be closed captioned, regardless of distribution technology,[4] to ensure access to persons with hearing disabilities. This *Notice of Proposed Rulemaking* ("*Notice*") seeks comment on proposed rules and implementation schedules to fulfill the statutory mandate of Section 713. Our proposals are based on comments and information submitted in response to a *Notice of Inquiry* in this proceeding[5] and additional data

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[1] *See Implementation of Television Decoder Circuitry Act*, Report and Order ("*TDCA R&O*"), GEN Docket No. 91-1, 6 FCC Rcd 2419, 2420 (1991), *recon. granted in part*, Memorandum Opinion and Order, 7 FCC Rcd 2279 (1992). Further background information concerning closed captioning can be found in DuBow, *The Television Decoder Circuitry Act -- TV For All*, 64 Temp. L. Rev. 609 (1991), and on the World Wide Web home page of the Caption Center of the WGBH Educational Foundation ("WGBH"): http://www.wgbh.org/pages/captioncenterhome.html. Copies of materials from the World Wide Web that are cited have been placed in the record of this proceeding.

[2] Pub. L. 104-104, 110 Stat. 56 (1996). Section 713 to the Communications Act, 47 U.S.C. § 613.

[3] Section 713 contains provisions concerning closed captioning and video description of video programming. The scope of this *Notice* is limited to the closed captioning of video programming.

[4] Video programming may be delivered to consumers through a variety of technologies. These distribution technologies include broadcast television, cable television, wireless cable, direct-to-home satellite services (such as direct broadcast satellite service and home satellite dishes), satellite master antenna systems, and local telephone exchange carrier video.

[5] On December 1, 1995, the Commission adopted a *Notice of Inquiry* in this proceeding which sought comment on a wide variety of issues related to closed captioning and video description of video programming based on the legislation that was pending at that time. *Closed Captioning and Video Description of Video Programming*, Notice of Inquiry, MM Docket No. 95-176, FCC 95-484, 11 FCC Rcd 4912 (1996). On February 27, 1996, the Commission announced its intention to use the comments filed in this proceeding for the inquiries it was required (continued...)

gathered by the Commission for our *Report* to Congress on video accessibility that was issued on July 29, 1996, pursuant to the requirements of Section 713(a).[6]

2. Section 713 is intended to further Congress' goal "to ensure that all Americans ultimately have access to video services and programs, particularly as video programming becomes an increasingly important part of the home, school and workplace."[7] It is "designed to ensure that video services are accessible to hearing impaired . . . individuals"[8] by promoting the accessibility of video programming to persons with disabilities, regardless of the delivery mechanism used to reach consumers.[9] In this *Notice*, the Commission discusses proposals intended to maximize the amount of programming containing closed captioning with appropriate exemptions and reasonable timetables to take into account the relevant technical and costs issues involved.[10]

3. In Section II of this *Notice*, we set out the provisions of Section 713, examine the scope of the statutory requirements, and summarize the proposals in this *Notice*. We also provide background information regarding the current regulation of closed captioning, the current availability of closed captioning by programming types and by various program providers,[11] the methods and costs involved in closed captioning and the available resources for captioning. In Section III, we discuss: (1) the obligation to comply with our closed captioning requirements; (2) closed captioning obligations as to non-exempt new programming, including phase in schedules; (3) closed captioning obligations as to non-exempt library programming, including phase in schedules; (4) exemptions for classes of programming and providers; (5) exemptions based on existing contracts; (6) exemptions under the undue burden standard; and (7) standards for quality and accuracy. In Section IV, we propose enforcement and compliance mechanisms. Throughout this *Notice*, we seek comment on our proposed closed captioning requirements. We

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[5](...continued)
to conduct on these issues pursuant to Section 305 of the 1996 Act and extended the period for filing comments. *Closed Captioning and Video Description of Video Programming*, Order, MM Docket No. 95-176, FCC 96-71, 11 FCC Rcd 5783 (1996). Appendix A lists all parties responding to the inquiry.

[6] Section 713(a) required the Commission to conduct an inquiry into the availability of video programming with closed captioning. *See Implementation of Section 305 of the Telecommunications Act of 1996 - Video Accessibility*, Report, MM Docket No. 95-176, FCC 96-318 (released July 29, 1996), *summarized at* 61 Fed. Reg. 42249 (August 14, 1996).

[7] H.R. Report 104-458 104th Cong., 2d Sess. ("Conference Report") (1996) at 182.

[8] *Id.* at 183.

[9] H.R. Report 104-204, 104th Cong., 1st Sess. ("House Report") (1995) at 113-114.

[10] *See* House Report at 114.

[11] The legislative history of 1996 Act defines the term "provider" as the "specific television station, cable operator, cable network or other service that provides programming to the public." House Report at 114.

also invite commenters to provide alternative proposals that will fulfill the congressional mandate to ensure video accessibility to individuals with hearing disabilities.

II. BACKGROUND

A. Scope of Section 713

4. Section 713(b) requires the Commission within 18 months of enactment to adopt rules to ensure that:

> (1) video programming first published or exhibited after the effective date of such regulations is fully accessible through the provision of closed captions, except as provided in subsection (d); and
>
> (2) video programming providers or owners maximize the accessibility of video programming first published or exhibited prior to the effective date of such regulations through the provision of closed captions, except as provided in subsection (d).

Section 713(c) further provides that:

> Such regulations shall include an appropriate schedule of deadlines for the provision of closed captioning of video programming.

Notwithstanding the provisions of Section 713(b), the statute permits certain exemptions of closed captioning requirements. Specifically, under Section 713(d):

> (1) the Commission may exempt by regulation programs, classes of programs, or services for which the Commission has determined that the provision of closed captioning would be economically burdensome to the provider or owner of such programming;
>
> (2) a provider of video programming or the owner of any program carried by the provider shall not be obligated to supply closed captions if such action would be inconsistent with contracts in effect on the date of enactment of the Telecommunications Act of 1996, except that nothing in this section shall be construed to relieve a video programming provider of its obligations to provide services required by Federal law; and
>
> (3) a provider of video programming or program owner may petition the Commission for an exemption from the requirements of this section, and the Commission may grant such petition upon a showing that the requirements contained in this section would result in an undue burden.

For purposes of defining undue burden under Section 713, Section 713(e) states that:

> The term "undue burden" means significant difficulty or expense. In determining whether the closed captions necessary to comply with the requirements of this paragraph would result in an undue economic burden, the factors to be considered include --
>
> (1) the nature and cost of the closed captions for the programming;
>
> (2) the impact on the operation of the provider or program owner;
>
> (3) the financial resources of the provider or program owner; and
>
> (4) the type of operations of the provider or program owner.

5. At the outset, we note that the provisions of Section 713 apply to all types of video programming delivered electronically to consumers, regardless of the entity that provides the programming or the category of programming.[12] In this *Notice*, we propose rules and implementation schedules for closed captioning requirements for the various distribution technologies used to deliver this programming to consumers. We consider over-the-air broadcast television service (both commercial and noncommercial) and all multichannel video programming distributors ("MVPDs"). Among these distributors are: cable television, direct-to-home ("DTH") satellite services, including direct broadcast satellite ("DBS") services and home satellite dishes ("HSD"); wireless cable systems using the multichannel multipoint distribution service ("MMDS"), instructional television fixed service ("ITFS") or local multipoint distribution ("LMDS"); satellite master antenna television ("SMATV"); and open video systems ("OVS").[13] We further consider the sources of video programming distributed by these technologies, including programming from commercial and noncommercial broadcast television networks, basic and premium cable networks, syndicated programming, and locally or regionally produced broadcast and cable programming.

B. Summary of Proposed Regulations

6. The following summarizes our proposals to implement the closed captioning requirements under Section 713:

- Responsibility for compliance with captioning requirements: Our tentative proposal is to require those entities that deliver video programming directly to consumers (i.e., television

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[12] *See* Conference Report at 183.

[13] *See Annual Assessment of the Status of Competition in the Market for the Delivery of Video Programming*, Third Annual Report (*"1996 Competition Report"*), CS Docket No. 96-133, FCC 96-496, __ FCC Rcd ___ (released Jan. 2, 1997). This report provides detailed information regarding all available video distribution technologies.

broadcasters and MVPDs) to be ultimately responsible for the rules we adopt. Although we propose to place the compliance obligations on video programming providers, we recognize, from a practical standpoint, that captioning is most efficient at the production stage. Thus, we believe that producers generally will have the responsibility for captioning programming regardless of who has the obligation to comply with our rules.

- Transition schedule:

  - New Programming - We propose to require that all non-exempt, new programming be closed captioned within eight years. We propose to phase in this captioning requirement by increasing the amount of required captioning by 25% every two years. Thus, we would require 25% of such programming to be captioned at the end of the second year, 50% at the end of the fourth year, 75% at the end of the sixth year, and to have all non-exempt, new programming captioned at the end of the eighth year. Alternatively, we seek comment on a ten year period with 25% captioned after three years. 50% after five years, 75% after seven years, and 100% after ten years.

  - Library programming - The statute requires that programming providers or owners "maximize the accessibility" of programming first published or exhibited before the effective date of our rules. We ask whether we should require that a percentage of library programming (e.g., 75%) ultimately be captioned. Some commenters assert that captioning of previously published programming is increasing and thus it may be unnecessary to require completion of closed captioned video libraries by a date certain. We ask that commenters who support this approach indicate how the Commission would ensure that video programming providers or owners "maximize the accessibility" of previously published programming, as required by Section 713(b)(2).

- Exemption based on economic burden: Section 713(d)(1) provides for the exemption of classes of video programming or video providers where the requirement to close caption programming would be economically burdensome. While Section 713 and its legislative history do not define the term "economic burden," we interpret this provision to permit us to exempt those classes of programming where the economic burden of captioning these programming types outweighs the benefits to be derived from captioning and, in some cases, the complexity of adding the captions. We seek to establish a general classification or a number of general classifications of programming for which captioning would be economically burdensome. We do not propose to exempt any class of provider since all classes of providers appear to have the technical capability to deliver closed captioning to their viewers intact.

- Exemptions based on existing contracts: We tentatively conclude that programming subject to contracts in effect on the date of enactment of the 1996 Act (i.e., February 8, 1996) that specifically prohibit closed captioning should be exempt from any captioning requirement. Comment is sought on other types of contract provisions that may be inconsistent with captioning.

- Exemptions based on undue burden: The statute provides for petition for exemptions based on a showing of undue burden. Such exemptions would be available based on:

  (1) the nature and cost of the closed captions for the programming;
  (2) the impact on the operation of the provider or program owner;
  (3) the financial resources of the provider or program owner; and
  (4) the type of operations of the provider or program owner.

We seek comment on how to apply these factors and whether there are any other factors which should be considered when determining that closed captioning would result in an undue burden for an individual programming provider. We also request comment on using standard "special relief" or waiver type procedures for these types of requests.

- Standards for quality and accuracy: We propose to extend to other programming providers the rule (Section 76.606) that requires cable operators to deliver existing captions intact to all video providers. However, we tentatively conclude that we should not adopt standards for the non-technical aspects of captioning, including accuracy of transcription, spelling, placement and style, at the start of our phase in period for closed captioning. We propose to monitor the closed captioning that results from our requirements and, if necessary, revisit this issue at a later date. We also will not propose minimum credentials for captioners nor place any limits on the method used to create captions.

- The enforcement process: We propose to rely on complaints as a primary enforcement mechanism for the rules we adopt. Further, all complaints would initially be directed to the program provider in an attempt to resolve problems privately within a specified time period in order to minimize administrative resources devoted to matters that are better resolved through informal processes. We also seek comment on other methods or information needed to verify compliance, such as a requirement that each entity responsible for compliance with the rules retain in its files, or have available upon appropriate request, records sufficient to verify compliance.

C. Current Regulation of Closed Captioning

7. Closed captioning was first used in the 1970s.[14] Closed captioning is hidden as encoded data transmitted within the vertical blanking interval ("VBI") of the television signal, which, "when decoded, provides a visual depiction of information simultaneously being presented

[14] *Report*, FCC 96-318 ¶¶ 25-28.

in the aural channel (captions)."[15] A viewer wishing to see the closed captioning must use a set-top decoder or a television receiver with built-in decoder circuitry.

8. In 1976, the Commission adopted rules which provide that line 21 of the VBI is to be primarily used for the transmission of closed captioning.[16] The Commission's rules specify technical standards for the reception and display of such captioning.[17] The Commission also has adopted technical standards for the cable carriage of closed captioning data that accompanies programming carried on cable systems.[18] Cable operators and open video system operators also are specifically required to carry the closed captioning data contained in line 21 of the VBI as part of their must-carry obligations.[19] In 1976, the Commission adopted a rule requiring television licensees to transmit emergency messages in a visual format.[20] In 1990, as part of the ADA,[21] a requirement was established that all federally funded public service announcements must be closed captioned.[22]

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[15] *See* 47 C.F.R. § 73.682(a)(22). In particular, closed-captioning information may be transmitted on fields one and two of line 21 of the VBI. Standard television pictures are transmitted at a rate of 30 frames per second, with two interlaced fields comprising each frame. Each field begins with a VBI of 21 lines, during which the picture scanning beam is turned off (blanked) and is moved from the bottom of the screen to its starting position at the top of the screen. There are two VBIs transmitted per frame, one in each field. The placement of data within the VBI is described in terms of the particular blanking line used and the field (one or two) in which it occurs. *See Permissible Uses of the Vertical Blanking Interval,* Notice of Proposed Rulemaking, MM Docket No. 92-305, 8 FCC Rcd 90 n.1 (1992).

[16] *See Captioning for the Deaf,* Report and Order ("*Captioning R&O*"), Docket No. 20693, 63 FCC 2d 378 (1976). *See also Permissible Uses of the Vertical Blanking Interval,* Report and Order, MM Docket No. 92-305, 8 FCC Rcd 3613 (permitting enhanced closed-captioning and other broadcast-related information services on line 21, field 2 of the VBI).

[17] *Id.*

[18] 47 C.F.R. § 76.606; *Cable Television Technical and Operational Requirements,* Report and Order, MM Docket No. 91-169, 7 FCC Rcd 2021, 2031 (1992), *recon. granted in part,* Memorandum Opinion and Order, 7 FCC Rcd 8676 (1992).

[19] 47 U.S.C. §§ 534(b)(3), 535(g)(1) and 47 C.F.R. §§ 76.62 (e), (f) and 76.1506(k). *See Implementation of Section 302 of the Telecommunications Act of 1996 Open Video Systems,* Second Report and Order, CS Docket No. 96-46, FCC 96-249 (released June 3, 1996), *summarized at* 61 Fed. Reg. 28698 (June 5, 1996).

[20] 47 C.F.R. § 73.1250(h); *Emergency Messages -- Television,* Report and Order, Docket No. 20659, 61 FCC 2d 18 (1976), *recon. granted in part,* Memorandum Opinion and Order, 62 FCC 2d 565 (1977).

[21] Pub. L. No. 101-336, § 2, 104 Stat. 328 (1990) (codified at 42 U.S.C. § 12101 *et seq.*).

[22] 47 U.S.C. § 611. The ADA is a comprehensive civil rights statute that prohibits discrimination against individuals with disabilities in the areas of employment, state and local government services, and in private places of public accommodation such as restaurants, law offices, and movie theaters. *See generally* Burgdorf, *The Americans with Disabilities Act: Analysis and Implications of a Second-Generation Civil Rights Statute,* 26 Harv. C.R.-C.L. L. Rev. 413 (1991).

9. To implement the Television Decoder Circuitry Act of 1990 ("TDCA"),[23] the Commission adopted rules that require all television receivers with screen sizes 13 inches or larger to be capable of receiving and displaying closed captions. For those whose television receivers that are not capable of decoding and displaying closed captioning, separate decoders may be purchased. Existing technology, however, can only decode Latin-based alphabets and symbols, so captioning of some non-English language programming (Chinese, Japanese, Russian, Arabic, etc.) is not possible using this system.[24] This transmission and display system is generally well established and functions effectively. In 1995, 25 million decoder-equipped television sets were sold in the U.S.[25] It is estimated that between 50 and 60 million U.S. homes currently can receive closed captioning.[26] Digital transmission systems under development are being designed to include closed captioning capabilities.[27]

D. Current Availability of Programming With Closed Captioning

10. Currently, programming accessible to persons with hearing disabilities through closed captioning is the result of the voluntary efforts of program producers and providers, although the Commission has encouraged these efforts in several previous actions.[28] Economic support for these voluntary efforts comes from four principal sources. Financial assistance

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[23] Pub. L. No. 101-431, 104 Stat. 960 (1990) (codified at 47 U.S.C. §§ 303(u), 330(b)).

[24] International Cable Channel Partnership, Ltd. ("ICCP") Reply Comments at 3. *Electronic Industries Association of America (EIA) Standard Recommended Practice for Line 21 Data Service* (EIA Document #608) September 1994 at 14-2.

[25] Electronics Industries Association, Consumer Electronics Manufacturing Association ("CEMA") Comments at 4, citing Electronics Industry of America Market Research Department 1995 figures.

[26] VITAC Comments at 12; Clark Comments at 6.

[27] *See Advanced Television Systems and Their Impact Upon Existing Television Broadcast Service*, Fourth Report and Order *("ATV R & O")*, MM Docket No. 87-268, FCC 96-493, __ FCC Rcd __ (released December 27, 1996).

[28] *The Use of Telecasts to Inform and Alert Viewers With Impaired Hearing*, Public Notice ("*Use Public Notice*"), 26 FCC 2d 917 (1970) (alerting television licensees of the special needs of persons with hearing disabilities, and urging them to make use of visual as well as oral announcements of emergencies, position newscasters so as to permit the use of lip reading by viewers and feature visualization of materials in news, weather and sports programs). *See also Captioning R&O,* 63 FCC 2d at 389 ("We continue to encourage broadcast licensees . . . to make television a truly valuable medium for the hearing-impaired."); *Renewal Applications -- Los Angeles*, Memorandum Opinion and Order, 69 FCC 2d 451, 459 (1978) (rejecting renewal challenges based on licensees' failure to provide closed captioning, but "urg[ing] all television licensees to review the options presently available that, within reason, might provide some of the benefits of the medium of television for this nation's hearing impaired"), *recon. denied*, Memorandum Opinion and Order, 72 FCC 2d 273 (1979), *aff'd sub nom. Community Television of Southern California v. Gottfried*, 459 U.S. 498 (1983). *See also Implementation of 1992 Cable Act Rate Regulation,* Report and Order and Further Notice of Proposed Rulemaking, MM Docket No. 92-266, 8 FCC Rcd 5631, 5902 (1993) where the Commission urged cable operators to carry more video programming with closed captions.

provided by the Department of Education ("DOE") represents approximately 40% of the cost of all captioned video programming. This funding is available only for programming that reaches the largest audiences -- national news, public affairs and children's programming, movies and prime time specials. The remaining support comes from a combination of directly credited corporate advertising support, charitable and foundation support, and producers and distributors of programming.

11. Today, significant amounts of nationally distributed programming is closed captioned and some programming produced locally or regionally is captioned.[29] Television programming is produced initially for broadcast networks, broadcast stations, cable networks and cable systems. Other MVPDs, such as wireless and satellite providers, also offer their subscribers programming originally produced for broadcast and cable distribution and generally transmit intact any closed captioning provided with programs.[30]

12. Virtually all nationally broadcast programming, both commercial and noncommercial, contains closed captions, including prime time television programming, children's programming, news, daytime programming and some sports programming. The Public Broadcasting Service ("PBS") captions all children's programs, prime time programming and the *Newshour with Jim Lehrer*.[31] The few PBS programs that are not closed captioned are visually oriented (e.g., ballet or other dance performances), or are non-verbal in nature (e.g., a symphony concert). Non-English language operas are not closed captioned since they already contain open English subtitles.[32] PBS has voluntarily adopted the practice of requiring producers to provide closed captioning in all programming funded by PBS' National Program Service.

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[29] *See Report*, FCC 96-318 ¶¶ 56-83, for detailed information regarding available programming with captions.

[30] Wireless Cable Association International, Inc. ("WCA") Comments at 2, 3, 7; Small Cable Business Association ("SCBA") Comments at 5-6. The one possible exception is when the scrambling system employed by some wireless cable systems does not allow line 21 of the VBI to be passed through to the subscriber's television set. Interview with Paul Sindebrand, Wilkerson, Barker, Knauer & Quinn, and Andrew Kreig, Vice President and General Counsel, Wireless Cable Association International (November 7, 1996).

[31] PBS Comments at 2.

[32] PBS Comments at 2. Foreign language programming, in general, is not captioned due to several logistical problems. Persons with expertise in non-English language captioning may be scarce and, for some languages, virtually unavailable. Also, the alphabets and characters used in certain non-English languages cannot be processed with standard closed captioning. and the captioning decoders currently available in television sets used in the U.S. can only decode Latin-based alphabets and symbols. ICCP Reply Comments at 3. *Electronic Industries Association of America (EIA) Standard Recommended Practice for Line 21 Data Service* (EIA Document #608) September 1994 at 14-22; Telephone Interview with Gerald Freda, Vice President, Production & Engineering, National Captioning Institute ("NCI") (June 17, 1996).

13. The majority of programming on each of the commercial broadcast networks also is already closed captioned.[33] The primary exceptions are overnight news programs[34] and regional sports feeds.[35] NBC closed captions an average of 83 hours of programming per week, or 88.3% of the 94 hours each week it distributes to affiliates.[36] ABC offers on average about 90 hours of programming each week to its affiliates.[37] Of that programming, a substantial majority, including news, sports, children's and entertainment programming, is closed captioned.[38] CBS averages 13.5 hours of programming with closed captions daily, or between 85 and 95 hours per week, depending on weekend sports programming schedules.[39] The Fox Television Network distributes 16 hours of prime time, late night and early Sunday morning programming, along with 19 hours of children's programming throughout the week, all of which is closed captioned.[40] The WB Television Network ("WB") distributes five hours of prime time programming and five hours of children's programming each week, all of which is closed captioned, with the exception of some older cartoons.[41] The United Paramount Network ("UPN") distributes six hours of prime time programming, one hour of children's weekend programming, and a movie on Saturday

[33] NBC Comments at 3; CBS Comments at 9; Capital Cities/ABC Comments at 4; Association of late-Deafened Adults ("ALDA") Comments at 3.

[34] ABC, CBS and NBC distribute overnight news programs, broadcast between 2 a.m. and 6 a.m., which are often a compilation of reports sent to them by their affiliates without captioning. The networks claim that the relatively low ratings and limited advertising revenues of these programs do not justify the cost of captioning. Capital Cities/ABC Comments at 6.

[35] One exception has been the regional games of the 1995 and 1996 NCAA Men's Basketball tournament, which were captioned by CBS through joint efforts with funding and captioning agency partners. CBS Comments at 14-15.

[36] NBC Comments at 3; Telephone Interview with Ellen Agress, Vice President, Legal Policy and Planning, NBC (June 4, 1996).

[37] Capital Cities/ABC Comments at 5.

[38] *Id.* at 5-7. ABC indicates that the major exceptions are *World News Now*, offered to affiliates Monday - Friday, 2 a.m. - 6 a.m. eastern time, and live regional sports. *Id.* at 5.

[39] CBS Comments at 8-9.

[40] Information from Peggy Binzel, Senior Vice President, Government Relations, Fox Broadcasting Company (June 17, 1996).

[41] Telephone Interview with Mitch Nedick, Head, Finance and Administration, the WB Television Network (July 8, 1996).

afternoons, all of which is closed captioned.[42] UPN includes captioning as a delivery requirement in its programming contracts.[43]

14. In the last few years, most syndicated programming has included closed captioning. The amount of captioned first-run syndicated programming (e.g., *Jeopardy!*, *Wheel of Fortune*, *Oprah*) varies depending on who produces and who airs the programming.[44] Newer off-network syndicated programming, especially that produced after the mid-1980s, is often closed captioned. Most off-network syndicated programming produced before the mid-1980s (e.g., *Bewitched*, *The Honeymooners*) was not captioned when produced and remains uncaptioned.[45]

15. With respect to nationally distributed cable programming networks, according to the National Cable Television Association ("NCTA"), nearly 24% of the programming on the top 20 basic and six most widely distributed premium cable channels is captioned at present, with certain services providing as much as 80% of their programming with captions.[46] In addition, nearly 30% of prime time programming on the top 20 basic cable networks and over 60% on the top six premium networks is closed captioned.[47] Some national news on cable is closed captioned. Cable news programming networks, such as CNN, CNN Headline News and CNBC, caption between 25% and 50% of their programming each week.[48] Kaleidoscope, a 24-hour a day cable programming network established for the purpose of serving persons with disabilities uses "open captions" that are visible to all viewers for its programming.[49] Furthermore, Home Box Office ("HBO") and Cinemax, two of the most widely available premium cable network services, provide a variety of programming, much of which is captioned. For example, in 1995, HBO had captioning on 76% of its theatrical motion pictures, 83% of its musical programming,

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[42] Telephone Interviews with Robert Kaplan, Programming Director, United Paramount Network and Robert Giese, Vice President, Chris Craft Broadcasting, (May 29, 1996).

[43] *Report*, FCC 96-318 ¶ 64.

[44] VITAC Comments at 12; Californians for Television Access ("CTA") Comments at 3.

[45] National Association of the Deaf ("NAD") Comments at 16.

[46] NCTA Comments at 3-5.

[47] *Id.*

[48] *Report*, FCC 96-318 ¶ 76; NBC Comments at 5-6.

[49] NCTA Comments at 5; Telephone Interview with Ryan Prince, Director of Kaleidoscope's National Advisory Board (May 29, 1996) ("Prince Interview"). Kaleidoscope has transmitted its service using digital compression technology since April 1995, and is currently trying to expand its coverage through the DirecTV and Primestar DBS systems. HSD owners who subscribe to Kaleidoscope need a special decoder to receive the digital signal.

94% of its documentaries, 72% of its family programming, 82% of its series, 100% of its comedy programs, and 100% of other categories of programming.[50]

16. Almost all widely-distributed motion pictures currently produced and distributed by member companies of the Motion Picture Association of America ("MPAA") are closed captioned for distribution over broadcast television, home video and cable television following their theatrical release. While more than 6,000 closed captioned titles have been distributed,[51] according to MPAA, there are approximately 24,000 previously released films that have not been closed captioned.[52] Many commercials scheduled during and adjacent to network programs are captioned by the advertising agencies which produce them. Network promotions of upcoming network programs ("interstitials") are generally not captioned. Broadcast and cable networks such as NBC and HBO state that even for uncaptioned promotional spots, information about the name of the program and the time of the upcoming broadcast is often displayed visually by graphics contained in the spot.[53]

17. Many local television stations caption their news, at least the portion that is scripted. According to a study conducted by the National Association of Broadcasters ("NAB") in February 1996, 70% of the stations responding provide closed captioning for some of their non-network programming.[54] According to the NAB, 81.5% of stations caption their local news.[55] Cable operators provide their subscribers with regional and local cable programming in addition to broadcast stations and national cable networks. The regional programming is primarily news and sports channels that are generally not captioned.[56] Much locally originated programming carried by cable operators is on their public, educational and governmental ("PEG") access channels. Programming over PEG access channels is usually produced by individuals, schools, local governments or small non-profit organizations working with volunteer personnel. Most of these program producers usually operate with very limited funding that results in a low level of captioning of PEG programming.[57]

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[50] HBO Comments at 7.

[51] MPAA Comments at 3-4.

[52] *Id.* at 12.

[53] NBC Comments at 4; HBO Comments at 14-15..

[54] Fratrik, "The Television Industry's Provision of Closed Captioning Services in 1996," National Association of Broadcasters (March 15, 1996), NAB Comments, Attachment at 2.

[55] NAB Comments at 3; NAB Study at 4-5.

[56] NCTA Comments at 9, 11.

[57] Alliance for Community Media ("Alliance") Comments at 7.

E. Methods of Closed Captioning

18. As we reported in our July 29, 1996, *Report* to Congress, the methods used to caption video programming vary primarily by programming type, with costs depending on the method used to add the captions, the quality of the captions and the entity providing the captions.[58] Organizations and suppliers that charge the most for their services are reported to provide the highest quality and most accurate captioning. For prerecorded programming, captioning is generally "off line." Under this method, the captioning service gets an advance copy of the script, tape or film before the program is aired. The audio portion of the program, including sound effects as well as dialogue, is transcribed and added in synchronization with the video content. After the program is captioned it is sent to a post-production company or to the program producer on a computer disk or via modem. The captioning is encoded by the post-production company or the producer onto line 21 of the VBI of the master tape to be telecast.[59] This method of captioning entails a labor intensive process to ensure that the captions are placed precisely where the corresponding audio appears and then locked into the proper position on the program tape. The captioners must ensure that the captions will appear at precisely the right moment in a precise location on the screen.[60] This type of captioning is used for feature films and many prerecorded entertainment programming, including prime time series and children's programs.[61] Estimates of the cost of this type of captioning range from $800 to $2500 per hour.[62]

19. A variation of this method is used for prerecorded programming such as daytime dramas and late night entertainment shows, where there are only a few hours between taping and airing and the final edits for the program are not completed until close to air time.[63] Although these captions are prepared in advance of the time that the program is aired, they are not encoded onto the program tape, but rather are transmitted with the program at the time it is aired. These captions are less precisely synchronized than off-line captions, and are rolled from the bottom of the screen rather than appearing at precise locations on the screen.

20. For live, unscripted programming, such as news, public affairs, sports, or awards shows, "real time" or "live captioning" is often used. Under this method, a specially trained

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[58] *Report*, FCC 96-318 ¶¶ 46-55.

[59] NBC Comments at 2; Capital Cities/ABC Comments at 4.

[60] CBS Comments at 10-11.

[61] *Id.* at 10.

[62] CBS Comments at 11; Capital Cities/ABC Comments at 7; Schwartz, Woods & Miller Comments at 10. *See also Report,* FCC 96-318 ¶ 47.

[63] CBS Comments at 11-12.

"stenocaptioner" transcribes the audio portion of the live program as it airs.[64] The captioner's computer is linked to the telecast operation center and the captioning material is created for telecast in "real time." Due to the transcription and computer processing required, real time captioning appears on the screen about three seconds after the corresponding audio content.[65] The cost of real time captioning for live programming is estimated to be between $120 and $1200 an hour.[66]

21. Another method of captioning live programming is electronic newsroom ("ENR") captioning, in which the captions come from the text in the station's news script computers. Only text transmitted from the scripting computers onto the teleprompters is captioned. Therefore, unscripted material, such as live reports from the field, reports of breaking stories, much sports and weather reporting, and ad libs and banter among the anchors that does not appear on the teleprompters, is not captioned.[67] The electronic newsroom captioning method is commonly used for local broadcast station newscasts. ENR captioning is virtually cost free once the equipment and software are purchased. The cost of installing ENR capability is generally estimated to be between $2500 and $5000.[68]

22. Captions often must be reformatted when programming is rebroadcast or distributed by a subsequent video provider. For a secondary use, a program may be edited to fit a time period that is different from the original one and commercials may need to be inserted. This editing can change synchronization of the captions and make reformatting necessary.[69] If parts of the program are removed or rearranged, the captions must be removed or rearranged accordingly.[70] The cost of reformatting is approximately one fourth that of the original captioning, or approximately $400 to $800 for a full length movie.[71] Estimates of reformatting

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[64] Stenocaptioners are trained as court reporters. They also require additional training to obtain the skills needed to report the verbatim speech, use correct spelling, syntax and grammar, and understand what it said. *See Report*, FCC 96-318 ¶ 50 n.95.

[65] NBC Comments at 2; Capital Cities/ABC Comments at 4; CBS Comments at 13.

[66] *See, e.g.,* ALDA Comments at 5; Caption Colorado Comments at 1, 3; NAD Comments at 27-28; A & E Comments at 15; CBS Comments at 28. *See also Report,* FCC 96-318 ¶ 48.

[67] Capital Cities/ABC Comments at 4; CBS Comments at 17.

[68] NAB Comments at 4-5, n.7; Capital Cities/ABC Comments at 7; CTA Comments at 5. *See also Report*, FCC 96-318 ¶ 51.

[69] Caption Database Comments at 3.

[70] PBS Comments at 3.

[71] ALDA Comments at 3; Caption Database Comments at 3-4.

costs generally range between $350 and $450 per hour, depending on the amount of editing,[72] although it is reported that the cost of reformatting can be as high as $750.[73]

F. Available Captioning Resources

23. As we indicated in our July 29, 1996, Report to Congress, off-line captioning resources appear to be more available than real-time captioning resources. There are more than 100 suppliers of closed captioning services.[74] In its comments, the National Captioning Institute ("NCI") states that "dozens" of firms currently offer captioning services,[75] which it believes constitute an adequate number of captioning firms to meet current demand at reasonable prices.[76] Media Captioning Service ("MCS"), however, alleges that the supply of captioning services is oligopolistic, claiming that three dominant firms have captured the majority of the business.[77]

24. Availability of real time captioning resources appears more limited. Based on information from the National Court Reporter's Association which listed 83 members who are real-time captioners in the Spring of 1996, VITAC estimates that there are likely to be only about 100 real time captioners nationwide today.[78] NCI also notes the limited supply of real time captioners, contending that significant amounts of on line captioning cannot normally be supplied on short notice.[79] Alternatively, MCS estimates that there may be only 500 people in the industry at present, although it notes that there is a growing pool of talented real time captioners.[80]

25. Caption Colorado filed comments that also indicate real time captioning services may be growing. This caption house reported that it employs 23 stenocaptioners across the country, with the capacity to provide 23,000 to 35,000 hours of news per year, and projected

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[72] A&E Television Networks ("A&E") Comments at 15.

[73] NCTA Comments at 15.

[74] WGBH Educational Foundation ("WGBH") Comments at 20; Media Captioning Services ("MCS") Comments at 5. Lists of suppliers of closed captioning are provided in the NAD Comments, Attachment G, and CTA Comments, Exhibit B.

[75] NCI Comments at 3.

[76] *Id.* at 5. However, there are six major suppliers of captioning. NCI and WGBH/The Captioning Center are both not-for-profit providers. VITAC, Media Captioning Services, Captions, Inc. and Real-Time Captions, Inc. are commercial suppliers. Capital Cities/ABC Comments at 7.

[77] MCS Comments at 5. According to MCS, the three firms are NCI, WGBH and VITAC. *Id.* at 3.

[78] VITAC Reply Comments at 1.

[79] NCI Comments at 5-6.

[80] MCS Comments at 5.

potential growth over 18 months to provide 484,000 hours of real time stenocaptioning per year. Caption Colorado claims the reduction in litigation and related discovery has reduced the demand for court reporters, thus increasing the pool of potential stenocaptioners.[81]

III. CLOSED CAPTIONING REQUIREMENTS

A. Responsibility for Captioning

1. Background

26. In order to implement any closed captioning requirements that we may adopt, we must determine where the responsibility lies for ensuring that video programming is closed captioned, and which parties shall be required to comply with those requirements. Section 713(b)(1) focuses on the result that programming be closed captioned, rather than who is responsible for accomplishing this goal, while Section 713(b)(2) refers to both video programming providers and program owners as being responsible for captioning of library programming.

27. Broadcast, cable, wireless and DBS commenters all generally agree that the responsibility for captioning of prerecorded programming should be placed at the production source, often noting that it would be inefficient and burdensome to require that captions be added at the distribution level.[82] This position is consistent with the House Report which states: "It is clearly more efficient and economical to caption programming at the time of production and to distribute it with captions than to have each delivery system or local broadcaster caption the program."[83] In contrast, the National Congress of the Jewish Deaf ("NCJD") supports placing the responsibility for captioning on providers, noting that providers control what actually goes out over the airwaves.[84] The National Association of the Deaf ('NAD") and Telecommunications for the Deaf ("TCD") also assert that providers should be responsible, analogizing responsibility for captioning with our rules for telecommunications relay service ("TRS"), which place the responsibility for providing service on the carriers.[85] Other commenters representing persons with

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[81] Caption Colorado Comments at 7-8.

[82] *See, e.g.,* NBC Comments at 12; WCA Comments at 5; CBS at 21-22; NAB Comments at 8; HBO Comments at 12.

[83] House Report at 114.

[84] NCJD Comments at 3.

[85] NAD Reply Comments at 2-5; TCD Comments at 4; 47 C.F.R. § 64.604.

hearing disabilities state that the responsibility for captioning must be shared by video programming providers and programming producers.[86]

2. *Request For Comment*

28. We propose that the responsibility for compliance with our closed captioning requirements should be placed on video programming providers, which we define as all entities who provide video programming directly to a customer's home, regardless of the distribution technologies employed by such entities. We believe that the programming providers are in the best position to ensure that the programming they distribute is closed captioned because of their role in the purchasing of programming from producers. For example, a provider can refuse to purchase programming that is not closed captioned. We also believe that the direct link between consumers and their video providers is an important consideration for ensuring compliance with our rules. We seek comment on this view. Commenters should address the possible effect such a rule would have on video programming providers. Commenters who disagree with our proposal should discuss, in detail, specific alternatives that would achieve our principal goal of increasing the availability of closed captioned programming. Commenters should also address the effect that our proposal might have on the diversity of available programming as well as the availability of closed captioned programming.

29. We note that the language of Section 713 refers to "program providers and owners" and may have been intended to provide the Commission with jurisdiction over other parties in the production and distribution chain.[87] We believe that a number of parties could be the program owner, including the producer, copyright holder, syndicator or distributor, and request comment on determining who is the owner of a program. We seek comment on the feasibility of having program owners and providers share responsibility for compliance obligations with our closed captioning rules.

30. Although we propose placing compliance obligations on video programming providers, we recognize that, from a practical standpoint, captioning at the production stage is often the most efficient manner to include closed captioning with video programming.[88] Thus, we anticipate that our rules will result in video programming providers incorporating such requirements into their contracts with video producers and owners, regardless of which party has

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[86] *See, e.g.*, ALDA Comments at 7-8; No. Virginia Resource Center for Deaf and Hard of Hearing Persons ("NVRC") Comments at 5; Dominick Comments at 5-6.

[87] See Sections 713(a), 713(b)(2) and 713(d)(1), (d)(2), (d)(3). The House report defines the term "provider" as "the specific television station, cable operator, cable network or other service that provides programming to the public." House Report at 114.

[88] The House Report also notes "[i]t is clearly more efficient and economical to caption programming at the time of production and to distribute it with captions than to have each delivery system or local broadcaster caption the program." House Report at 114.

the obligation to comply with our rules. We seek comment on this view and its effect on the implementation of closed captioning requirements. Specifically, we seek comment from providers and distributors who currently include captioning as a contractual delivery requirement for their programming regarding their experiences in obtaining captioning in this manner. Has including captioning as a delivery requirement been met with opposition by program producers, and if so, how have parties resolved such disputes? Has this requirement limited the program options available to these providers and distributors, i.e., is the pool of producers who are able or willing to comply with the requirement limited? We also seek comment on whether there are any anomalous situations created by our proposal to place the responsibility for compliance with our closed captioning rules on video programming providers.

B. Obligations as to Non-Exempt Programming - Transition Rules for New Programming

1. Background

31. Although certain types of programming or program providers may be exempt from the obligation to include closed captioning, the basic thrust of Section 713 is that programming shall, in general, be captioned.[89] The statute does, however, make a distinction between newly published and previously published material. Section 713(b) requires the Commission to adopt rules to ensure that:

> (1) video programming first published or exhibited after the effective date of such regulations is fully accessible through the provision of closed captions, except as provided in subsection (d); and
>
> (2) video programming providers or owners maximize the accessibility of video programming first published or exhibited prior to the effective date of such regulations through the provision of closed captions, except as provided in subsection (d).

32. In response to the *Notice of Inquiry*, commenters provided recommendations regarding the regulation of closed captioning.[90] Commercial broadcast and cable television networks would clearly prefer to maintain the status quo with regard to captioning of all programming, new and old. For example, HBO asserts that "marketplace forces have proved to be a significant motivator to the provision of closed captioning," and there is thus no need for government intervention to mandate captioning requirements.[91] In contrast, NCI points out that

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[89] *See* Sections III D, E, F *infra*.

[90] *See Notice of Inquiry*, 11 FCC Rcd at 4924-4928 ¶¶ 25-36.

[91] HBO Comments at 11-12.

the hopes of greater voluntary commitment to captioning by video providers after passage of the TDCA have not been fully realized.[92]

33. NAB has suggested that our objective should be "ensuring access by hearing-impaired persons to a broad range of video programming and information," which NAB claims can be achieved even if certain older programs or programs with a small audience remain uncaptioned.[93] NCTA claims that many cable networks provide programming 24 hours a day, seven days a week, which amounts to much more programming than the broadcast networks, and states that these and other "unique" situations of the cable industry should be taken into account in mandating captioning requirements.[94] We note, however, that this argument ignores the fact that many cable networks cycle their programming, rebroadcasting programs several times over the course of a month or season, which should significantly decrease the actual number of hours of programming to be captioned on an annual basis.

34. At the very least, providers want broad discretion in making captioning decisions, both in the types of programs which will be captioned[95] and the method of captioning used for different types of programming.[96]

35. Despite their preference that captioning efforts remain voluntary, most providers acknowledge that the 1996 Act requires captioning of new programming, and generally support a phase-in approach, though they do not offer specific transition recommendations. For example, NBC asserts that mandatory requirements "must be phased-in over a long enough period to allow the market to adjust and respond to new and increased demand."[97] NCTA recommends that full captioning of new programming, with exceptions for "textual, interstitial and short form programming," be achieved over a multi-year period, in percentage increments.[98] The Association of Local Television Stations ("ALTS") advocates a requirement that programming furnished with captions be delivered to consumers with captions intact immediately, but maintains that captioning of locally-produced programming should be achieved on a phased-in basis, taking into account costs and other burdens.[99]

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[92] NCI Comments at 3.

[93] NAB Comments at 7-8.

[94] NCTA Comments at 4-8, 18-19.

[95] CBS Comments at 4-5; MPAA Comments at 3-5.

[96] NBC Comments at 12; CBS Comments at 22-23

[97] NBC Comments at 11.

[98] NCTA Comments at 23-25.

[99] ALTS Comments at 3.

36. Captioners generally did not comment on the need for a transition period to full captioning of new programming. Only MCS refers to the need for a transition to full captioning of all programming, noting that providers with greater financial resources and who currently have significant levels of captioned programming will need less of a phase-in period than smaller providers.[100]

37. Although most of the commenters representing persons with hearing disabilities indicate a preference for the required captioning of as much programming as possible, as soon as possible, many recognize that it will be difficult to caption all programming immediately.[101] Several commenters suggest that priority be given to certain types of programming first, gradually adding categories and percentages of captioned programming until the requirements of the 1996 Act are met. Typically, emergency broadcasts, news reports, local/regional programs, and educational programming are cited as being of higher priority for captioning than entertainment and other programming.[102]

38. Many commenters offered general proposals for captioning deadlines for new programming. These proposals offer suggestions on how to prioritize closed captioning in order to require the captioning of programming that appears to be most important and attract the largest audiences first. For example, one commenter with a hearing disability suggests a requirement of "increments of hours over the next few years, with the increase in the number of captioned hours dependent on the annual gross income of the television companies. Additional captioned hours should be distributed from the most popular to least popular viewing times until all programs are captioned."[103] Another commenter proposes that the rules first mandate captioning for all news programs, followed by all national programming.[104] MCS argues that providers who have an impact on the public interest or general welfare, education and health of consumers should be subject to a more rapid transition to full captioning, particularly where such providers serve a larger market. MCS also suggests that cable providers that offer their programming nationally should have a phase-n requirement based on the per subscriber cost they project for captioning and their current levels of captioning, while providers who have offered captioning for some time and have a substantial portion of their current programming captioned with federal assistance should have a shorter timetable than smaller networks.[105]

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[100] MCS Comments at 10.

[101] *See, e.g.*, ALDA Comments at 10-11; Andrews Comments at 4-5; Consumer Action Network ("CAN") Comments at 13, 17-18; Cassidy Comments at 9; South Carolina Association of the Deaf Comments at 7.

[102] *See, e.g.*, MCS Comments at 10; Boston Chapter of Self Help for Hard of Hearing People ("Boston SHHH") Comments at 2; Cassidy Comments at 9.

[103] Andrews Comments at 4.

[104] Cassidy Comments at 9.

[105] MCS Comments at 10.

39. Where specific captioning deadlines after the effective date of our rules were suggested, they varied widely for different categories of programming. Among the proposals for deadlines by which specific programming should be required to include closed captioning are the following: (1) all previously captioned programming should be displayed with captions intact,[106] and all emergency broadcasts[107] and new programming, on the effective date of the rules;[108] (2) all premium cable programming (new or old),[109] all major networks and premium cable programming,[110] and real time captioning of all emergency announcements and local news within 90 days of the effective date;[111] (3) all new programming within six months of the effective date;[112] (4) all news reports[113] and all currently uncaptioned reruns within one year of the effective date;[114] and complete captioning of all new programs not subject to the undue burden exemption within two years of the effective date.[115]

2. *Request For Comment*

40. We do not believe that it is practical to mandate immediate captioning of all non-exempt video programming. We recognize that certain limitations exist, such as the number of available captioners and captioning services, the costs of captioning, and the effect that immediate implementation of mandatory captioning rules might have on the continued availability of certain types of video programming. In addition, given the plain language of the statute, appropriate exemptions, undue burden arguments and pre-existing contract considerations must be taken into account in crafting any rules that establish a deadline by which new programming must be captioned. Thus, we believe it appropriate to establish a reasonable transition period that will result in the amount of video programming with closed captioning increasing over a period of time until the full video accessibility for new programming mandated by Section 713(b)(1) is reached.

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[106] NAD Comments at 35; ALDA Comments at 10; American Society for Deaf Children ("ASDC") Comments at 4; Dominick Comments at 6.

[107] Boston SHHH Comments at 2.

[108] ALDA Comments at 10; Dominick Comments at 6.

[109] NAD Comments at 36; ASCD Comments at 4; NCJD Comments at 4.

[110] Pickell Comments at 5.

[111] ALDA Comments at 11; Dominick Comments at 6.

[112] NCJD Comments at 5.

[113] Boston SHHH Comments at 2.

[114] ALDA Comments at 10; Dominick Comments at 6.

[115] NAD Comments at 37; ASCD Comments at 4.

41. We propose a transition schedule of eight years that will phase in captioning of all non-exempt new programming by requiring an additional 25% every two years. In other words, at the end of two years after the effective date of our rules, 25% of non-exempt new programming must be closed captioned; 50% after the end of four years; 75% after the end of six years; and 100% at the end of eight years. Alternatively, we seek comment on whether the phase in schedule be completed over a ten year period, with 25% after three years, 50% after five years, 75% after seven years, and 100% after ten years.

42. These proposals will provide program providers, owners, and producers significant discretion regarding what will be captioned to meet the requirements and how to use the funding available for captioning. We believe this approach is preferable to one in which the Commission specifies precisely what types of programming needs to be captioned by when. Providers have access to information, such as advertising revenues or captioning sponsorships available for specific programs or programming day parts, that may influence the choice of what programming gets captioned first. Further, program providers are the most direct link to the consumer and are in a better position than the Commission to determine what should be captioned first. We request comment on this proposal. While we propose to give program providers and owners flexibility in determining which programs to caption in order to comply with each stage of the implementation schedule, market forces alone may not be sufficient to ensure that the closed captioning of some types of public interest programming, which may for various reasons be less cost effective to close caption, is not delayed until the final stages of the implementation schedule. Accordingly, we seek comment on whether there are certain types of programming, (i.e., live local news or public affairs programming) for which we should specify an earlier implementation schedule.

43. With respect to MVPDs, we propose to apply the percentages of programming that must be captioned on a system-wide basis. Under this approach, for example, a cable operator would be required to transmit a total of 25% of all the new, non-exempt programming on its cable system with closed captions by the end of the first benchmark period. We believe that this would make possible a more rational, market driven allocation of captioning resources during the transition process. We note, however, that under this approach, a cable operator, for example, could choose to transmit one particular cable network completely captioned, while transmitting three others with no captioning. Also, it might be possible that a cable system could meet its obligation solely by passing through the captioned programs of the broadcast stations it carries. We seek comment on these and other effects of this proposal, and request comment on whether the effects may differ among the various MVPDs.

44. Alternatively, we seek comment on whether the percentages of programming that must be captioned should apply to each program service or channel transmitted by an MVPD. Further, we seek comment on whether, if a broadcast station is retransmitted by an MVPD, compliance with our rules should be the responsibility of the MVPD offering the service directly to the subscriber or the broadcast station programming the channel? We seek comment on similar situations where responsibility for compliance with our proposed closed captioning requirements may rest with more than one video programming provider. We also ask that

commenters address the manner in which such obligations should be shared by various providers.

45. We seek comment on whether the determination that a percentage requirement has been met should be based on the amount of programming with captioning that has been shown over a month, or whether it should be based on a week or some other period of time. We recognize that there might be legitimate reasons why certain weeks might have less captioned programming than others. We seek comment on what the period of time should be if we apply the percentages on a system-wide basis, and what it should be if we apply the percentages on a per channel basis.

46. We recognize that, in some instances, the level of captioned programming shown already may exceed our proposals. We expect that this level of captioning will continue. We are also aware that a significant portion of funding for current levels of closed captioning comes from the federal government through Department of Education grants. The availability of such funding for captioning in the future is unclear and may affect the amount of closed captioning that can be provided.

47. Further, to the extent that programming delivered to program providers is closed captioned, and the provider does not edit the programming, we propose to require that the provider must transmit the programming with captions, regardless of whether the provider has already met any percentage requirement. Recognizing that program providers may edit prerecorded captioned programming, and that, therefore, the captioning would likely need to be reformatted, we seek comment on the costs of such reformatting and on whether we should also require that such programming be shown with captions.

48. We recognize that as distribution technologies increasingly convert to digital transmissions, there may be alternative means that become available for captioning programming. For example, it is possible that in the future technology may become available that captions programming through the receiver rather than requiring the transmission of closed captions. We seek comment on whether and if so, how, our captioning rules should be designed to take into account the technological changes that may take place as a result of digital conversion and on what steps we should take to ensure that our captioning rules do not impede the development of such new technologies.

49. We also note that some programming services use multiplexing to offer several programs at the same time. This practice may become more commonplace as there is increasing use of digital compression technology. We seek comment on how to determine closed captioning requirements for programming services offering multiple programs simultaneously. We also seek comment on any other situations, be they due to technological advances or otherwise, where compliance with our closed captioning requirements as proposed would be unworkable.

50. We seek comment on all of these proposals. We ask that commenters explain in detail why any of the proposals are not feasible and request specific alternatives. We recognize that our requirements could incorporate various factors including the type of programming, the

time of day the program is offered, audience size, the type of program provider, or number of households served by the provider (e.g., homes in the television market or homes passed by the cable system), or some combinations of these factors. We ask commenters to consider whether these factors should be incorporated into our phase in schedules or be the basis of alternative proposals. Commenters offering such suggestions should be specific and provide information to support their conclusions. Finally, commenters proposing alternative phase in schedules should bear in mind Congress' intent in enacting Section 713 to provide full accessibility to video programming for persons with hearing disabilities and consider the importance of such accessibility.

C. Obligations as to Non-Exempt Programming - Transition Rules for Library Programming

1. Background

51. Section 713(b)(2) requires that:

> (2) video programming providers or owners maximize the accessibility of video programming first published or exhibited prior to the effective date of such regulations through the provision of closed captions, except as provided in subsection (d).

We refer to programming first published or exhibited prior to the effective date of our closed captioning rules as "library programming."

52. Networks and program producers request that no mandatory captioning requirements be placed on programming libraries. They claim that attempts to caption such a vast amount of programming immediately would be prohibitively expensive, and that providers are more likely to archive such materials rather than pay to have them captioned.[116] CBS states that it would be unfair to require owners of vintage programming to assume the costs of captioning such programming now, as such costs were neither calculated into the purchase price nor considered in planning the future use of video libraries.[117] NBC recommends that captioning of libraries should only be required if the program was initially exhibited on a national broadcast or cable network, or if the program was captioned for its original exhibition.[118] NAB opposes

[116] CBS Comments at 37-38; HBO Comments at 13-14; Schwartz, Woods & Miller Comments at 13; NCTA Comments at 21.

[117] CBS Comments at 37-38.

[118] NBC Comments at 13.