FCC Third Report
and Order
Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C.

In the Matter of

Implementation of Section 309(j) of the Communications Act - Competitive Bidding

PP Docket No. 93-253

THIRD REPORT AND ORDER

Adopted: April 20, 1994
Released: May 10, 1994

By the Commission: Commissioner Barrett concurring and issuing a statement.

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I. INTRODUCTION

1. On August 10, 1993, the Omnibus Budget Reconciliation Act of 1993 (the "Budget Act") added a new section 309(j) to the Communications Act of 1934, as amended, 47 U.S.C. §§ 151-713 (the "Communications Act"). This amendment to the Communications Act gave the Commission express authority to employ competitive bidding procedures to choose from among mutually exclusive applications for initial licenses. The Commission's March 8, 1994 Second Report and Order establishes general rules and procedures and a broad menu of competitive bidding methods to be used for all auctionable services. We indicated in the Second Report and Order that in subsequent Reports and Orders we would set forth specific competitive bidding rules that would be applicable to individual services.

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1 Second Report and Order in PP Docket No. 93-253, FCC 94-61 (released April 20, 1994) ("Second Report and Order"). A list of the commenters in this proceeding is attached as Appendix A to the Second Report and Order.
2. In this Third Report and Order, we adopt service-specific rules for competitive bidding on licenses to be awarded for Personal Communications Services in the 900 MHz band ("narrowband PCS"). Because of the significant interdependence among narrowband PCS licenses and the relatively high expected value of such licenses, we will award most narrowband PCS licenses through a sequence of simultaneous multiple round auctions. However, we may alternatively use oral sequential or single round sealed bidding to award certain narrowband PCS licenses if we determine that the operational complexity or administrative costs associated with simultaneous auctions are excessive relative to the expected value of the licenses to be awarded. Generally, we will follow the payment and procedural rules adopted in the Second Report and Order in conducting narrowband PCS auctions. In addition, we adopt general procedural and processing rules for the narrowband PCS service based on Part 22 of the Commission's rules.

3. In this Report and Order we also adopt a system of preferences designed to enhance access to the narrowband PCS spectrum and achieve the congressional directive that our competitive bidding rules ensure the opportunity of small businesses and businesses owned by women and minorities (designated entities) to participate in the auction process and in the provision of narrowband PCS services. Specifically, we will allow small businesses to pay for certain narrowband PCS licenses in installments over the term of the license. In addition, we will afford a 25 percent bidding credit to businesses owned by women and minorities bidding on certain specified narrowband PCS licenses.

II. BACKGROUND AND AUCTION ELIGIBILITY

4. Section 309(j) of the Communications Act, as amended, permits auctions only where (1) mutually exclusive applications for initial licenses or construction permits are accepted for filing by the Commission, (2) the principal use of the spectrum will involve or is reasonably likely to involve the receipt by the licensee of compensation from subscribers in return for enabling those subscribers to receive or transmit communications signals, and (3) the objectives set forth in Section 309(j)(3) would be promoted.

5. In the Second Report and Order, we concluded that narrowband PCS as a class of service would satisfy the Section 309(j) criteria for auctionability. See Second Report and Order at ¶ 54-58. Specifically, based on the record in this proceeding and in GN Docket

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2 The Commission has allocated 3 MHz of spectrum in the 900 MHz band for narrowband PCS. Narrowband PCS encompasses mobile and portable radio communications services which can be used to provide a variety of paging and messaging services to individuals or businesses. See First Report and Order in Gen. Docket No. 90-314, 8 FCC Rcd 7162(1993), on reconsideration, Memorandum Opinion and Order in Gen. Docket No. 90-314, and ET Docket No. 92-100 and ET Docket No. 92-100, 9 FCC Rcd 1337 ("Narrowband PCS Order"), 47 C.F.R. Part 24, subpart D
No. 90-314 and ET Docket No. 92-100, we concluded that the principal use of narrowband PCS spectrum, considered as a class, was reasonably likely to involve licensees receiving compensation from subscribers in return for enabling those subscribers to transmit or receive communications.

6. In addition, we concluded that competitive bidding for narrowband PCS licenses will promote the objectives set forth in Section 309(j)(3). We determined that the use of competitive bidding to award narrowband PCS licenses as compared to other licensing methods will speed the development and deployment of new services to the public with minimal administrative or judicial delays, and encourage efficient use of the spectrum as required by Section 309(j)(3)(A) and (D). In this regard we noted that auctions would award licenses quickly to those parties who value them most highly and who are thus most likely to introduce service rapidly to the public. Id. at ¶¶ 57-58.

7. We also concluded that competitive bidding would recover for the public a portion of the value of the spectrum, as envisioned in Section 309(j)(3)(C), because the only direct monetary compensation the public currently receives for use of the spectrum is, with few exceptions, the application fee paid by most Commission applicants. Id.

8. Finally, in accordance with Section 309(j)(3)(B), we determined that competitive bidding, in conjunction with our allocation and service rules, will promote access to new narrowband PCS services and technologies and disseminate licenses among a wide variety of applicants by encouraging participation by all qualified bidders. In this regard, we have adopted a set of open competitive bidding procedures, a wide variety of license types and sizes, and a menu of preferences designed to increase opportunities for designated entities who might otherwise face entry barriers. Id. at ¶¶ 106-115 and 231-257.

III. COMPETITIVE BIDDING DESIGN

A. Narrowband PCS Rules

9. The spectrum allocation, service definition and technical rules for narrowband PCS were completed by the Commission in the Narrowband PCS Order. The Commission defined narrowband PCS as a "family of mobile and portable radio communications services which could provide services to businesses and individuals, and be integrated with a variety of competing networks." See Narrowband PCS Order at ¶¶ 35-37. We anticipated that advanced paging and messaging services would be the predominant narrowband services provided. Three megahertz of spectrum were allocated to narrowband PCS in three one megahertz bands (901-902 MHz, 930-931 MHz and 940-941 MHz). Two megahertz of this spectrum were divided into specific channels and will be available for immediate licensing. See 47 C.F.R. § 24.129 The remaining one megahertz of narrowband PCS spectrum will be channelized and licensed in the future as this service develops.
10. The two megahertz of narrowband PCS spectrum that is ready to be licensed has been divided into 50 kHz and 12.5 kHz channels. These channels are paired in various configurations (blocks) for individual licensing. Four different service areas have been defined: 492 Basic Trading Areas ("BTA"); 51 Major Trading Areas ("MTA"); 5 regional areas (made up of MTAs), which together comprise the nation; and a nationwide service area. There are a total of 3,554 narrowband PCS licenses to be issued. These licenses are as follows:

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<thead>
<tr>
<th></th>
<th>50/50 kHz (paired)</th>
<th>50/12.5 kHz (paired)</th>
<th>50 kHz (unpaired)</th>
<th>12.5 kHz (unpaired)</th>
<th>Total</th>
<th>Overall Total</th>
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<tr>
<td>Nationwide</td>
<td>5</td>
<td>3</td>
<td>3</td>
<td></td>
<td>11*</td>
<td>11*</td>
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<tr>
<td>Regional (5 Regions)</td>
<td>2</td>
<td>4</td>
<td></td>
<td></td>
<td>6</td>
<td>30</td>
</tr>
<tr>
<td>MTA (51)</td>
<td>2</td>
<td>3</td>
<td>2</td>
<td>4**</td>
<td>11</td>
<td>561</td>
</tr>
<tr>
<td>BTA (492)</td>
<td>2</td>
<td></td>
<td>4**</td>
<td>6</td>
<td>2,952</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>3,554</td>
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* Only 10 of the 11 nationwide narrowband PCS licenses are available to be auctioned because one applicant, Mobile Telecommunications Inc. ("Mtel"), was awarded a pioneer's preference for one of the unpaired 50 KHz licenses. Accordingly, this license will not be subject to competing mutually exclusive applications.

** Eligibility for these licenses is restricted to incumbent paging licensees authorized under Part 22 or Part 90 of our rules as of June 24, 1993. To be eligible, the existing paging licensee must operate at least one base station in the MTA or BTA for which it is applying for a paging response channel. In addition, these channels are limited to mobile-to-base transmissions and may be used only in a paired manner with existing paging channels to provide mobile-to-base station communications. See 47 C.F.R.

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5 BTAs and MTAs are based on the Rand McNally 1992 Commercial Atlas and Marketing Guide, 123rd Edition, at pp. 38-39. See 47 C.F.R. § 24.102. The nationwide service area includes the fifty states, the District of Columbia, American Samoa, Guam, Northern Mariana Islands, Puerto Rico, and the United States Virgin Islands. See 47 C.F.R. § 24.102 (a). Operations in markets or portions of markets which border other countries, such as Canada or Mexico will be subject to ongoing coordination arrangements with the neighboring countries. See 47 C.F.R. § 24.129(e)
§24.130.

11. Except with respect to the 12.5 kHz unpaired licenses reserved for the upgrade of existing paging systems, narrowband PCS licensees will be permitted to aggregate up to three licenses in any geographic area. Incumbent paging licensees are permitted to obtain up to two of the 12.5 kHz unpaired licenses in any geographic area. Narrowband PCS Order at ¶ 26.

B. General Competitive Bidding Rules

12. The Second Report and Order established the criteria to be used in selecting which auction design method to use for each particular auctionable service. Generally, we concluded that awarding licenses to those parties who value them most highly will foster Congress’ policy objectives. In this regard, we noted that since a bidder’s ability to introduce valuable new services and to deploy them quickly, intensively, and efficiently increases the value of a license to that bidder, an auction design that awards licenses to those bidders with the highest willingness to pay tends to promote the development and rapid deployment of new services and the efficient and intensive use of the spectrum. In articulating our auction design principles we further stated that: (1) licenses with strong value interdependencies should be auctioned simultaneously; (2) multiple round auctions, by providing bidders with information regarding other bidders’ valuations of licenses, generally will yield higher revenues and more efficient allocations of licenses, especially where there is substantial uncertainty as to value; and (3) because they are relatively expensive to implement and time-consuming, simultaneous and/or multiple round auctions become less cost-effective as the value of licenses decreases. See Second Report and Order at ¶ 69.

13. Based on the foregoing, we concluded that where the licenses to be auctioned are interdependent and their value is expected to be high simultaneous multiple round auctions would best achieve the Commission’s goals for competitive bidding. See Second Report and Order at ¶¶ 109-111. We indicated that compared with other bidding mechanisms, simultaneous multiple round bidding will generate the most information about license values during the course of the auction and provide bidders with the most flexibility to pursue back-up strategies. Thus, we concluded that simultaneous multiple round bidding was most likely to award interdependent licenses to the bidders who value them the most. We also indicated that this method will facilitate efficient aggregation of licenses across spectrum bands thereby resulting in vigorous competition among several strong service providers who will be able rapidly to introduce a wide variety of services highly valued by end users. Second Report and Order at ¶ 106. In addition, we concluded that because of the superior information and flexibility it provides, this method will be more likely than other auction designs to yield greater revenues. Thus, we found that the use of simultaneous multiple round auctions would generally be preferred. Id.

14. The other major factor leading us to select simultaneous multiple round auctions as our preferred auction method was the value of the licenses to be auctioned. Because simultaneous multiple round bidding is more administratively complex and costly both for
bidders and the FCC than other auction methods we may select, we indicated that we would only use this auction design where license values are interdependent and the expected value of the licenses to be auctioned is high relative to the costs of conducting a simultaneous multiple round auction.

15. **Circumstances Leading to Choice of Other Designs.** In the Second Report and Order we stated our intention to tailor the auction design to fit the characteristics of the licenses to be awarded. We noted that simultaneous multiple round auctions may not be appropriate for all licenses. Where there is less interdependence among licenses, there is also less benefit to auctioning them simultaneously. We explained that when the values of particular licenses to be auctioned are low relative to the costs of conducting a simultaneous multiple round auction, we may consider auction designs that are relatively simple, with low administrative costs and minimal costs to the auction participants. For example, with large numbers of low value licenses we noted that we may decide that it is preferable to implement a low cost auction method such as single round sealed bidding to minimize cost and expedite the licensing process. We also noted that the Commission may wish to consider a single round of bidding in certain auctions where eligibility requirements limit participation to few bidders. See Second Report and Order at ¶¶ 112-113.

C. **Competitive Bidding Design for Narrowband PCS Licenses**

16. In this section, we adopt simultaneous multiple round auctions as our primary auction methodology for narrowband PCS licenses. We believe that, for most narrowband licenses this method will best meet Congress' goals in enacting the competitive bidding legislation. However, because the licenses to be awarded in the narrowband PCS service vary in terms of expected value and interdependence, we have determined that no single competitive bidding design is optimal for all licenses. Moreover, Congress directed us to "design and test multiple alternative methodologies under appropriate circumstances." See Section 309(j)(3). For these reasons, we will adopt several auction designs that may be selected under appropriate circumstances to auction narrowband PCS licenses. We specify below the various competitive bidding design methods that we may select to award particular categories of narrowband PCS licenses as well as the license characteristics that will favor their use. When we announce individual auctions to award specific groups of narrowband licenses, we will issue a Public Notice detailing the competitive bidding design and procedures to be used.

17. **Simultaneous Multiple Round Auctions.** Commenters who specifically address narrowband PCS auctions generally favor simultaneous multiple round bidding. American Paging Inc. ("API") supports this auction design for narrowband PCS because it provides continuous information to bidders about license values. According to API, this information is crucial to small- and mid-sized firms in developing bidding strategies for interdependent licenses. API also maintains that simultaneous multiple round bidding is essential to allow bidders to express the true value of interdependent licenses given different aggregation strategies, and will thus, ensure that licenses are awarded efficiently to the highest valued
user. See ex parte filing of API (February 24, 1994). Similarly, PacTel Corporation ("PacTel") argues that simultaneous multiple round bidding is appropriate for narrowband PCS licensing because of the high value of most narrowband PCS licenses and the significant interdependence between spectrum blocks and geographic regions. See comments of PacTel at 19.

18. We agree with commenters who support simultaneous multiple round bidding for awarding most narrowband PCS licenses. Based on the record in this proceeding, as well as our analysis of the Office of Management and Budget and the Congressional Budget Office estimates of total PCS revenues, we expect the value of most narrowband PCS licenses to be sufficiently high to warrant the use of simultaneous auctions. We further believe that the value of most narrowband PCS licenses will be significantly interdependent because of the desirability of aggregation across spectrum blocks and geographic regions and because there is a high degree of substitutability among licenses with the same amount of spectrum and covering the same geographic area. Therefore, we conclude that simultaneous multiple round bidding will be most likely to award narrowband PCS licenses to bidders who value them the most highly and who are most likely to deploy rapidly new narrowband PCS technologies and services, promote the development of competition for the provision of those and other services, and thus foster economic growth.

19. By facilitating efficient (but not anticompetitive) aggregation of licenses, we believe that simultaneous multiple round bidding will allow bidders to express the full value of the interdependency among licenses. Moreover, simultaneous multiple round bidding will provide bidders with the opportunity to pursue back-up strategies that enable them most efficiently to obtain the license combinations which satisfy their service needs. Finally, given that narrowband PCS is a new service with many inherent uncertainties, we conclude that simultaneous multiple round bidding is desirable because of the continuous information it provides bidders during the course of the auction which, in turn, should result in increased revenues for the government.

20. We recognize, however, that simultaneous multiple round bidding may involve a greater degree of complexity than other competitive bidding methods, and that it may present greater operational difficulties for both the FCC and for bidders. Therefore, where license values are expected to be relatively low, bidder participation is expected to be limited or where the interdependence of licenses is less significant, we may decide to use alternative auction methods. In addition, we may select an alternative auction method if, as we gain experience with auctions, we determine that simultaneous multiple round auctions are too administratively complex and costly to implement. In selecting the auction method for each narrowband PCS auction, we will seek to balance the advantages of more sophisticated auction methods, such as simultaneous multiple round bidding, with the greater complexity

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and cost they may entail for both the FCC and bidders.

21. **Oral Sequential and Single Round (Sealed Bid) Auctions.** If, as a result of our auction experience, we determine that the operational costs or complexities associated with simultaneous multiple round auctions outweigh their benefits, we may decide instead to employ either oral sequential auctions or single round sealed bid auctions. In an oral sequential auction, licenses are put up for bid one at a time, so that bidding ends on one item before it begins on the next item. Oral sequential auctions generate valuable information about earlier auctioned licenses, which can assist bidders in valuing later auctioned licenses. However, if license values are interdependent oral sequential auctions are less likely than simultaneous auctions to award interdependent licenses to the parties who value them the most and to aggregate licenses efficiently, because bidders for licenses that are auctioned early must bid with less information about the value of licenses to be auctioned later, and have less opportunity to pursue backup bidding strategies. Nonetheless, because oral sequential auctions are generally less complex, and costly both for the FCC and for potential bidders, they may be appropriate to use where the expected value of the narrowband PCS licenses to be auctioned is low relative to the costs of conducting a more complex auction or where interdependence is less significant.

22. We may find, for some narrowband PCS licenses that even the lesser cost and complexity of oral sequential auctions are not justified by the revenues these licenses would be expected to generate. In such cases, we may choose to award licenses by single round sealed bidding where bids for all licenses are submitted simultaneously and the high bidder for each license is determined after a single round of bidding. Single round sealed bidding has the principal advantage of being relatively simple for bidders to understand and inexpensive for the FCC to administer and also can generally be completed fairly rapidly. However, because single round sealed bidding provides less information and flexibility to bidders than either simultaneous or sequential auctions, we will generally use this method only where there is less interdependence among individual licenses or groups of licenses and the expected value of the licenses to be auctioned is low relative to the cost of conducting a more complex auction. In addition, we may select this auction design where eligibility requirements limit participation to relatively few bidders.

23. **Combinatorial Bidding.** One commenter, PageMart Inc. ("PageMart"), indicated that the Commission should employ a system of combinatorial bidding for narrowband PCS licensing. In general terms, combinatorial bidding allows bidders to bid for multiple licenses as all or nothing packages.\(^5\) Combinatorial bidding can be implemented with either

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\(^5\) In combinatorial bidding, if a bid for a group of licenses exceeds the sum of the highest bids for the individual licenses that comprise the package, then the package bid would win. In the Second Report and Order we also indicated that we may institute a premium so that the combinatorial bid would win only if it exceeded the sum of the bids for individual licenses by a set amount. See Second Report and Order at ¶ 114.
simultaneous or sequential auction designs. PageMart argues that combinatorial bidding for narrowband PCS licenses is necessary to enable bidders to assemble easily national and supra-regional service areas. Without combinatorial bidding, PageMart maintains, insufficient national and supra-regional licenses will be available, thus significantly limiting the ability of all but the largest firms to compete in these markets. See reply comments of PageMart at 16.

In addition, PageMart argues that only if firms are permitted to submit combinatorial bids can they adequately express value interdependencies without corresponding distortions in bidding behavior. In this regard, PageMart suggests that in the absence of combinatorial bidding, bidders assembling service areas on an MTA-by-MTA or region-by-region basis will, in many cases, cause the licenses captured early to be undervalued and licenses won later to be overvalued. See reply comments of PageMart at 19.

24. Although we recognized in the Second Report and Order that there were significant benefits associated with combinatorial bidding, especially in terms of efficient aggregation of licenses, we concluded that simultaneous multiple round auctions offer many of these same advantages without the same degree of administrative and operational complexity and without biasing auction outcomes in favor of combination bids. See Second Report and Order at ¶¶ 101-105. Since simultaneous multiple round bidding is our preferred auction method for awarding narrowband PCS licenses, we think combinatorial bidding will be unnecessary in most narrowband PCS auctions. With respect to narrowband PCS licenses, we do not believe that the advantages of combinatorial bidding outweigh the disadvantages. While narrowband PCS licenses are likely to be worth more to some bidders as a part of a package, we believe that simultaneous multiple round bidding will provide these bidders with ample opportunity to express the value of interdependent licenses. Moreover, we conclude that there will not be any extreme discontinuity in value if some licenses in a package are not obtained. We believe that the opportunity to acquire licenses in after market transactions and the ability to withdraw bids (upon payment of the bid withdrawal penalty) will limit the risks associated with failing to successfully acquire all of the licenses in a desired package. Finally, we believe that the narrowband PCS allocation plan, which provides for 11 nationwide and 30 regional licenses, already addresses many of PageMart's concerns regarding insufficient numbers of national and supra-regional licenses. However, in circumstances where we do not use simultaneous multiple round bidding, we may permit combinatorial bidding.

D. Bidding Procedures

25. Grouping of Licenses. Whether we use our preferred approach of a sequence of simultaneous multiple round auctions or sequential individual auctions, the Commission must choose which licenses will be auctioned together. The importance of the choice of license groupings increases with the degree of interdependence among the individual licenses or groups of licenses to be auctioned. Grouping interdependent licenses together and putting them up for bid at the same time will facilitate awarding licenses to bidders who value them the most highly by providing bidders with information about the prices of complementary and substitutable licenses during the course of an auction. Accordingly, we will group
narrowband PCS licenses into the various simultaneous auctions by aggregating together those licenses exhibiting the greatest degree of interdependence so that there will be limited interdependence across groups.

26. Choosing which licenses to auction simultaneously requires a judgment about the degree of interdependence, i.e., the extent to which the amount bidders are willing to pay for one license depends on the price of another. Licenses may be interdependent either because they are substitutes or because they are complements. With substitutes, the lower the price of one license, the less a bidder will be willing to pay for another. With complementary licenses, on the other hand, the lower the price of one license, the more a bidder will be willing to pay for another. This is true because generally complementary licenses are worth more as part of a package than individually. For example, bidders are likely to be willing to pay more for two geographically contiguous PCS licenses than two equivalent non-contiguous licenses, and a single bidder may be willing to pay more for the two licenses than would two separate bidders.

27. Based on the foregoing, we will auction narrowband PCS licenses in the following license groupings. We will award all nationwide, regional and MTA (other than MTA response channels) licenses through a sequential series of simultaneous auctions. In this regard, to maximize the information available to bidders and increase gradually the complexity of the narrowband PCS auctions as we gain more auction experience, we will begin by auctioning the ten nationwide narrowband licenses in one simultaneous multiple round auction. After the nationwide narrowband PCS auction is complete, we will auction the five regional blocks (30 licenses) together in one simultaneous multiple round auction. We subsequently will conduct another simultaneous multiple round auction for all of the 50/50 kHz paired, 50/12.5 kHz paired and the 50 kHz unpaired MTA licenses (357 licenses). Simultaneous multiple round auctions are appropriate for each of these license groupings because of the relatively high value and significant interdependence of the licenses. In each case, the licenses are complements as well as substitutes, and thus their values are highly interdependent. They are complements because license aggregation enables bidders to realize

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6 However, as we gain auction experience we may determine that an alternative auction method or license grouping is more appropriate. Under these circumstances, as provided in the general procedural rules, we will announce before each auction the licenses to be auctioned and the type of competitive bidding method to be used, as well as the stopping rules and activity rules, if any, that will be used.

7 Alternatively, we may determine that, for reasons of operational or administrative simplicity, it would be preferable to auction these MTA licenses by region (there are approximately 112 MTA licenses in each region) in a series of simultaneous multiple round auctions (in which case we would also include the 12.5 kHz unpaired MTA licenses). Under these circumstances, we would auction all of the MTA licenses in a particular region before moving on to the next region.
certain economies of scale and, in the case of sub-national licenses, facilitates seamless roaming over wide areas, as well as aiding in the control of interference at license boundaries. These licenses are also substitutes because, to varying degrees, they can be used as alternatives in the provision of the same or similar services.

28. After auctioning the MTA licenses, we will hold another simultaneous multiple round auction for the 50/12.5 kHz paired BTA licenses (984 licenses). Although most of these licenses are expected to have relatively low values, individually they are highly interdependent, and their aggregate value (compared to the cost of conducting a simultaneous auction) is sufficiently high to justify a simultaneous multiple round auction. Using this approach will also enable the Commission to gain valuable experience conducting simultaneous multiple round auctions involving large numbers of licenses.

29. Finally, we will auction the 12.5 kHz unpaired MTA (204 licenses) and the 12.5 kHz unpaired BTA response channel licenses (1,968 licenses) in a single round sealed bid auction because their value is low relative to the cost of conducting other more complex auctions. Moreover, because only incumbent paging licensees are eligible to bid on these licenses, sealed bid auctions may help to reduce the chances of collusion among the limited number of bidders. In addition, the loss in efficiency from using single round bidding will be mitigated by the fact that bidders on these licenses will have access to information about license values from the simultaneous multiple round auctions that will precede the sealed bid auction. Under this auction method, however, bidders cannot be certain that they will be the high bidder on all of the licenses they seek to obtain because single round sealed bidding does not provide bidders with timely information about license values and bidders do not have the opportunity to increase their bid amounts during the course of the auction. Therefore, in this context we will allow bidders to bid on more licenses than they are eligible to be awarded under the existing aggregation limits, provided they specify in advance the order in which they wish to be awarded such licenses in the event that they are the high bidder on more licenses then they are permitted to hold. Bidder, however, will only be permitted to bid on response channel licenses for which they are otherwise eligible (i.e., they must operate at least one base station in the service area of the response channel for which they are applying).

30. **Bid Increments.** Where we use simultaneous multiple round auctions to award narrowband PCS licenses it is important to specify minimum bid increments. The bid increment is the amount or percentage by which the bid must be raised above the previous

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8 See 47 C.F.R. § 24.130 (a) (paging licensees may hold a maximum of two response channel licenses within the same geographic area). The Commission, however, will not designate a bidder the winning bidder on more licenses than it is eligible to hold. Under these circumstances, a high bidder will not be subject to the bid withdrawal penalty (discussed infra) for those additional licenses for which it is not designated the winning bidder.

9 Id.
round’s high bid in order to be accepted as a valid bid in the current bidding round. The application of a minimum bid increment speeds the progress of the auction and, along with activity and stopping rules, helps to ensure that the auction comes to closure within a reasonable period of time. Establishing an appropriate minimum bid increment is especially important in a simultaneous auction with a simultaneous closing rule. In that case, all markets remain open until there is no bidding on any license and a delay in closing one market will delay the closing of all markets.

31. Because we plan to use simultaneous multiple round auctions for most narrowband PCS licenses, we believe that it is necessary to impose a minimum bid increment to ensure that the narrowband PCS auctions conclude within a reasonable period of time. As we recognized in the Second Report and Order, it is important in establishing the amount of the minimum bid increment to express such increment in both a percentage and fixed dollar amount. See Second Report and Order at ¶ 126. This will ensure a timely completion of the auction even if bidding begins at a very low dollar amount. Accordingly, we may impose a minimum bid increment of 5 percent or $0.01 per pop per MHz, whichever is greater, in narrowband PCS auctions where multiple round bidding is used. Commenters addressing the issue generally supported a minimum bid increment of five percent. PacTel, for example, argues that this amount will provide a reasonable compromise between the goal of completing the auction quickly and that of revealing information about the distribution of valuations among bidders.\textsuperscript{10} Applying a $0.01 per pop per MHz minimum bid increment in addition to the percentage calculation we believe is appropriate to provide flexibility for a wide range of different license values and will ensure timely closure of auctions, even where bidding begins at a very low dollar amount.\textsuperscript{11}

32. PacTel also suggests, in the context of simultaneous auctions that the Commission should vary the bid increment, reducing it as the number of active bidders declines, in order to bring all markets to a close at approximately the same time. This would move the auction quickly at the beginning while still allowing smaller price movements as the auction nears a close. Such a refinement will also reduce the chances of ties by allowing bidders to express relatively small differences in license valuations.\textsuperscript{12} Accordingly, the Commission retains the discretion in narrowband PCS auctions to set and, by announcement before or during the auction, vary the minimum bid increments for individual licenses or groups of licenses over the course of an auction. We will most likely reduce the minimum bid increment only in the

\textsuperscript{10} Exhibit attached to PacTel Comments: Auction Design for Personal Communications Services. R. Preston McAfee, p. 16.

\textsuperscript{11} $0.01$ per-pop per MHz would represent almost three percent of the value of a license based on an extrapolation from the $10.6$ billion estimated value of the 120 MHz of broadband PCS spectrum. See Second Report and Order ¶ 177.

\textsuperscript{12} Where a tie does occur, the high bidder will be determined in the order the bids were received by the Commission. See Second Report and Order at ¶ 125.
later bidding rounds, as bidding begins to come to a close.\textsuperscript{13}

33. **Stopping Rules for Multiple Round Auctions.** We also noted in the Second Report and Order that with multiple round auctions a stopping rule must be established for determining when the auction is over. See Second Report and Order at ¶ 127. We identified three types of stopping rules that could be employed in simultaneous multiple round auctions: markets may close individually, simultaneously or a hybrid approach may be used. Under a market-by-market approach, bidding closes on each license after one round passes in which no new acceptable bids are submitted for that particular license. With a simultaneous stopping rule, bidding remains open on all licenses until there is no bidding on any license.\textsuperscript{14} Under this approach, all markets will close if a single round passes in which no new acceptable bids are submitted for any license. Using a hybrid approach, we may use a simultaneous stopping rule, along with an activity rule designed to bring the markets subject to the simultaneous stopping rule to a close within a reasonable period of time, for the higher value licenses. And for lower value licenses, where the loss from eliminating some back-up strategies is less, we may use simpler market-by-market closings. In the Second Report and Order we recognized that such a hybrid approach might simplify and speed up the auction process without significantly sacrificing efficiency or expected revenue. \textsuperscript{1d}

34. For narrowband PCS we believe that a simultaneous stopping rule is preferable for the nationwide, regional and MTA licenses, which are expected to have relatively high values and are fewer in number, which will reduce the complexity of implementing a simultaneous stopping rule. Since we intend to impose an activity rule (as discussed below at ¶ 37-41), we believe that allowing simultaneous closing of all markets will afford bidders flexibility to pursue back up strategies without running the risk that bidders will hold back their bidding until the final rounds. However, because of the large number of BTA licenses and their relatively low expected value, we may use either a hybrid stopping rule or allow markets to close individually in auctions for these licenses.\textsuperscript{15}

\textsuperscript{15} In oral sequential auctions the auctioneer may within its sole discretion establish and vary the amount of the minimum bid increment in each round of bidding.

\textsuperscript{14} This approach has the advantage of providing bidders full flexibility to bid for any license as more information becomes available during the course of the auction, but it may lead to very long auctions, unless an activity rule is imposed. Furthermore, such a stopping rule may be vulnerable to strategic delay by bidders seeking to impede closure of the auction.

\textsuperscript{15} However, if as we gain experience with auctions, we determine that a simultaneous stopping rule will be simpler to administer than either a hybrid or a market-by-market stopping rule, we may use a simultaneous stopping rule for the BTA licenses as well. Conversely, if as a result of our auction experience we conclude that a simultaneous stopping rule is too administratively complex, we may employ a market-by-market or hybrid stopping rule for the higher value narrowband licenses. We will announce by Public Notice before each auction the stopping rule that we will use.
35. In addition, we will retain the discretion to declare at any point in a simultaneous multiple round auction that the auction will end after one additional round (or some other specified number of additional rounds). This will prevent bidders from strategically delaying an auction by bidding on one license in order to delay the closing of bidding on all licenses. This will also ensure ultimate Commission control over the duration of the auction. Moreover, while we generally will provide bidders with a single business day to submit bids, and conduct one round of bidding each business day, we reserve the discretion to vary the duration of bidding rounds or the interval at which bids are accepted (e.g., run two or more rounds per day rather than one), in order to move the auction toward closure more quickly. We will be most likely to shorten the duration and/or intervals between bidding rounds where there are relatively few licenses to be auctioned, where the value of the licenses is relatively low or in early rounds to speed the auction process. Where license values are expected to be high or where large numbers of licenses are being auctioned we may increase the duration and/or intervals between bidding rounds. We will announce by Public Notice, and may vary by announcement during an auction, the duration and intervals between bidding rounds.

36. Activity Rules. As discussed above, in order to ensure that simultaneous auctions with simultaneous stopping rules close within a reasonable period of time, we believe that it is necessary to impose an activity rule to prevent bidders from waiting until the end of the auction before participating. Because simultaneous stopping rules generally keep all markets open as long as anyone wishes to bid, they also create an incentive for bidders to hold back until prices approach equilibrium before making a bid and risking paying a penalty for withdrawing. As noted above, this could lead to very long auctions. An activity rule is less important when markets close one-by-one because failure to participate in any given round may result in losing the opportunity to bid at all, if that round turns out to be the last.

37. In the Second Report and Order we adopted the Milgrom-Wilson activity rule as our preferred activity rule where a simultaneous stopping rule is used. See Second Report and Order at ¶¶ 144-145. Under the Milgrom-Wilson approach, bidders are encouraged to participate in early rounds by limiting their maximum participation to some multiple of their minimum participation level. Bidders are required to declare their maximum eligibility in terms of MHz-pops, and make an upfront payment equal to $0.02 per MHz-pop. (See discussion of upfront payments infra.) That is, bidders will be limited to bidding on licenses encompassing no more than the number of MHz-pops covered by their upfront payment. Under this approach, bidders will have the flexibility to shift their bids among any licenses for which they have applied so long as the total MHz-pops encompassed by those licenses does not exceed the number for which they made an upfront payment. Moreover, bidders will be able to secure the freedom to participate at whatever level they deem appropriate by making a sufficient upfront payment. To preserve their maximum eligibility, however, bidders would be required to maintain some minimum activity level during each round of the auction.

38. Under the Milgrom-Wilson proposal, the minimum activity level, measured as a fraction of the self declared maximum eligibility, will increase during the course of the
auction. Milgrom and Wilson divide the auction into three stages. During the first stage of the auction, a bidder is required to be active on licenses encompassing one-third of the MHz-pops for which it is eligible. The penalty for falling below that activity level is a reduction in eligibility. At this stage, bidders would lose three MHz-pops in maximum eligibility for each MHz-pop below the minimum required activity level. In other words, each bidder would retain eligibility for three times the MHz-pops for which it is an active bidder, up to the MHz-pops covered by the bidder’s upfront payment. In the second stage, bidders are required to be active on two-thirds of the MHz-pops for which they are eligible. The penalty for falling below that activity level would be a loss of 1.5 MHz-pops in eligibility for each MHz-pop below the minimum required activity level. In the third stage, bidders are required to be active on licenses encompassing all of the MHz-pops for which they are eligible. The penalty for falling below that activity level is a loss of one MHz-pop in eligibility for each MHz-pop below the minimum required activity level. Each bidder thus retains eligibility equal to its current activity level (1 times the MHz-pops for which it is an active bidder).

39. Finally, to avoid the consequences of clerical errors and to compensate for unusual circumstances that might delay a bidder’s bid preparation or submission on a particular day, Milgrom and Wilson recommend permitting each bidder to request and automatically receive a waiver of the activity rule once every three rounds. We believe that some waiver procedure is a critical element of the Milgrom-Wilson activity rule, since the Commission would not wish to reduce a bidder’s eligibility due to an accidental act or circumstances not under the bidder’s control.

40. We believe that the Milgrom-Wilson approach will best achieve the Commission’s goals of affording bidders flexibility to pursue back up strategies, while at the same time ensuring that simultaneous auctions are concluded within a reasonable period of time. Accordingly, we plan to impose such an activity rule in conjunction with a simultaneous stopping rule to award higher value narrowband PCS licenses. We intend, however, to use a simplified waiver procedure whereby bidders will be permitted five automatic waivers from the activity rule during the course of an auction. With respect to the 50/12.5 kHz paired BTA licenses to be awarded by simultaneous auction, we may determine that because of their lower expected value a market-by-market stopping rule is more appropriate, in which case no activity rule will be necessary. However, if a simultaneous stopping rule is used for these licenses we may select one of the simpler activity rules described in the Second Report and Order. Moreover, if as we gain experience with auctions, we determine that the Milgrom-

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16 The auction will move from stage one to stage two when, after three rounds of bidding, the high bid has changed on five percent or fewer of the licenses (measured in terms of MHz-pops) being auctioned. Stage three will begin when the high bid has changed on two percent or fewer licenses (measured in terms of MHz-pops) over three rounds.

17 Our rules allow the Commission to make any such modifications to activity rules as appropriate for a particular auction. The Commission retains the discretion to choose among
Wilson activity rule is too complicated or costly to administer, we may alternatively impose one of these less complex activity rules in auctions for larger narrowband PCS licenses as well. We will announce by Public Notice before each auction the activity rule that will be employed in that particular auction.

IV. PROCEDURAL, PAYMENT AND PENALTY ISSUES

A. Pre-Auction Application Procedures

41. In the Second Report and Order the Commission established general competitive bidding rules and procedures which we noted may be modified on a service-specific basis. As discussed below, we will follow the procedural, payment and penalty rules established in the Second Report and Order with certain minor modifications designed to address the characteristics of the narrowband PCS service. These rules are structured to ensure that bidders and licensees are qualified and will be able to construct systems quickly and offer service to the public. By ensuring that bidders and license winners are serious, qualified applicants, these rules will minimize the need to re-auction licenses and prevent delays in the provision of narrowband PCS service to the public. In addition, as we proposed Notice, we adopt general procedural and processing rules based on the Part 22 of the Commission’s rules.\(^9\)

42. Before each scheduled narrowband PCS auction the Commission, or pursuant to delegated authority, a Bureau, will release an initial Public Notice announcing the auction. This initial Public Notice will specify the license(s) to be auctioned and the time, place and

the following other activity rules, which are described more fully in the Second Report, on a case-by-case basis: (1) a Milgrom-Wilson rule with one or two stages rather than three, (2) a requirement that bidders be active on a single license in each round, (3) a rule that a bidder’s activity level remain within a single range throughout the auction (i.e., remain active on some percentage of the total pops-MHz covered by the upfront payment), (4) a rule that replaces the maximum allowed bidding levels in the Milgrom-Wilson rule with a bidding premium for exceeding those maximums, or (5) a combination of the foregoing rules. See Second Report and Order at ¶ 141.

\(^9\) Notice at ¶ 129. We have modified Part 22 as necessary to reflect the somewhat different way in which narrowband PCS is licensed. Our Part 22 rules, for example, contemplate the filing of a separate application for each base station. Under Part 24, however, licensees receive a market-wide license. Applications for individual sites will not be accepted. Thus, we have modified the Part 22 rules for clearing individual antenna sites and based the antenna clearance process on Section 97.15 of our rules (47 C.F.R. § 97.15). Similarly, we have decided that narrowband PCS licensees should maintain a list of all current base station locations in lieu of filing a separate application for each base station.
method of competitive bidding to be used, including applicable bid submission procedures, bid withdrawal procedures and penalties, stopping rules and activity rules and other important information. The initial Public Notice will also specify the filing deadline for short-form applications.

43. All bidders will be required to submit short-form applications on FCC form 175 by the date specified in the initial Public Notice. If the Commission receives only one application that is acceptable for filing for a particular license, and thus there is no mutual exclusivity, the Commission will by Public Notice cancel the auction for this license and establish a date for the filing of a long-form application, the acceptance of which will trigger the procedures permitting petitions to deny. In order to encourage maximum bidder participation, we will provide applicants with an opportunity to correct minor defects in their short-form applications prior to the auction. However, applicants will not be permitted to make any major modifications to their applications, including ownership changes or changes in the identification of parties to bidding consortia. In addition, applications that are not signed will be dismissed as unacceptable.

44. The Commission will issue a second Public Notice listing all defective applications and applicants with minor defects will be given an opportunity to cure and resubmit defective applications. After reviewing the corrected applications, the Commission will release a third Public Notice announcing the names of all applicants whose applications have been accepted for filing. Applicants identified in the third Public Notice will then be required to submit the full amount of their upfront payment (defined below in ¶ 45) to the Commission's lock-box bank by the date specified in the Public Notice, which generally will be no later than 14 days before the scheduled auction. After the Commission receives from its lock-box bank the names of all applicants who have submitted timely upfront payments, the Commission will issue a fourth Public Notice announcing the names of all applicants that

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19 Since Section 8 of the Communications Act, 47 U.S.C. § 158, does not currently afford the Commission authority to charge a fee in connection with PCS applications, narrowband PCS applicants will not be required to submit a fee with their short-form application. However, the Commission has requested that Congress amend Section 8 of the Communications Act to provide a specific fee for PCS services. If the Commission receives fee authority, the general rules governing submission of fees will apply. See 47 C.F.R. § 1.1101 et seq. These rules currently provide for dismissal of an application if the application fee is not paid, is insufficient, is in improper form, is returned for insufficient funds or is otherwise not in compliance with our fee rules.

20 On the date set for submission of corrected applications, applicants that on their own discover minor errors in their applications (e.g., typographical errors, incorrect license designations, etc.) also will be permitted to file corrected applications.
have been determined to be qualified to bid. Each applicant listed on this fourth Public Notice will be issued a bidder identification number and further information and instructions regarding the auction procedures.

B. Upfront Payment

45. We will require all auction participants to tender in advance to the Commission a substantial upfront payment as a condition of bidding in order to ensure that only serious, qualified bidders participate in auctions and to ensure payment of the penalty (discussed infra) in the event of bid withdrawal or default. We believe that the standard upfront payment formula of $0.02 per pop per MHz for the largest combination of MHz-pops a bidder anticipates bidding on in any single round of bidding is appropriate for narrowband PCS services. Although some commenters suggested a higher pop-MHz upfront payment calculation for narrowband PCS auctions, we believe that our standard $0.02 per pop per MHz upfront payment formula is appropriate to attract as many qualified bidders as possible while providing adequate deterrence against frivolous bidding. This upfront payment calculation will define the upper bound of MHz-pops on which a bidder will be permitted to bid in any round, and so should be calculated by bidders to reflect the maximum MHz-pops from any combination of licenses on which they may want to bid in a single round. Using this formula will provide bidders with the flexibility to change their strategy during an auction and to bid on a larger number of smaller licenses or a smaller number of larger licenses, so long as the total MHz-pops combination does not exceed that amount covered by the upfront payment. If licenses covering the nation are being auctioned simultaneously, a bidder will not be required to file an upfront payment representing national coverage unless it intends to bid on licenses covering the entire nation in any single bidding round. We will announce the upfront payment amount for each license in a Public Notice issued prior to the auction.

46. In the Second Report we established a minimum upfront payment of $2,500 to ensure that the use of our preferred formula would result in a substantial enough payment that bidders would be deterred from making frivolous bids. We indicated, however, that this amount could be modified on a service specific basis. We believe that a $2,500 minimum may be too high for some narrowband licenses in sparsely populated areas, which may be have values below this amount. We, therefore, will establish a lower minimum upfront payment of $1,000 for narrowband PCS applications.

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21 An applicant who fails to submit a sufficient upfront payment to qualify it to bid on any license being auctioned will not be identified on this Public Notice as a qualified bidder.

22 As discussed infra, however, we retain the flexibility to consider using a simpler payment requirement if circumstances warrant. The upfront payment amount will be announced by Public Notice before each auction.

23 PacTel Paging proposed a $0.04 per pop per MHz formula for MTA licenses and a $0.08 per pop per MHz formula for BTA licenses. PacTel Paging Reply Comments at ¶ 11.
47. Upfront payments generally will be due no later than 14 days before a scheduled auction. This period should be sufficient to allow the Commission sufficient time to process upfront payment data and release a Public Notice listing all qualified bidders. The specific procedures to be followed in the tendering and processing of upfront payments are set forth in Section 1.2106 of the Commission's rules.

C. Down Payment and Full Payment for Licenses Awarded by Competitive Bidding

48. The Second Report and Order established a 20 percent down payment to discourage default between the auction and licensing and ensure payment of the penalty (discussed infra at ¶ 49) if such default occurs. We concluded that a 20 percent down payment was appropriate to ensure that auction winners have the necessary financial capabilities to complete payment for the license and to pay for the costs of constructing a system, while at the same time not being so onerous as to hinder growth and diminish access. We therefore will require that winning bidders supplement their upfront payments with a down payment sufficient to bring their total deposits up to 20 percent of their winning bid(s). The winning bidder will be required to submit the required down payment by cashier's check or wire transfer to our lock-box bank by a specified date, generally within five (5) business days following the close of bidding. All auction winners, with the exception of certain designated entities, will be required to make full payment of the balance of their winning bids within five (5) business days following award of the license. Grant of the license will be conditioned on this payment.

D. Bid Withdrawal, Default and Disqualification

49. In either a sequential or simultaneous auction, it is critically important that potential bidders understand that there will be a substantial penalty assessed if they withdraw a high bid, are found not to be qualified to hold licenses or are unable to pay a balance due. Any bidder who withdraws a high bid during an auction before the Commission declares bidding closed, or defaults by failing to remit the required down payment within the prescribed time, will be required to reimburse the Commission in the amount of the difference

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24 If the upfront payment already tendered by a winning bidder, after applying any bid withdrawal penalties, amounts to 20 percent or more of its winning bids, no additional deposit will be required. If the upfront payment amount on deposit is greater than 20 percent of the winning bid amount, than the additional monies will be refunded.

25 As discussed infra, an auction winner that is a designated entity entitled to make payments through an installment plan will be required to bring its deposits with the Commission up to only 10 percent of its winning bid after the bidding closes. Such an entity will pay an additional 10 percent of its winning bid to the Commission upon grant of the license.
between its high bid and the amount of the winning bid the next time the license is offered by the Commission, if the subsequent winning bid is lower.\textsuperscript{26} After bidding closes, a defaulting auction winner will be assessed an additional penalty of three percent of the subsequent winning bid or three percent of the amount of the defaulting bid, whichever is less. \textit{See} 47 C.F.R. §§ 1.2104 (g) and 1.2109.\textsuperscript{27} The additional three percent penalty is designed to encourage bidders desiring to withdraw their bids, to do so before bidding ceases. This additional penalty will also apply if an auction winner is disqualified or fails to remit the balance of its winning bid after having made the required down payment. We will hold deposits made by defaulting or disqualified auction winners until full payment of the penalty.\textsuperscript{28} We believe that these penalties will adequately discourage default and ensure that bidders have adequate financing and that they meet all eligibility and qualification requirements. In addition, if a default or disqualification involves gross misconduct, misrepresentation or bad faith by an applicant, the Commission also may declare the applicant and its principals ineligible to bid in future auctions, and may take any other action that it deems necessary, including institution of proceedings to revoke any existing licenses held by the applicant.\textsuperscript{29}

50. In the event that an auction winner defaults or is otherwise disqualified after an auction is closed, an issue arises as to whether the Commission should hold a new auction or simply offer the license to the second-highest bidder. Parties commenting on this issue generally favored re-auctioning the license, pointing out that changing market and even technological developments since the initial auction may change the identity of the high bidder and the value of the license, especially if the intervening period is relatively long. \textit{See}, e.g., comments of BellSouth at 37. They urge that any re-auction be open to new bidders,

\begin{footnotesize}
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\item[\textsuperscript{26}] In the unlikely event that there is more than one bid withdrawal on the same license, we will hold each withdrawing bidder responsible only for the difference between its withdrawn bid and the amount of the winning bid the next time the license is offered by the Commission. This procedure ensures that each bidder who withdraws is responsible for its bid.
\item[\textsuperscript{27}] If a license is re-offered by auction, the "winning bid" refers to the high bid in the auction in which the license is re-offered. If a license which is the subject of withdrawal or default is instead offered to the highest losing bidders in the initial auction, the "winning bid" refers to the bid of the highest bidder who accepts the offer. Losing bidders would not be required to accept the offer, i.e., they may decline without penalty. We wish to encourage losing bidders in simultaneous multiple round auctions to bid on other licenses, and therefore will not hold them to their losing bids on a license for which a bidder has withdrawn a bid or on which a bidder has defaulted.
\item[\textsuperscript{28}] In rare cases in which it would be inequitable to retain a down payment, we will entertain requests for waiver of this provision.
\item[\textsuperscript{29}] \textit{See} Second Report and Order at ¶ 198.
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\end{footnotesize}
arguing that such a procedure would reduce the incentive of losing bidders to "gang up" on the auction winner. See comments of Utilities Telecommunications Council at 21.

51. As we stated in the Second Report and Order, we believe that, as a general rule, when an auction winner defaults or is otherwise disqualified after having made the required down payment, the best course of action is to re-auction the license either to existing or new applicants. Although we recognize that this may cause a brief delay in the initiation of service to the public, during the time between the original auction and the disqualification circumstances may have changed so significantly as to alter the value of the license to auction participants as well as to parties who did not participate. In this situation, awarding licenses to the parties that value them most highly can best be assured though a re-auction. However, if the default occurs within five (5) businesses days after bidding has closed, the Commission retains the discretion to offer the license to the second highest bidder at its final bid level, or if that bidder declines the offer, to offer the license to other bidders (in descending order of their bid amounts) at their final bid levels. 30

52. If a new auction becomes necessary because of default or disqualification more than five (5) business days after bidding has ended, the Commission will afford new parties an opportunity to file applications because so much time is likely to have passed that different parties may be interested in bidding and existing applicants may have different valuations of the license. One of our primary goals in conducting auctions is to assure that all serious interested bidders are in the pool of qualified bidders at any re-auction. We believe that achievement of this goal outweighs the short delay that we recognize may result from allowing new applications in a re-auction. Indeed, if we were not to allow new applicants in a re-auction, interested parties may be forced into an after-market transaction to obtain the license, which would itself delay service to the public and deny recovery by the government of a reasonable portion of the value of the spectrum.

53. If the winning bidder makes the down payment in a timely manner, a long-form application filed on FCC Form 401 as modified will be required to be filed by a specified date, generally within ten (10) business days after the close of the auction. 31 After the

30 If only a small number of relatively low value licenses are to be re-auctioned, the Commission may choose to offer the license to the highest losing bidders since the cost of running an auction may not exceed the benefits.

31 Schedule B to FCC form 401 will not be required to be submitted by narrowband PCS applicants. However, applicants for narrowband PCS licenses proposing to use any portion of narrowband PCS spectrum to offer service on a private mobile radio service basis must overcome the presumption that PCS is a commercial mobile radio service. Regulatory Treatment of Mobile Services, Second Report and Order in GN Docket No. 93-252, 9 FCC Rcd 1411, 1460-63 (1994); 47 C.F.R. Sec. 20.9(a)(11), (b). Applicants (or licensees) seeking to dedicate a portion of the spectrum for private mobile radio service, will be required to
Commission receives the winning bidder’s down payment and the long-form application, we will review the long-form application to determine if it is acceptable for filing. Upon acceptance for filing of the long-form application, the Commission will release a Public Notice announcing this fact, triggering the filing window for petitions to deny. If the Commission denies all petitions to deny, and is otherwise satisfied that the applicant is qualified, the license(s) will be granted to the auction winner.

54. In the Notice, we proposed to adopt general processing and procedural rules for narrowband PCS based on Part 22 of the Commission’s rules.32 One commenter, AIDE, argues that the Commission’s reference to proposed PCS rules are vague and legally insufficient for a Notice of proposed rulemaking. Comments of AIDE at 16-17. AIDE also asserts that the adoption of PCS processing and procedural rules are beyond the scope of the Notice in this rulemaking proceeding. Id. We disagree. The Notice sought comment on specific rule sections contained in Part 22 of our rules and asked commenters to indicate what modifications should be made to those rules to adapt them for PCS services. See Notice at ¶ 128. In addition, the Notice specifically requested comment on the general procedural, processing and petition to deny procedures that should be used for auctionable services. The Notice’s proposal to adopt processing rules based on Part 22 of the Commission’s rules, with any appropriate modifications for PCS services, clearly indicated to commenters the terms of the proposed rules, as is required by 47 C.F.R. § 1.413 (c). Accordingly, we believe that the Notice’s description of the proposed rules was sufficiently specific to alert bidders to the substance of our proposal and to provide an adequate opportunity for comment on those proposals. Moreover, we conclude that these issues are well within the scope of, and in fact are essential, to implement competitive bidding for narrowband PCS licenses.

55. As we proposed, we adopt a modified version of the application processing rules contained in Part 22 of the Commission’s rules for narrowband PCS. These rules will govern application filing and content requirements, waiver procedures, procedures for return of defective applications, regulations regarding modification of applications, and general application processing rules. We also adopt petition to deny procedures based on Section 22.30 of the Commission’s rules. In addition, as we proposed in the Notice we adopt rules similar to Section 22.943 of our existing rules (47 C.F.R. § 22.943) to prevent the filing of speculative applications and pleadings designed to extract money from sincere narrowband PCS applicants. In this regard, we limit the consideration that an applicant or petitioner is permitted to receive for agreeing to withdraw a petition to deny or an application to the

attach as an exhibit to the Form 401 application a certification that it will offer PCS service on a private mobile radio basis. The certification must include a description of the proposed service sufficient to demonstrate that it is not within the definition of commercial mobile radio service in Section 20.3 of the Commission’s rules. Id.

32 Procedural and processing Rules for broadband PCS will be established in a separate Report and Order.

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legitimate and prudent expenses of the withdrawing applicant or petitioner. These rules are set forth in the attached Appendix.33

56. With regard to petitions to deny, we adopt expedited procedures consistent with the provisions of Section 309(i)(2) of the Communications Act to resolve substantial and material issues of fact concerning qualifications.34 This provision requires us to entertain petitions to deny the application of the auction winner if petitions to deny are otherwise provided for under the Communications Act or our Rules.35

57. As we indicated in the Second Report and Order, we conclude that the Commission need not conduct a hearing before denial if it determines that an applicant is not qualified and no substantial issue of fact exists concerning that determination. In the event that the Commission identifies substantial and material issues of fact in need of resolution, Section 309(i)(2) of the Communications Act permits in any hearing the submission of all or part of evidence in written form and allows employees other than administrative law judges to preside over the taking of written evidence. We will incorporate these principles into our narrowband PCS procedural rules.

E. Procedures in Other Auction Designs.

58. Single Round Bidding. Where we use sealed bidding, in addition to the information specified above, the initial Public Notice will specify the date on which sealed bids must be submitted. In single round sealed bid auctions, we will not require bidders to submit upfront payments because we believe that there is less risk of frivolous bidding when this auction design is used. We may, however, announce by Public Notice that bidders must tender the 20 percent down payment at the time they submit their bids in order to ensure payment of the penalty in case of bid withdrawal or default. In single round sealed bid auctions, we will require that bids be received on a date specified in the Public Notice and that bids clearly indicate the bidder’s identification number and the auction and license to which the bid relates. Bidders submitting bids for more licenses than they are permitted to hold must also specify the order in which they wish to be awarded such licenses if they are the high bidder on more licenses then they are eligible to hold. After bids are submitted and evaluated, the Commission will issue a second Public Notice indicating all bidders who have

33 These interim procedural rules may be modified by the Commission in a separate rulemaking proceeding.

34 47 U.S.C § 309(j)(5) forbids the granting of licenses as a result of competitive bidding unless the Commission determines that the applicant is qualified.

35 We sought comment on a proposal to utilize existing petition to deny procedures for auctionable services (such as certain private radio services) that do not now have petition to deny procedures. See NPRM at ¶ 110.
made timely bid submissions. After release of the second Public Notice, the Commission will issue a third Public Notice announcing the high bidders on each license. If the 20 percent deposit has not already been submitted, then the high bidder will be required to submit the 20 percent down payment within five (5) business days after release of the Public Notice announcing the high bidders (if the 20 percent down payment has already been submitted, the Commission will simply deposit the high bidder's down payment).

59. In the case of single round bidding, the withdrawal and default penalties must be modified to reflect the fact that bids cannot be withdrawn during the course of an auction because there is only a single round of bidding. In this context, if a bid is withdrawn before the Commission releases the Public Notice announcing the high bidders, no harm is likely to occur and no penalty will be assessed because the Commission can easily designate in the Public Notice that the party with the next highest bid is the winning bidder. If, however, a high bidder in a single round auction defaults after release of the Public Notice announcing the high bidders, the licensing process is likely to be delayed. Therefore, in order to encourage bidders in single round auctions to avoid default and the associated delays, we will impose a default penalty if a high bidder withdraws, defaults or is otherwise disqualified after release of the Public Notice announcing the winning bidders. This penalty will be equal to the difference between the high bid amount and the amount of the next highest valid bid. A bid will be considered valid for this purpose if the bidder has not already been designated the winning bidder on more licenses than it is permitted to be awarded. Losing bidders, may decline a defaulted license without penalty if such default occurs more than 30 days after the Commission releases the initial Public Notice announcing the winning bidders. This should afford the Commission sufficient time to identify a new winning bidder and collect its down payment in cases where the original winning bidder defaults or is disqualified. This also allows losing bidders to respond to changed circumstances after a reasonable period of time. Where a bidder defaults or is disqualified more than 30 days after the release of the initial Public Notice announcing the winning bidders the Commission retains the discretion to either offer the license to the bidder with the next highest valid bid at its original bid price or re-auction the license. If the Commission re-auctions the license, new applications will be accepted and the additional three percent penalty (discussed supra ) will apply.

60. Oral Sequential Auctions. Where oral sequential bidding is employed, the general

36 If a tie occurs, bidders will be afforded the opportunity to submit another bid and the highest bidder in this round will be designated the winning bidder.

37 Thus, bidders will be held to their bids on the maximum number of licenses they are permitted to hold. If there are multiple defaults each bidder will be responsible for the difference between its bid and the amount of the next highest valid bid. Holding each bidder in a single round auction responsible for the difference between its bid and the next highest valid bid will discourage cascading defaults, without penalizing bidders for bidding on more licenses than they are permitted to hold.
procedures described above will be followed with one exception. Qualified bidders will be required to bring a cashier's check for the full amount of their upfront payment to the auction site. Bidders will be required to display their upfront payment check as a condition of being issued a bidder identification number and admittance to the bidder section of the auction site. After bidding closes on a particular license, the high bidder will be asked to tender its upfront payment and sign a bid confirmation form. If the high bidder declines to tender the upfront payment and/or refuses to sign the bid confirmation form, no penalty will be assessed because the license would be immediately re-auctioned. The only damage from such withdrawal would be delay. And in an oral sequential auction such delay may be minimal. The standard default penalty and the additional three percent penalty (described supra at ¶ 49) will be assessed, however, if the bidder defaults on the 20 percent down payment, fails to pay for the license or is disqualified after the close of an auction.

V. REGULATORY SAFEGUARDS

A. Unjust Enrichment Provisions

61. The Budget Act directs the Commission to "require such transfer disclosures and anti-trafficking restrictions and payment schedules as may be necessary to prevent unjust enrichment as a result of the methods employed to issue licenses and permits." 47 U.S.C. § 309(j)(4)(E). In the Second Report and Order, the Commission adopted safeguards designed to ensure that the requirements of Section 309(j)(4)(E) are satisfied.

62. In this Order we adopt specific rules governing unjust enrichment by designated entities, which are discussed below in Section VI. In addition, the transfer disclosure requirements contained in Section 1.2111 (a) of our rules will apply to all narrowband PCS licenses obtained through the competitive bidding process. Generally, applicants transferring their licenses within three years after the initial license grant will be required to file, together with their transfer application, the associated contracts for sale, option agreements, management agreements, and all other documents disclosing the total consideration received in return for the transfer of its license. As we indicated in the Second Report and Order we will give particular scrutiny to auction winners who have not yet begun commercial service and who seek approval for a transfer of control or assignment of their licenses after the initial license grant, in order to determine if any unforeseen problems relating to unjust enrichment have arisen outside the designated entity context. In addition, this reporting requirement will provide the Commission with valuable information that will enable us to evaluate how well the various auction methods have achieved our objectives.

B. Performance Requirements

63. The Budget Act required the Commission to "include performance requirements, such as appropriate deadlines and penalties for performance failures, to ensure prompt delivery of service to rural areas. to prevent stockpiling or warehousing of spectrum by
licensees or permittees, and to promote investment in and rapid deployment of new
technologies and services. In the Second Report and Order we decided that it was
unnecessary and undesirable to impose additional performance requirements, beyond those
already provided in the service rules, for all auctionable services. The narrowband PCS
service rules already contain specific performance requirements, such as the requirement to
construct within a specified period of time. See, e.g., 47 C.F.R. § 24.103 Failure to satisfy
these construction requirements will result in forfeiture of the license. Accordingly, we do
not adopt any additional performance requirements in this order.

C. Rules Prohibiting Collusion

64. In the Second Report and Order we adopted special rules prohibiting collusive
conduct in the context of competitive bidding. See 47 C.F.R. § 1.2105 (c) We indicated
that such rules would serve the objectives of the Budget Act by preventing parties, especially
the largest firms, from agreeing in advance to bidding strategies that divide the market
according to their strategic interests and disadvantage other bidders. These rules are
applicable to all auctionable services including narrowband PCS. Generally, bidders will be
required to identify on their Form 175 applications all parties with whom they have entered
into any consortium arrangements, joint ventures, partnerships or other agreements or
understandings which relate to the competitive bidding process. Bidders will also be required
to certify that they have not entered into any explicit or implicit agreements, arrangements or
understandings with any parties, other than those identified, regarding the amount of their bid,
bidding strategies or the particular properties on which they will or will not bid. After the
short-form applications are filed and prior to the time that the winning bidder has made its
required down payment, all bidders will be prohibited from cooperating, collaborating,
discussing or disclosing in any manner the substance of their bids or bidding strategies with
other bidders, unless such bidders are members of a bidding consortium or other joint bidding
arrangement identified on the bidder’s short-form application.

65. Winning bidders are required to attach as an exhibit to the Form 401 application a
detailed explanation of the terms and conditions and parties involved in any bidding consortia,
joint venture, partnership or other agreement or arrangement they had entered into relating to
the competitive bidding process prior to the close of bidding. All such arrangements must
have been entered into prior to the filing of short-form applications. Where specific instances
of collusion in the competitive bidding process are alleged during the petition to deny process,
the Commission may conduct an investigation or refer such complaints to the United States
Department of Justice for investigation. Bidders who are found to have violated the antitrust
laws or the Commission’s rules in connection with participation in the auction process may
be subject to forfeiture of their down payment or their full bid amount, revocation of their
license(s), and may be prohibited from participating in future auctions.

VI. DESIGNATED ENTITY PREFERENCES

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5a See Section 309(j)(4)(B) of the Communications Act, as amended.
A. Introduction

66. As discussed in the Second Report and Order, Congress mandated that the Commission "ensure that small businesses, rural telephone companies, and businesses owned by members of minority groups and women are given the opportunity to participate in the provision of spectrum-based services." 47 U.S.C. § 309(j)(4)(D). The statute requires the FCC to "consider the use of tax certificates, bidding preferences, and other procedures" in order to achieve this congressional goal. In addition, Section 309(j)(3)(B) provides that in establishing eligibility criteria and bidding methodologies the Commission shall promote "economic opportunity and competition . . . by avoiding excessive concentration of licenses and by disseminating licenses among a wide variety of applicants, including small businesses, rural telephone companies, and businesses owned by members of minority groups and women." 47 U.S.C. § 309(j)(3)(B). Finally, Section 309(j)(4)(A) provides that to promote these objectives the Commission shall consider alternative payment schedules including lump sums or guaranteed installment payments.

67. In the Second Report and Order we established the eligibility criteria and general rules that would govern the award of preferences for designated entities. We also established a menu of preferences, including installment payments, set-asides and bidding preferences that we could choose from in selecting the preferences that will be applicable to a particular service, and specified the circumstances under which a tax certificate program would be established. In addition, we set forth rules to prevent unjust enrichment by designated entities seeking to transfer licenses obtained through use of one of the preferences.

68. In this Report and Order we adopt specific preferences for narrowband PCS designed to ensure that designated entities are given the opportunity to participate both in the competitive bidding process and in the provision of narrowband PCS services. In particular, we adopt the following preferences:

(1) Businesses owned by women and minorities will be entitled to a 25 percent bidding credit applicable to three specified nationwide licenses (one 50/50 kHz paired, one 50/12.5 kHz paired, and one 50 kHz unpaired); ten specified regional licenses (one 50/50 kHz paired and one 50/12.5 kHz paired license in each region); and 153 specified MTA licenses (one 50/50 kHz paired, one 50/12.5 kHz paired, and one 50 kHz unpaired license in each MTA).

(2) Tax certificates will be issued to initial investors in minority and female-owned enterprises upon divestiture of their interests, and to licensees who transfer their authorizations to minority and female-owned businesses.

(3) Installment payments will be made available to small businesses for any of the BTA, MTA or regional narrowband licenses.

We also incorporate and adopt the unjust enrichment provisions adopted in the Second Report.
and Order applicable to installment payments and bidding credits, and we adopt unjust enrichment provisions for parties receiving licenses as a result of our tax certificate policy. Small businesses and businesses owned by women and minorities will also be defined according to the definitions and eligibility criteria established in the Second Report and Order. 39

69. We believe that narrowband PCS will provide significant opportunities for all designated entities. Narrowband PCS will likely include a wide variety of services, including advanced paging, messaging, and advanced cordless telephones, which will have the capability to offer voice, facsimile, graphic and other imaging services. This should afford licensees flexibility to offer an array of innovative service offerings, particularly to smaller niche markets, thereby enhancing both customer choice and fostering competitive markets for products and services. Narrowband PCS also involves relatively low capital entry requirements, and is therefore well-suited to small entities, which lack access to large amounts of capital. 40

70. We also find that the preferences we have selected for auctions in this service will fulfill the congressional directive that we provide meaningful opportunities for small businesses and businesses owned by minorities and/or women to participate in the provision of narrowband PCS services. As explained below, we have selected preferences that are tailored to the unique characteristics of narrowband PCS and that should create meaningful incentives for small businesses and businesses owned by minorities and/or women to both bid successfully for available licenses and provide innovative and expeditious service to the

39 See 47 C.F.R. § 1.2110. This section requires that for applicants that are limited partnerships, the general partner must be a minority and/or woman (or an entity 100 percent owned and controlled by minorities and/or women) who is a U.S. citizen and owns at least 50.1 percent of the partnership equity. We clarify that in the context of limited partnerships, we will regard a woman or minority general partner as having a 50.1 percent equity stake if it shares pro rata in 50.1 percent of the partnership’s profits and losses or contributes at least 50.1 percent of the partnership’s capital contribution.

40 Although the record contains no direct evidence of the costs to build out narrowband PCS systems, we have estimated these costs based on the typical construction costs of existing paging systems. Accordingly, we estimate that the cost to construct a narrowband BTA facility would be approximately $50,000. The cost to construct a narrowband MTA facility, in accordance with the five-year build-out requirements, would be approximately $100,000 to meet the minimum population coverage requirements, and approximately $1.25 million (assuming 25 base stations) to meet the minimum geographic coverage requirements. Constructing a regional narrowband facility would cost approximately $1 million to cover the necessary population and $2.5 million to cover the minimum geographic area. Finally, we estimate that the build-out cost for a nationwide facility would be approximately $1.7 million for population coverage and $12.5 million for geographic area coverage.
We believe that installment payments provide a significant means for small businesses to overcome their main barrier to entry: lack of access to financing. And, a 25 percent bidding credit for minority and women-owned businesses together with a tax certificate program addresses the additional obstacles faced by those designated entities. The preferences adopted here reflect our desire to carefully balance the congressional mandate to ensure meaningful access for designated entities, with the goal of ensuring the expeditious delivery of new services and preventing abuses of our preference policies and procedures. We will continue to assess the effectiveness of the measures taken in this proceeding, and will apply any knowledge gained to subsequent auctions for other services.

71. We have decided not to provide bidding credits or other separate preferences for rural telephone companies bidding on narrowband PCS spectrum because we conclude that given the relatively modest build-out costs, such preferences are unnecessary to ensure the participation of rural telephone companies in the provision of this service to rural areas. Moreover, in view of the fact that rural telephone companies may use their existing infrastructure to provide integrated narrowband PCS services in their rural service areas, should they choose to do so, we believe that they will have ample opportunity to participate in narrowband PCS. Rural telephone companies will, however, be eligible for bidding credits if they are owned by women or minorities. They may also qualify for installment payments if they satisfy the eligibility criteria for small businesses.

1. Bidding Credits for Businesses Owned By Women And Minorities

72. In the Second Report and Order we stated that we would consider using bidding credits to encourage participation by designated entities in auctions. Upon consideration and review of the record on this subject, we believe that affording businesses owned by women and minorities a substantial bidding credit for certain specified narrowband PCS licenses is the most cost-effective and efficient means of achieving Congress’ objective of "ensuring" the opportunity of these designated entities to participate in the provision of narrowband PCS services. Bidding credits will provide minority and female-owned firms with a significant advantage, which we believe is necessary to achieve this congressional goal, while preserving the advantages of open bidding competition. In effect, the bidding credit will function as a discount on the bid price a minority or female-owned firm will actually have to pay to obtain a license and, thus, will address directly the financing obstacles encountered by these entities. We also believe that a bidding credit in the amount of 25 percent is necessary to provide these designated entities with a significant enough advantage to ensure their ability to compete successfully for some narrowband PCS licenses. Thus, we will make a 25 percent bidding credit available to businesses owned by women and minorities bidding on the following licenses: (1) the nationwide licenses on Channel 5, Channel 8 and Channel 11; (2) all regional licenses on Channel 13 and Channel 17; (3) all MTA licenses on Channel 19, 22, Channel 24, and (4) all BTA licenses on Channel 26. See 47 C.F.R. § 24.129.

73. As discussed in the Second Report and Order, Congress mandated that the
Commission "ensure" the opportunity for participation in spectrum-based services by each category of designated entity, including businesses owned by minorities and women. This plain language leads us to conclude that adequate measures must be taken to assure that minority and female-owned businesses have the ability to participate in the provision of services subject to competitive bidding. Moreover, in enacting this legislation, it is clear that Congress was concerned about disseminating licenses to a wide variety of applicants and wanted the Commission to take meaningful steps to accomplish this goal. Indeed, Congress included a requirement in the statute that the Commission report to it in 1997 about, among other things, whether competitive bidding facilitated the introduction of new companies into the telecommunications market and whether designated entities "were able to participate successfully in the competitive bidding process." 47 U.S.C. § 309 (j)(12)(iv).

74. Apart from Congress' directive, we think that ensuring the opportunity for women and minorities to participate in narrowband PCS is important for the telecommunications industry. Companies owned by women and minorities can play a vital role in serving certain geographic areas and other niche markets that may be overlooked by other industry competitors, thus promoting our goal of universal access to telecommunications services. Not only will the industry become more diverse through the adoption of meaningful preferences, but we believe that a much wider customer base will obtain access to innovative technologies. Moreover, studies show that even when minority-owned firms do not locate within urban minority communities, they employ more minorities relative to other companies, thereby promoting our goals of equal employment opportunity, economic growth and community economic development. 42

75. The record reflects a severe underrepresentation of women and minorities in telecommunications. Indeed, the Commission's Small Business Advisory Committee (SBAC) found only 11 minority firms engaged in the delivery of cellular, specialized mobile radio, radio paging, or messaging services. 43 Likewise, American Women in Radio and Television (AWRT) found that only 24 percent of small communications businesses are owned by women (and when companies without paid employees are excluded, women own less than 15

41 See e.g. 47 C.F.R. § 21.307, 22.307 (equal employment opportunity rules for common carriers); Implementation of the Commission's Equal Employment Opportunity Rules (Notice of Inquiry)(released April 21, 1994) ("[T]he EEO rules enhance access by minorities and women to increased employment opportunities, which are the foundation for increasing opportunities for minorities and women in all facets of the communications industry, including participation in ownership. Thus, the rules . . . promote the further development of the broader communications infrastructure.")

42 See e.g. Banking on Black Enterprise at 3.

percent of small communications firms). See Comments of AWRT at 5. Many commenters observe that the factors that preclude minorities and women from effective participation involve access to financing. With regard to women they note that no existing FCC policy provides an incentive for women to enter the communications business, and that access to capital remains the biggest obstacle women business owners must face. Similarly, the SBAC states that minorities frequently do not or cannot use traditional sources of financing. Citing the U.S. Senate amicus brief in Metro Broadcasting, Inc. v. FCC, 110 S.Ct. 2997 (1990), the SBAC further asserts that "spectrum for radio facilities was first allocated at a time when undisguised discrimination in education, employment opportunities, and access to capital excluded minorities from all but token participation." The SBAC concludes that minorities were impeded from successfully competing for licenses when they were first awarded and, due to systematic barriers to technical training and employment opportunities, this situation has continued over time.44

76. Given this history of underrepresentation of minorities and women in telecommunications and the inability of these groups to access financing, we find that the best way we can accomplish these statutory mandates is to provide bidding credits exclusively to minority and female-owned businesses. The record demonstrates that women and minorities face barriers to entry not encountered by other firms, including other designated entities, and it is, therefore, appropriate and necessary that we provide them with a substantial bidding advantage.45 In other contexts, Congress has recognized that the use of preferences in the licensing process can be necessary to remedy underrepresentation by minorities. For example, in 1982, Congress mandated the grant of a "significant preference" to minority applicants participating in lotteries for spectrum-based services. 47 U.S.C. § 309(i)(3)(A). And, in 1988, Congress attached a provision to the FCC appropriations legislation, which precluded the Commission from spending any appropriated funds to examine or change its minority broadcast preference policies.46 Absent such measures targeted specifically to women and minorities, it would be virtually impossible to assure that these groups achieve any meaningful measure of opportunity for actual participation in the provision of the services in question.47

44 Id.
45 See e.g., Comments of AWRT at 4-7; Call-Her at 5; Cook Inlet at 38-39.
47 In the Second Report and Order, we addressed the constitutionality of gender and race-based preferences and concluded that the proper standard of scrutiny to be employed in this context is the "intermediate scrutiny" standard used in the Metro case. 110 S. Ct. 2997. We further concluded that under such a standard, preferences for women and minority-owned businesses are constitutionally permissible. We recognize that Metro's standard of review applies to measures approved by Congress. 110 S. Ct. at 3008-09. As noted above, the bidding credits in question here were expressly approved and, indeed, are required to achieve
77. We also agree with Call-Her that even comparatively large businesses owned by women and minorities face discriminatory lending practices and other discriminatory barriers to entry and, therefore, eligibility for bidding credits should not be limited to small firms. The narrowband auctions in question present a unique licensing opportunity that will allow these historically disadvantaged groups to gain a foot-hold in the communications industry. Our goal is to encourage businesses owned by minorities and women to provide viable, sustained competition to incumbent providers and larger businesses. Therefore, we have accorded preferences to minority and women-owned firms regardless of their size. This approach is consistent with our auction rules and will further the statutory mandate to ensure participation by designated entities.

78. Congress clearly intended that businesses owned by minorities and women must be given the opportunity to participate in the provision of spectrum-based services independent of their status as small businesses. The plain language of Section 309(j)(4)(D) states that the Commission "shall . . . ensure" the opportunity for participation by "small

the statutory goals. See 47 U.S.C. § 309(j)(4)(D) (The Commission must "consider the use of tax certificates, bidding preferences, and other procedures" to ensure the participation of "small businesses, rural telephone companies, and businesses owned by members of minority groups and women."). Moreover, a number of commenters have argued that PCS licensees will be able to control the content of the transmissions carried on their facilities and that such transmissions can be analogous to media of mass communications. See e.g., Comments of UCC at 10-12; AWCC at 7-8; and ex parte filing of Frank Washington, April 26, 1994. To the extent this control exists, or is later developed, with regard to narrowband PCS, the preferences we adopt for minorities and women would be consistent with the important governmental interest identified in Metro: increasing minority ownership to encourage diversity in the provision of content.

48 Because of the discrimination suffered by minorities and women as contractors and subcontractors in the telecommunications industry, see MBELDEF Study, this unique chance to enter the field as primary telecommunications providers, competing with, rather than dependent upon, other providers, is especially important.

49 In the Second Report and Order, we recognized that ensuring the participation of only bona fide, qualified bidders in our auctions is an important aspect of complying with the competitive bidding statute's requirement that we promote a competitive marketplace, See e.g., 47 U.S.C. sec. 309(j)(3)(B). Thus we adopted a requirement that auction participants tender a substantial upfront payment, and we declined to create a general exception to this rule for designated entities. See Second Report and Order at ¶¶ 171, 186. Likewise, in designing preferences for women and minority-owned businesses, we want to ensure that those companies that have the greatest ability to remain viable in the long run will have incentives to participate in the auction process. See Banking on Black Enterprise at 13 (government assistance should accrue to more capable black entrepreneurs, who are most likely to contribute to the goal of economic development).
businesses . . . and businesses owned by members of minority groups and women . . . ." (emphasis added). If Congress had intended to limit the directive of Section 309(j)(4)(D) only to small businesses, no need would have existed to mention separately minorities and women. Moreover, Section 309(j)(4)(D) was added at Conference, and the Conference Report does not offer any suggestion that, to come within the section’s purview, businesses owned by minorities or women must be small businesses. In contrast, and as we discussed more fully in the Second Report and Order, the legislative history of Section 309(j)(4)(A), relating to installment payments, expressly indicates that the provision was intended only to promote financial assistance for small businesses. Accordingly, we shall interpret Section 309(j)(4)(D) in accordance with its plain language and will not limit its application to small businesses.50

79. In determining the appropriate amount of the bidding credit we considered several factors. First, our analysis of the market shows that, because of existing infrastructure and economies of scale, incumbent providers will have the ability to bid more than first-time operators. This is because, in most cases, incumbent providers, including existing wireless operators, telephone companies and cable operators, are able to make use of their existing infrastructure to provide PCS services.52 The record demonstrates that very few incumbent providers are minorities or women, so that a substantial discount is necessary to put these designated entities on equal footing with incumbents.53 Several commenters indicate that a bidding credit of 25 percent or more was necessary to ensure the opportunity of businesses

50 See Second Report and Order at ¶¶ 234-236.

51 Even though small businesses are also mentioned in section 309(j)(4)(D), we do not believe bidding credits for small businesses are appropriate for narrowband PCS auctions. As a practical matter, due to the substantial capital necessary to construct a nationwide narrowband PCS system, most small businesses do not have the wherewithal to construct and operate the proposed systems. Accordingly, provisions designed to encourage participation by small entities in nationwide narrowband PCS service would be unlikely to result in the expeditious provision of new service to the public and therefore would be contrary to one of the principal objectives of the statutory auction provisions. Moreover, as to regional, MTA and BTA licenses, small businesses will be entitled to installment payments, which we believe will be sufficient to ensure their participation.

52 Reed, David P., Putting it all Together: The Cost Structure of Personal Communications Services, OPP Working Paper 28, November 1992. Although this study examined the broadband PCS market, we expect that a similar incumbency advantage exists in the narrowband PCS market.

53 See e.g., Comments of AWCC at 13-14; Cook Inlet at 10-15; and UCC at 7-10.
owned by women and minorities to participate in auctions. Moreover, in the broadcast context, we held that licensees can transfer their stations to minorities in distress sales provided that the price is no more than 75 percent of market value. This policy is based upon our finding that 25 percent is an appropriate discount to eliminate financial entry barriers for minority-owned companies seeking to become broadcast licensees. Likewise, we believe that a discount on the bid price in this amount will adequately ensure participation by a wide variety of minority and female-owned firms in narrowband PCS auctions and service provision. That being said, we note that this number is based also on our assessment of the capital entry requirements of the narrowband PCS service. As discussed, we think that a 25 percent bidding credit is sufficient to ensure minority and female entry. It is not so substantial, however, as to foster participation by firms that are not otherwise financially capable of building-out a narrowband PCS network. In this regard, we emphasize that the financing requirements of other spectrum-based services may necessitate use of a different figure to provide the proper assurances. Therefore, we will continue to examine this issue on a service-by-service basis. We will also monitor carefully the effectiveness of the 25 percent bidding credit in the narrowband PCS auctions and continually assess whether it is achieving the goal of ensuring that minority and women-owned firms participate successfully in auctions for this service.

80. To prevent unjust enrichment by women and minorities trafficking in licenses acquired through the use of bidding credits, we will impose a forfeiture requirement on transfers of such licenses to entities that are not owned by women or minorities. Female and minority-owned businesses seeking to transfer a license to an entity that is not owned by women or minorities will be required to reimburse the government for the amount of the bidding credit, plus interest at the rate imposed for installment financing at the time the license was awarded, before transfer will be permitted. The amount of the penalty will be reduced over time so that a transfer in the first two years of the license term will result in a forfeiture of 100 percent of the value of the bidding credit; in year three of the license term the penalty will be 75 percent; in year four the penalty will be 50 percent and in year five the penalty will be 25 percent, after which there will be no penalty. Furthermore, we have adopted strict eligibility criteria to ensure that only legitimate minority and women-owned firms are able to take advantage of bidding credits. See Second Report and Order at ¶ 277-

See comments of AIDE at 7; Devsha at 5; NABOB at 10-11; and ex parte filing of Personal Communications Network Services of New York at 2-3, each suggesting a bidding credit of 25 percent. Rocky Mountain Telephone proposes a 50 percent bidding credit. Comments of Rocky Mountain Telephone at 16. And Richard Vega proposes a 100 percent bidding credit for certain designated entities. Comments of Richard Vega at 7.

See Lee Broadcasting Corp., 76 FCC 2d 462 (1980).

See supra n. 40.

See Second Report and Order at ¶ 258.
278. In addition, to further ensure that our rules are as narrowly tailored as possible, while still fulfilling the statutory goal, we will prohibit publicly-traded companies from taking advantage of the bidding credits.

2. Tax Certificates

81. Congress instructed the Commission to consider the use of tax certificates to help ensure designated entity participation in spectrum-based services. See 47 U.S.C. § 309(j)(4)(D). In the Second Report and Order we observed that tax certificates could be useful as a means of attracting investors to designated entity enterprises and to encourage licensees to assign or transfer control of licenses to designated entities in post-auction transactions. We stated further that we would examine the feasibility of using this measure in subsequent service-specific auction rules. Second Report and Order at ¶ 251. After further consideration of this matter, we believe that tax certificates would be an appropriate tool to assist minority and female-owned businesses to attract start-up capital from non-controlling investors. In addition, we believe that tax certificates will give licensees the incentive to assign or transfer their authorizations to such entities in post-auction sales, thereby providing added assurance that minority and women-owned entities will have the opportunity to participate in narrowband PCS services. Accordingly, we will issue tax certificates to non-controlling initial investors in minority and female-owned narrowband PCS applicants, upon the sale of their non-controlling interests. We will also issue tax certificates to narrowband PCS licensees who assign or transfer control of their licenses to minority and women-owned entities.

82. As stated previously, the record reveals that women and minorities face barriers to entry not encountered by other designated entities. In particular, they have an especially difficult time accessing capital and, as a result, are severely underrepresented in the telecommunications industry. Together with the other preferences we adopt today, tax certificates should help to ensure the participation of minority and female-owned businesses in narrowband PCS services. This measure will make it easier for these designated entities to attract start-up capital because investors will know that they can defer taxes on any gains made when their interests are sold. In addition, tax certificates will provide incentives to licensees to seek out minority and female buyers in after-market sales because the licensees will be able to defer taxes on profits made in the sale.

83. We have used tax certificates over the years to encourage broadcast licensees and cable television operators to transfer their stations and systems to minority buyers. See Commission Policy Regarding the Advancement of Minority Ownership in Broadcasting, 92 FCC 2d 849 (1982) ("1982 Policy Statement"); see also Statement of Policy on Minority Ownership of Broadcasting Facilities, 68 FCC 2d 979 (1978). We have also employed tax certificates as a means of encouraging fixed microwave operators to relocate
have granted tax certificates to shareholders in minority-controlled broadcast or cable entities who sell their shares, when such interests were acquired to assist in the financing of the acquisition of the facility. These broadcast and cable tax certificates are issued pursuant to the Internal Revenue Code, 26 U.S.C. § 1071. While Congress' goal in authorizing tax certificates under Section 309(j)(4)(D) of the Act is somewhat different, and focuses on ensuring the opportunity for designated entities to participate in auctions and spectrum-based services, we think that it will be an equally valuable program. Issuance of tax certificates to investors and licensees that sell to minorities and women will augment the bidding credits preference, and together the measures should increase the ability of these entities to access financing, thus ensuring their opportunity to participate in narrowband PCS auctions and services.

84. In implementing this program, we will borrow from our existing tax certificate program and grant tax certificates, upon request, that will enable the licensees and investors meeting the criteria outlined here to defer the gain realized upon a sale either by: (1) treating it as an involuntary conversion under 26 U.S.C. § 1033, with the recognition of gain avoided by the acquisition of qualified replacement property; or (2) electing to reduce the basis of certain depreciable property, or both. Tax certificates will be available to initial investors in minority and female-owned businesses who provide "start-up" financing, which allows these businesses to acquire licenses at auction or in the aftermarket, and those investors who purchase interests within the first year after license issuance, which allows for the stabilization of the designated entities' capital base. Also, in accordance with our existing policy, to be eligible for a tax certificate, such investor transactions must not reduce minority or female ownership or control in the entity below 50.1 percent. The definition of a minority or female-owned entity is set forth in the Second Report and Order and, with regard to our investor tax certificate policy, the entity in which the investment is made must satisfy that definition at the time of the original investment as well as after the investor's shares are sold. For aftermarket sales, tax certificates will only be issued to licensees who sell to entities that meet that definition. Tax certificates will be granted only upon completion of the sale, although parties can request a declaratory ruling from the Commission regarding the tax consequences of prospective transactions.

85. As with our other tax certificate policies, we are concerned about avoiding "sham" arrangements to obtain tax certificates and, pursuant to Section 309(j)(4)(E), thus adopt measures to prevent unjust enrichment. First, we intend to enforce strictly the definitions adopted in the Second Report and Order and will carefully review investment and purchase arrangements to ensure that 50.1 percent control and equity by minorities and women was,


and will be maintained. Second, like our existing tax certificate program,\(^{60}\) we will impose a one-year holding requirement on the transfer or assignment of narrowband PCS licenses obtained through the benefit of tax certificates. We believe that the rapid resale of such licenses at a profit would subvert our goal of ensuring the opportunity to participate by minority and women-owned businesses, unless the buyer itself is a minority or female-owned business. The well-established one-year holding period would prevent this type of unjust enrichment. While this restriction will not be applied to assignments or transfers to qualified minority and female-owned businesses, assignees and transferees obtaining licenses pursuant to this exception will be subject to the one-year holding requirement.

3. Installment Payments

86. In this Report and Order, we adopt installment payments for small businesses bidding for any of the BTA, MTA or regional narrowband licenses. The record in this proceeding indicates that the most significant barrier for small business participation in the auctioning of narrowband PCS spectrum will be access to adequate private financing to ensure their ability to compete against larger firms in the competitive bidding process.\(^{61}\) In the Second Report and Order, we concluded that installment payments are an effective means to address the inability of small businesses to obtain financing and will enable these entities to compete more effectively for the auctioned spectrum. We also determined that small businesses eligible for installment payments would only be required to pay half of the down payment (10 percent of the winning bid, as opposed to 20 percent) five days after the auction closes, with the remaining 10 percent payment deferred until five days after grant of the license. Finally, we indicated that installment payments should be made available to designated entities at an interest rate equal to the rate for U.S. Treasury obligations. See Second Report and Order at ¶¶ 236-240.

87. Based on our review of the record, we conclude that installment payments are an appropriate preference for small businesses bidding for the BTA, MTA or regional narrowband licenses. We have limited eligibility for installment payments to small businesses because we believe that our system of preferences should be designed to match the particular needs and characteristics of the eligible recipients. In this respect, installment payments will provide financial assistance to all small businesses, including small businesses owned by women and minorities and rural telephone companies that meet the small business definition. By allowing payment in installments, the government is in effect extending credit to licensees, thus reducing the amount of private financing needed prior to the auction. Such low cost government financing will promote participation by small businesses, which, because of their

\(^{60}\) See Amendment of Section 73.3597 of the Commission’s Rules, Memorandum Opinion and Order, 99 FCC 2d 971, 974 (1985).

\(^{61}\) See e.g., Comments of SBA at 10-23; Palmer Communications at 3; NTIA at 27.

38
size, lack access to capital needed to participate in new spectrum opportunities such as narrowband PCS. We have decided to limit installment payments to those small businesses bidding on smaller spectrum blocks, specifically the BTA, MTA and regional licenses. This will deter potential abuse of the installment payment option by large firms and ensure that the public receives the maximum value for the use of spectrum. BTA, MTA and regional narrowband licenses are appropriately sized for development by bona fide small businesses. We estimate that the cost to build-out these licenses to meet the minimum population coverage requirements will be between $50,000 and $1 million. See supra n. 40. By contrast, the nationwide narrowband licenses will require capital commitments that are more suitable to large firms. Accordingly, we believe that application of installment payments to bidding on nationwide narrowband licenses is inappropriate to promote economic opportunity for small businesses. Installment payments for licenses of this magnitude may create incentives for large firms to create small business "fronts" to take advantage of low cost government financing or may result in payment defaults, which would prevent recovery for the public of the value of the spectrum and would hinder rapid deployment of service to the public.

88. The installment payment option will enable all small businesses to pay the full amount of their winning bid in installments (less the upfront payment, which must be paid in full. and the down payment, half of which is due five days after the auction closes and the other half five days after the application is granted). Generally, the terms and conditions of the installment payments will be the same as those provided in the general rules -- interest charges will be fixed at the time of licensing at a rate equal to the rate for ten-year U.S. Treasury obligations. Payments of interest only will be due for the first two years. Principal and interest payments will be amortized over the remaining years of the license. Timely payment of all installments will be a condition of the license grant and failure to make such timely payment will be grounds for revocation of the license.63

89. To ensure that large businesses do not become the unintended beneficiaries of preferences meant for small firms, we will use the unjust enrichment provisions adopted in the Second Report and Order applicable to installment payments. Specifically, if a small business making installment payments seeks to transfer a license to a non-small business entity during the term of the license, we will require payment of the remaining principal balance as a condition of the license transfer. Second Report and Order at ¶ 263.

VII. CONCLUSION

90. We believe that the competitive bidding rules we adopt for narrowband PCS, in

62. As described in the Second Report and Order, the Commission may, on a case-by-case basis permit a three to six month grace period within which the licensee may seek a restructuring of the payment plan.
conjunction with our spectrum allocation rules, will promote the public policy objectives set forth by Congress. Our rules will encourage economic growth and enhance access to narrowband PCS services for consumers, producers, and new entrants. Structuring our rules to promote opportunity and competition should result in the rapid implementation of new PCS services and encourage efficient spectrum use. The preferences we adopt for small businesses and businesses owned by women and minorities will help to promote access to narrowband PCS services by ensuring that these groups will genuine opportunities to participate in the auctions and in provision of service.

VIII. PROCEDURAL MATTERS AND ORDERING CLAUSES

A. Final Regulatory Flexibility Analysis

91. Pursuant to the Regulatory Flexibility Act of 1980, an Initial Regulatory Flexibility Analysis (IRFA) was incorporated in the Notice of Proposed Rule Making in PP Docket No. 93-253. Written comments on the IRFA were requested. The Commission's final analysis is as follows:

92. Need for and purpose of the action. This rulemaking proceeding was initiated to implement Section 309(j) of the Communications Act, as amended. The rules adopted herein will carry out Congress's intent to establish a system of competitive bidding for narrowband PCS licenses. The rules adopted herein also will carry out Congress’s intent to ensure that small businesses, rural telephone companies, and businesses owned by women and minorities are afforded an opportunity to participate in the provision of spectrum-based services.

93. Issues raised in response to the IRFA. The IRFA noted that the proposals under consideration in the NPRM included the possibility of new reporting and recordkeeping requirements for a number of small business entities. No commenters responded specifically to the issues raised in the IRFA. We have made some modifications to the proposed requirements as appropriate.

94. Significant alternatives considered and rejected. All significant alternatives have been addressed in the Second Report and Order.

B. Ordering Clauses

95. Accordingly, IT IS ORDERED THAT Part 24 of the Commission's Rules is amended as set forth in the attached Appendix.
96. IT IS FURTHER ORDERED that the rules changes made herein WILL BECOME EFFECTIVE 30 days after their publication in the Federal Register. This action is taken pursuant to Sections 4(i), 303(r) and 309(j) of the Communications Act of 1934, as amended. 47 U.S.C. §§ 154(i), 303(r) and 309(j).

FEDERAL COMMUNICATIONS COMMISSION

William F. Caton
Acting Secretary
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