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Small Entity Compliance Guide

Expanding the Economic and Innovation Opportunities of Spectrum Through Incentive Auctions

Report and Order
GN Docket No. 12-268
FCC 14-50
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This Guide is prepared in accordance with the requirements of Section 212 of the Small Business Regulatory Enforcement Fairness Act of 1996. It is intended to help small entities—small businesses, small organizations (non-profits), and small governmental jurisdictions—comply with the new rules adopted in the above-referenced FCC rulemaking docket(s). This Guide is not intended to replace the rules and, therefore, final authority rests solely with the rules. Although we have attempted to cover all parts of the rules that might be especially important to small entities, the coverage may not be exhaustive. This Guide may, perhaps, not apply in a particular situation based upon the circumstances, and the FCC retains the discretion to adopt approaches on a case-by-case basis that may differ from this Guide, where appropriate. Any decisions regarding a particular small entity will be based on the statute and regulations.

In any civil or administrative action against a small entity for a violation of rules, the content of the Small Entity Compliance Guide may be considered as evidence of the reasonableness or appropriateness of proposed fines, penalties or damages. Interested parties are free to file comments regarding this Guide and the appropriateness of its application to a particular situation; the FCC will consider whether the recommendations or interpretations in the Guide are appropriate in that situation. The FCC may decide to revise this Guide without public notice to reflect changes in the FCC's approach to implementing a rule, or to clarify or update the text of the Guide. Direct your comments and recommendations, or calls for further assistance, to the FCC's Consumer Center:

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I. OBJECTIVES OF THE PROCEEDING

In the *Report and Order* in GN Docket No. 12-268 (the “Order”),¹ the Commission implemented rules to implement the broadcast television spectrum incentive auction. With this incentive auction, full power and Class A television broadcasters will have the unique financial opportunity in the “reverse auction” phase of the incentive auction to return some or all of their broadcast spectrum usage rights in exchange for incentive payments. A broadcaster’s decision to participate in the reverse auction is wholly voluntary. By facilitating the voluntary return of spectrum usage rights and reorganizing the broadcast television bands, the Commission can recover a portion of ultra-high frequency (“UHF”) spectrum in the 600 MHz band currently used for television broadcasting for a “forward auction” of new, flexible-use licenses suitable for providing mobile broadband services. By making more spectrum available for mobile broadband use, the incentive auction will benefit consumers by easing congestion on the Nation’s airwaves, expediting the development of new, more robust wireless services and applications, and spurring job creation and economic growth.

The auction presents a once-in-a-lifetime opportunity for broadcasters, and the Commission is committed to providing them with information about both the process and the financial opportunity the auction represents to enable them to make informed business decisions about whether and how to participate. The Commission has conducted numerous workshops and other direct outreach efforts to broadcasters and developed *the Learn Everything About Reverse Auctions Now* (“LEARN”) program to provide useful information and resources.² The Commission anticipates offering demonstrations of the auction bidding system, interactive tutorials, and other opportunities for broadcasters to familiarize themselves with the reverse auction application and bidding processes in advance of the reverse auction. The Commission also recognizes the importance of broadcasters that choose not to participate in the reverse auction. The reorganization (or “repacking”) approach it adopted will avoid unnecessary disruption to broadcasters and consumers and ensure continued availability of free, over-the-air TV service.

A forthcoming pre-auction process will determine both the specific and final auction procedures, based on additional public input, and the auction participants, through an application process. The process will be initiated by the release of the *Incentive Auction Comment Public Notice*, which will solicit public input on final incentive auction procedures, and which will include specific proposals for crucial auction components, such as opening prices. Thereafter, the *Incentive Auction Procedures Public Notice* will specify final procedures, including dates, deadlines, and other final details of the application and bidding processes. The *Incentive Auction Procedures Public Notice* will be released well in advance of the application process for the incentive auction. The Commission’s rules adopted in the Order provide for the ability to refine aspects of the reverse and forward auctions if the record developed in response to the *Incentive Auction Comment Public Notice* reflects the need to do so.

¹ *Expanding the Economic and Innovation Opportunities of Spectrum Through Incentive Auctions*, GN Docket No. 12-268, Report and Order, FCC 14-50, 2014 WL 2464834 (rel. June 2, 2014).

² Information about the LEARN program is available at: <http://wireless.fcc.gov/incentiveauctions/learn-program/>.

II. REGULATIONS AND POLICIES THAT THE COMMISSION ADOPTED OR MODIFIED, INCLUDING RECORDKEEPING AND OTHER COMPLIANCE REQUIREMENTS

A. The Reorganized UHF Band

1. 600 MHz Band Plan

The Commission adopted a “600 MHz Band Plan” for new services in the repurposed UHF spectrum. Because the exact number of spectrum blocks licensed and their frequencies will not be known until the incentive auction concludes, the 600 MHz Band Plan the Commission adopted represents a framework for how to license the repurposed spectrum. The Technical Appendix to the Order sets forth each of the potential 600 MHz Band Plan scenarios based on the number of television channels cleared; ultimately, the repurposed spectrum will be licensed according to one of these scenarios, which range from two sets to 12 sets of paired blocks.

The 600 MHz Band Plan consists of paired uplink and downlink bands offered in 5+5 megahertz blocks. The uplink band will begin at channel 51 (698 MHz), followed by a duplex gap, and then the downlink band. The 600 MHz Band will accommodate market variation: specifically, the Commission decided to use the 600 MHz Band Plan in all areas where sufficient spectrum is available; and in constrained markets where less spectrum is available, the Commission may offer fewer blocks, or impaired blocks (i.e., blocks in which, due to remaining broadcast TV stations that may need to be protected against harmful interference in parts of the licensee’s service area, the licensees may not be able to use the entire license area), than what is offered generally in the 600 MHz Band Plan. The Commission also established technically reasonable guard bands to prevent harmful interference and to ensure that the spectrum blocks are as interchangeable as possible.

Specifically, the Commission adopted a guard band between television and wireless operations that ranges from seven megahertz to 11 megahertz, depending on the amount of spectrum cleared, a uniform duplex gap of 11 megahertz for every clearing scenario, and uniform three megahertz guard bands to protect against interference between licensed Wireless Medical Telemetry Service (“WMTS”) services on channel 37 and adjacent wireless services.



Figure 1. 84 megahertz scenario



Figure 2. 126 megahertz scenario

Shown above are two examples of the 600 MHz Band Plan scenarios. In the first example, 84 megahertz of television spectrum is repurposed. A total of seven 5+5 megahertz paired blocks are licensed for new, flexible use. An 11 megahertz guard band or “duplex gap” protects against harmful interference between 600 MHz uplink and downlink services, and a three megahertz guard band protects against harmful interference between 600 MHz downlink services and channel 37. Channel 37 itself, along with the three megahertz guard band, serves as a guard band between 600 MHz downlink services and television services, which occupy the UHF spectrum down from channel 36 down. In the second example, 126 megahertz of television spectrum is repurposed. Ten 5+5 megahertz paired blocks are licensed for new, flexible use. The duplex gap is 11 megahertz, there are three megahertz guard bands on either

side of channel 37, and a nine megahertz guard band between 600 MHz downlink services and television services, which occupy the UHF spectrum from channel 29 down.

To encourage entry by providers, including small providers, that contemplate offering wireless broadband service on a localized basis, yet at the same time not precluding carriers that plan to provide service on a much larger geographic scale, the Commission determined to license the 600 MHz Band on the basis of Partial Economic Areas (“PEAs”), a subdivision of Economic Areas (“EAs”) created by grouping areas using Metropolitan Statistical Area (“MSA”) boundaries, updated with 2010 U.S. Census data for each county.³

PEAs offer a compromise between EAs and Cellular Market Areas (“CMAs”) because they are smaller than EAs, yet “nest” (or fit) within EAs, and can be easily aggregated into larger areas, such as Major Economic Areas (“MEAs”) and Regional Economic Areas (“REAs” or “REAGs”). Like CMAs, PEAs divide urban and rural areas into separate service areas. The Commission concluded that this approach strikes the appropriate balance by allowing both smaller and larger wireless carriers to obtain licenses that best align with their respective business plans. In addition, because the MSA boundaries may more closely fit many wireless providers’ existing footprints—in particular, smaller, non-nationwide providers—the Commission concluded that adopting this geographic licensing approach should provide a greater opportunity for all wireless providers to acquire spectrum licenses in their service areas without unduly complicating the auction.

2. Repacking

In the repacking process, the Commission will reorganize the television bands by reassigning stations to new channels to make spectrum available to carry out the forward auction. In this process, the Commission will strive to preserve full power and Class A stations’ existing service as of February 22, 2012, without sacrificing the objectives of the incentive auction. While the Commission will use the methodology described in OET Bulletin 69 of the Commission’s Office of Engineering and Technology (“OET-69”)⁴ to determine the coverage area and population served of each station, it updated the computer software and input values used to implement that methodology. Among other things, doing so will ensure that the software is capable of the rapid, complex calculations necessary to support the reverse auction and the repacking process, and that the Commission is relying on the most accurate population and other data available. The Commission will protect full power stations’ coverage areas based on their “service areas,” 47 C.F.R. § 73.622(e), and protect the coverage areas of Class A stations based on their “protected contours,” 47 C.F.R. § 73.6010. The Commission will make all reasonable efforts to preserve the same specific viewers served by full power and Class A stations as of February 22, 2012. The Commission will not allow any channel assignments that, considered on a station-to-station basis, would reduce a station’s population served by more than a *de minimis* (0.5 percent) amount.

In the repacking process, the Commission will protect full power and Class A facilities that already were operating pursuant to a license (or a pending application for a license to cover a construction permit) on February 22, 2012. The Commission will also exercise its discretion to

³ *Wireless Telecommunications Bureau Provides Details About Partial Economic Areas*, GN Docket No. 12-268, Public Notice, DA 14-759, 2014 WL 2464839 (rel. June 2, 2014).

⁴ <http://data.fcc.gov/download/incentive-auctions/OET-69/>.

protect: (1) the small number of new full power television stations that were authorized, but not constructed or licensed, as of February 22, 2012; (2) full power facilities authorized in construction permits issued to effectuate a channel substitution for a licensed station; (3) modified facilities of full power and Class A stations that were authorized by construction permits granted on or before April 5, 2013, the date the Media Bureau issued a freeze on the processing of certain applications; and (4) minor change facilities authorized to implement Class A stations' mandated transition to digital operations. To obtain protection, stations in these four categories will be required to submit an application to license these facilities by the Pre-Auction Licensing Deadline to be announced by the Media Bureau on delegated authority. In addition, all full power and Class A television stations will be required to certify the accuracy of their information in the Commission's Consolidated Database System (CDBS) prior to auction. Moreover, stations affected by the destruction of the World Trade Center may elect which of their facilities to be protected. The deadline for these stations to elect the facility to be protected is the Pre-Auction Licensing Deadline.

The Commission will not protect the following in the repacking process: the facilities of low power television ("LTPV") stations, television translator ("TV translator") stations, and digital replacement translators (DRTs); stations that are eligible for a Class A license but that did not file an application for such license until after February 22, 2012, even if the application is granted before the auction; facilities requested in pending VHF-to-UHF channel substitution rulemaking requests; and facilities operating pursuant to experimental authorizations or Special Temporary Authority ("STA").

The Commission is fully complying with its obligation to ensure that spectrum reassignments and reallocations are coordinated with Canada and Mexico. The Commission expects to reach arrangements with Canada and Mexico that will enable it to carry out the repacking process in a manner that is fully consistent with the requirements of the statute and the Commission's goals for the auction. Wireless operations in the 600 MHz band are subject to current and future international agreements between the United States and Canada and the United States and Mexico. Licensees must not cause interference to, and must accept harmful interference from television broadcast operations in Mexico and Canada, where these services are co-primary in the band.

3. Unlicensed Operations

The Commission determined that the 600 MHz Band guard bands will be available for unlicensed use, thereby making spectrum available for unlicensed devices nationwide. Depending on the amount of spectrum repurposed through the incentive auction, the Commission will make a total of 14 to 28 megahertz of guard band spectrum available for unlicensed use. In addition, the Commission will make an additional six megahertz of spectrum available by allowing unlicensed use of channel 37 at locations where it is not in use by channel 37 incumbents, subject to the development of the appropriate technical parameters to protect the incumbent WMTS and Radio Astronomy Service ("RAS") from harmful interference. Following the incentive auction and the post-auction transition, television white space ("TVWS") devices may continue to operate on channels allocated and assigned for primary television services, consistent with the Commission's current rules. The Commission anticipates that there will be at least one channel not assigned to a television station in all areas at the end of the repacking process, and intends, after additional notice and opportunity for public input, to designate one such channel in each area for shared use by wireless microphones and TVWS

devices. The Commission expects a significant amount of spectrum to be available for continued TVWS use, particularly outside of the central urban areas of the largest television markets. Any other unused television channels in a market following the incentive auction will also be available for TVWS device as well as wireless microphone use. The Commission will initiate a rulemaking proceeding after the release of this Order to consider changes to its existing Part 15 rules to facilitate unlicensed use of the television bands, 600 MHz Band guard bands, and channel 37.

4. Other Services

To protect incumbent WMTS and RAS services on channel 37 from harmful interference, the Commission adopted guard bands in the 600 MHz Band Plan between such services and any new wireless broadband services that may be deployed adjacent to channel 37. Furthermore, the Commission will require coordination with existing RAS facilities so that any new wireless systems can be deployed to cover the broadest area possible with minimal impact to RAS observatories. The Commission will continue to license fixed broadcast auxiliary service (“BAS”) operations on a secondary basis in the post-auction TV bands.

The Commission adopted measures to facilitate wireless microphone use of available spectrum in the reorganized UHF band. With regard to the 600 MHz Band guard bands, the Commission will allow broadcasters and cable programming networks to operate licensed wireless microphones in a portion of the duplex gap, and permit users generally to operate wireless microphones in the guard bands on an unlicensed basis. The Commission will initiate a proceeding to adopt technical standards to govern these uses. With regard to the remaining television spectrum, while there may no longer be two unused channels for wireless microphones in markets where those channels are currently used for that purpose, the Commission intends to designate one unused channel in each area following the auction for use by wireless microphones and TVWS devices. For some period of time following the incentive auction, the two channels currently available exclusively for wireless microphones may, depending on the particular location, continue to be unused by either broadcasters or 600 MHz Band licensees. To the extent that one or both of these channels remain available for wireless microphones in particular locations, the Commission will continue to prohibit TVWS devices from operating on these channels until the Commission’s rules to improve the TV bands database registration process (providing for more immediate protection from interference by TVWS devices) become effective. After that time, any available channels could be used by either wireless microphones or TVWS devices.

The Commission also revised its rules for co-channel operations in the post-auction television bands to expand the areas where wireless microphones may operate. The Commission will continue to permit wireless microphone users of unused television channels to register to obtain needed protection from unlicensed TVWS devices on such channels through the TV bands database registration system, which the Commission plans to improve to make protection more timely and effective. The Commission will also initiate a proceeding in the near future to find additional spectrum for wireless microphone users in other spectrum bands in order to help address their long-term needs.

B. The Incentive Auction Process

The broadcast television spectrum incentive auction will consist of a reverse and a forward auction. The reverse auction will collect information about the prices at which

broadcast television licensees would be willing to voluntarily relinquish some or all of their spectrum usage rights. The forward auction will identify the prices that potential users of repurposed broadcast television spectrum would pay for new licenses to use such spectrum. Provided that the requirements of the final stage rule, detailed below, are met, this information from the reverse and forward auctions will determine: (1) which broadcast television licensees will voluntarily relinquish which spectrum usage rights in exchange for how much of the auction proceeds, and (2) the winning bidders for new flexible use 600 MHz licenses and the prices those bidders will pay.

The Commission adopted rules that will allow the subsequent determination of specific final incentive auction procedures. These rules are codified in Part 1, Subpart Q of the Commission's rules. In addition, as described below, the Commission has determined many significant elements of the incentive auction. A forthcoming pre-auction process will determine both the specific and final auction procedures, based on additional public input, and the auction participants, through an application process. The process will be initiated by the release of the *Incentive Auction Comment Public Notice*, which will solicit public input on final incentive auction procedures, and which will include specific proposals for crucial auction components, such as opening prices. Thereafter, the *Incentive Auction Procedures Public Notice* will specify final procedures, including dates, deadlines, and other final details of the application and bidding processes. The Commission's rules provide for the ability to refine aspects of the reverse and forward auctions if the record developed in response to the *Incentive Auction Comment Public Notice* reflects the need to do so.

1. Reverse Auction Eligibility and Bid Options

Full power and Class A broadcast television licensees will be eligible to participate in the reverse auction, provided they hold a license for the full power or Class A station offered at auction on or before the Pre-Auction Licensing Deadline. They may bid to voluntarily relinquish the spectrum usage rights associated with station facilities that are eligible for protection in the repacking process. Licensees with pending enforcement matters whose bids may result in their holding no broadcast television licenses may participate under a streamlined escrow approach that is consistent with current practice in the sales context. Bidders will have the three bid options specified by the Spectrum Act⁵: (1) license relinquishment; (2) reassignment from a UHF to a VHF channel; and (3) channel sharing. UHF-to-VHF bidders may limit their bids to a high (channels 7 to 13) or low (channels 2 to 6) VHF channel. In addition, bidders will have an option to bid for reassignment from a high VHF channel to a low VHF channel. Post-auction waiver requests involving winning UHF-to-VHF and high-VHF-to-low-VHF bidders' technical operations will be favorably considered. Channel sharing bidders may propose community of license changes if they cannot satisfy signal coverage requirements from their new transmitter sites, provided that the new communities of license meet the same allotment priorities as the current ones and are located in the same Designated Market Areas (DMAs).

2. Reverse Auction Pre-Auction Process

Potential bidders will have to submit certified applications. Potential bidders will have a limited opportunity to make minor changes in their applications in order to make them complete. In order to proceed with the reverse auction, at least two broadcast television licensees that are

⁵ See Middle Class Tax Relief and Job Creation Act of 2012, Pub. L. No. 112-96, §§ 6402 (codified at 47 U.S.C. § 309(j)(8)(G)), 6403 (codified at 47 U.S.C. § 1452), 126 Stat. 156 (2012) (Spectrum Act).

not commonly controlled must file complete pre-auction applications. Channel sharing bidders must submit an executed copy of the channel sharing agreement and provide additional information regarding the proposed channel sharing arrangement. The Commission will protect the identity of licensees that apply to participate in the reverse auction. Specifically, the Commission will maintain the confidentiality of information submitted by all licensees that apply to participate until the results of the reverse auction and the repacking process are announced. The Commission will maintain the confidentiality of information with respect to unsuccessful reverse auction bids for an additional two years. Confidential information will include licensees' names, channels, call signs, facility identification numbers, network affiliations, and any other information necessary to protect licensees' identities.

Between the short-form application filing deadline and the announcement of the results of the reverse auction and the repacking process, all full power and Class A licensees will be prohibited from communicating directly or indirectly any reverse or forward auction applicant's bids or bidding strategies to any other full power or Class A licensee or forward auction applicant, subject to specified exceptions regarding particular common interest holders and parties to a channel sharing agreement. Recognizing that many broadcasters are not familiar with auction processes, the Commission intends to make education regarding the pre-auction application process, including the scope of the prohibition of certain communications, an important part of broadcaster outreach efforts.

3. Reverse Auction Bidding Process

The Commission adopted a descending clock format for the reverse auction. In each bidding round, stations will be offered prices for one or more bid options and will indicate their willingness to relinquish their spectrum usage rights at these prices. The prices offered to each station for options will be adjusted downward as the rounds progress in a way that accounts for the availability of television channels in different bands in the repacking process. "Intra-round bidding" will enable bidders to indicate price levels (between the opening and closing prices in a round) at which they would like to either choose different bid options or drop out of the auction and remain in their home bands. So long as the bidder indicates that it will accept lower prices, the auction will continue to offer lower prices for each bid option until the auction needs the station to exercise one of the options in order to meet the current spectrum clearing target. When all remaining active bidders are needed in this way, the reverse auction for the stage will end. If the final stage rule is satisfied in that stage, then the active bidders are winning bidders, and the price paid to each will be at least as high as the last price it agreed to accept.

4. Forward Auction Pre-Auction Process

The Commission adopted the same size-based small business bidding credits for the forward auction as were applied in auctioning 700 MHz band spectrum: 15 percent for small businesses (defined as entities with average annual gross revenues for the preceding three years not exceeding \$40 million) and 25 percent for very small businesses (defined as entities with average annual gross revenues for the preceding three years not exceeding \$15 million). The Commission intends to initiate a separate proceeding to review the Part 1 designated entity rules. As part of that proceeding, the Commission will consider whether any revisions made to the rules should apply to the incentive auction. Forward auction applicants will be subject to the existing Part 1 competitive bidding rules, with modifications adopted in the Order. Those modifications make explicit provision for aspects of the forward auction bidding process

described below. Those modifications also prohibit communications by forward auction applicants with full power and Class A licensees during the auction process, subject to specified exceptions regarding particular common interest holders.

5. Forward Auction Bidding Process

The Commission adopted an ascending clock auction format for the forward auction. Bidders first will be able to bid for “generic licenses,” or standardized blocks of spectrum, in one or more categories, with final specific licensed frequencies to be determined subsequently. There will be a separate price for each category in each geographic area, and bidders will indicate the number of licenses that they demand at the current prices. The prices generally will rise from round to round, as long as the demand for licenses exceeds their availability. Intra-round bidding will be allowed. Bidders still demanding licenses when the clock prices stop rising in every license category in every area will become winners, provided the final stage rule is satisfied. If the rule is not satisfied, those bidders will have an opportunity to make additional bids in an extended bidding round in order to try to satisfy the final stage rule. Once the prices are no longer rising and the final stage rule is satisfied, winners may indicate their preferences for frequency-specific licenses in an assignment round or a series of rounds. Final license prices will reflect the winning bid amounts from the clock bidding rounds as well as any adjustments from the extended bidding and assignment rounds.

6. Integration of the Reverse and Forward Auctions

The reverse and forward auctions will be integrated in a series of stages. Each stage will consist of a reverse auction and a forward auction bidding process, and additional stages will be run if necessary. Prior to the first stage, the initial spectrum clearing target will be determined. Broadcasters will indicate through the pre-auction application process their willingness to relinquish spectrum usage rights at the opening prices. Based on broadcasters’ collective willingness, the initial spectrum clearing target will be set. The reverse auction bidding process will be run to determine the total amount of incentive payments to broadcasters required to clear that initial amount of spectrum. The forward auction bidding process will follow the reverse auction bidding process. If the final stage rule is satisfied, the forward auction bidding will continue until there is no excess demand, and then the incentive auction will close. If the final stage rule is not satisfied, additional stages will be run, with progressively lower spectrum targets in the reverse auction and less spectrum available in the forward auction, until the rule is satisfied.

The final stage rule is a reserve price with two components, both of which must be satisfied. After an opportunity for comment, the Commission in the *Incentive Auction Procedures Public Notice* will establish specific price and spectrum clearing benchmarks underlying the first component of the reserve price. The first component requires that the average price per MHz-pop for licenses in the forward auction meets or exceeds a certain price per MHz-pop benchmark. The price benchmark will reflect a spectrum clearing benchmark, an amount of spectrum that is anticipated to be repurposed and used for making new spectrum licenses available. If at a particular stage in the auction, the spectrum clearing target is greater than the spectrum clearing benchmark, the first component will be met if the total proceeds of the forward auction exceed the product of the price benchmark, the spectrum clearing benchmark, and the total number of pops covered by licenses offered. This alternative formulation will allow the auction to close if the incentive auction repurposes a relatively large

amount of spectrum for wireless uses, even if the price per-MHz-pop is less than the benchmark price. The second component of the final stage rule requires that the proceeds of the forward auction be sufficient to meet mandatory expenses set forth in the Spectrum Act and any Public Safety Trust Fund amounts needed in connection with FirstNet. If the requirements of both components of the reserve price are met, then the final stage rule is satisfied.

C. The Post-Incentive Auction Transition

1. Auction Completion and Effective Dates/Processing of Bid Payments

Reverse and forward auction “completion,” required for the repacking process to become effective, will occur when the Commission publicly announces that the incentive auction has ended. The repacking process will be “effective,” triggering Commission authority to borrow up to \$1 billion from the U.S. Treasury to use toward the payment of broadcaster and multichannel video programming distributor (“MVPD”) relocation costs, when the results of the reverse and forward auctions and the repacking process are announced. The Commission anticipates that the completion and effectiveness announcements will occur simultaneously. As soon as the auction is complete and the repacking process effective, the Commission anticipates borrowing some or all of the available \$1 billion from the Treasury for reimbursement of broadcaster and MVPD relocation costs. The Commission will share forward auction proceeds with licensees that relinquish spectrum usage rights in the reverse auction as soon as practicable following the successful conclusion of the incentive auction.

2. Broadcast License Modification

Following the release of a Public Notice by the Media and Wireless Bureaus announcing the results of the incentive auction and the repacking process (the “*Channel Reassignment PN*”), stations reassigned to new channels will have three months to file construction permit applications using FCC Form 301, 301-CA, or 340 for any minor changes to their facilities necessary to operate on their new channels. Stations unable to meet this deadline will be able to request a waiver. In these initial minor change applications, stations may propose transmission facilities that slightly extend their coverage contour under certain conditions. After the deadline for filing for these initial minor change applications, the Media Bureau will announce a filing window during which stations may propose expanded facilities, which are limited to minor changes, or alternate channel assignments, which will be considered major change applications and subject to the standard requirements.

The licensee of each channel sharee station and channel sharer station must file an application for a license for the shared channel using FCC Form 302-DTV or 302-CA within three months of the date that the channel sharee station licensee receives its incentive payment.⁶

3. Broadcast Transition Deadlines

Following the three-month application filing deadline, stations reassigned to new channels will have up to 36 months to transition to their new channels. Stations will be assigned deadlines within that period tailored to their individual circumstances. A station reassigned to a new channel must cease operating on its pre-auction channel once such station begins operating

⁶ A “channel sharer” is a licensee that agrees to share its channel with another licensee, but does not bid to relinquish spectrum usage rights to its channel in the reverse auction. A “channel sharee” is a licensee that bids to relinquish spectrum usage rights to its channel in the auction to share a different channel with another licensee.

on its post-auction channel or by the deadline specified in its construction permit for its post-auction channel, whichever occurs earlier, and in no event later than the end of the Post-Auction Transition Period, which is the 39-month period commencing upon the public release of the *Channel Reassignment PN* (“Post-Auction Transition Period”). A station may seek a single extension of up to six months of its original construction deadline. The extension request must be filed electronically in CDBS using FCC Form 337 no less than 90 days before the expiration of the construction permit. Licensees needing additional time beyond such a single extension of time to complete construction shall be subject to the tolling provisions in 47 C.F.R. § 73.3598. Stations may request Special Temporary Authority (“STA”) to operate with temporary facilities while they complete construction.

Licensees that successfully bid to turn in their licenses or to share a channel will have three months from their receipt of auction proceeds to cease operations on their pre-auction channels, at which time they must file a letter of notification of termination.

4. Notification to Consumers

Transitioning Stations (i.e., full power and Class A stations moving to new channels, relinquishing their licenses, or engaged in a sharing arrangement) must air notifications for a minimum of 30 days prior to the date that the station will terminate operations on its pre-auction channel. These notifications will be a mix of PSAs and crawls, and must meet certain duration requirements. Transitioning Stations that operate on a noncommercial educational (“NCE”) basis have the option to instead air 60 seconds per day of on-air consumer education PSAs, in variable timeslots, for 30 days prior to the station’s termination of operations on its pre-auction channel. Licensees of Transitioning Stations, except for license relinquishment stations, must place a certification of compliance with these requirements in their online public file within 30 days after beginning operations on their post-auction channels. License relinquishment stations must include the certification in their notification of discontinuation of service pursuant to 47 C.F.R § 73.1750. Small entities may need legal and engineering services to comply with these requirements.

5. Notification to MVPDs

Transitioning Stations must provide notice to those MVPDs that: (1) no longer will be required to carry the station because it will cease operations or because of the relocation of a channel sharing sharee station; (2) currently carry and will continue to be obligated to carry a station that will change channels; or (3) will become obligated to carry a station due to a channel sharing relocation. The required notice must be provided in the form of a letter notification and contain the following information: (1) date and time of any channel changes; (2) pre-auction and post-transition channel assignments; (3) modification, if any, to antenna position, location, or power levels; (4) stream identification information for channel sharing stations; and (5) engineering staff contact information. Should any of this information change during the station’s transition, an amended notification must be sent. Transitioning Stations must provide notice within the following time frames: (1) for successful license relinquishment bidders, not less than 30 days prior to terminating operations; (2) for channel sharing sharee stations, not less than 30 days prior to terminating operations of the sharee’s pre-auction channel; (3) for all channel sharing stations (i.e., both the sharer station and sharee station(s)), not less than 30 days prior to initiation of operations on the sharer channel; and (4) for all other stations transitioning to a new channel, including stations that are assigned to new channels in the repacking process and successful

UHF-to-VHF and high-VHF-to-low-VHF bidders, not less than 90 days prior to the date on which they will begin operations on their reassigned channel. In addition, should a station's anticipated transition date change due to an unforeseen delay or change in transition plan, the station must send a further notice to affected MVPDs informing them of the new anticipated transition date.

6. Broadcaster Relocation Reimbursement

Full power and Class A television stations who are involuntarily reassigned in the repacking process, as well as MVPDs that incur costs in order to continue to carry a station that is voluntarily or involuntarily reassigned in the repacking process, are eligible to seek reimbursement of their reasonably incurred costs from the \$1.75 billion TV Broadcaster Relocation Fund established by Congress for that purpose. The Commission must make any relocation reimbursements from the TV Broadcaster Relocation Fund within three years of the completion of the forward auction (the "Reimbursement Period").

Following the public release of the *Channel Reassignment PN*, eligible entities will have three months to submit a form indicating their estimated costs in order to receive an initial allocation of funds from the TV Broadcaster Relocation Fund. To make these estimates, eligible entities will use a Catalog of Eligible Expenses that includes a list of many, but not all, of the changes an entity may have to make, as well as the predetermined cost estimates for those changes. Prior to the end of the three-year Reimbursement Period, entities must provide all information and documentation, including invoices and receipts, regarding their actual expenses incurred and any remaining estimated expenses in order to receive a final allocation, if appropriate. If an entity has not completed all construction or reimbursable changes by the final allocation deadline (which will be determined by the Media Bureau), eligible entities must submit final expense documentation upon completion of such changes. Eligible entities will be required to make several certifications that estimates are in good faith; it will use the funds in good faith; it will comply with all Commission policies and procedures regarding the funds; it will maintain detailed records; and it will file all required documentation.

Eligible entities that receive payment from the TV Broadcaster Relocation Fund are required to submit progress reports at a date and frequency to be determined by the Media Bureau. Each eligible entity that receives payment from the TV Broadcaster Relocation Fund is required to retain all relevant documents pertaining to construction or other reimbursable changes for a period ending not less than 10 years after the date on which it receives final payment from the TV Broadcaster Relocation Fund.

The Commission or its authorized contractor will conduct audits of, data validations for, and site visits to entities that receive disbursements from the TV Broadcaster Relocation Fund, both during and following the three year Reimbursement Period. All relevant documentation must be provided to the Commission or its authorized contractor upon request.

In lieu of being reimbursed for their relocation costs, full power and Class A television stations that are assigned new channels in the repacking process and are eligible for reimbursement from the TV Broadcaster Relocation Fund may request a waiver of any Commission service rules to permit flexible use of their spectrum. Service rule waiver requests must demonstrate that the licensee will protect against interference and provide at least one broadcast television program stream at no charge to the public. The waiver requests will be evaluated by the Media Bureau on a case-by-case basis, in accordance with the Commission's

general waiver standard. The Media Bureau will accept waiver requests during a 30-day window commencing upon the public release of the *Channel Reassignment PN*. Licensees may request a waiver on a temporary or a permanent basis. A licensee will have 10 days following grant of the waiver by the Media Bureau to accept the terms of its waiver. Once a licensee accepts the terms of its waiver, it will no longer be eligible for reimbursement from the TV Broadcaster Relocation Fund. Licensees must meet all requirements for obtaining reimbursement until they are granted and accept the terms of their waiver. Unless otherwise instructed by the Media Bureau, licensees that are granted and accept the terms of a waiver or licensees with a pending waiver request must comply with all filing and notification requirements, construction schedules, and other post-auction transition deadlines, established in the Order.

7. Transition Procedures for Other Services

i. LPTV and TV Translators

The Media Bureau, on delegated authority, will open a special filing window for LPTV and TV translator stations, including DRTs, that are displaced to select a new channel. Displaced LPTV and TV translator stations, including DRTs, will be required to file displacement applications during this window. DRT displacement applications will receive a processing priority over other displacement applications.

The Commission also intends to initiate a rulemaking proceeding after the release of the Order to consider additional means to mitigate the potential impact of the incentive auction and the repacking process on LPTV and TV translator stations.

Displaced LPTV and TV translator stations may continue to operate on channels reallocated for the new 600 MHz Band but must terminate operations upon notification by a 600 MHz band licensee. Specifically, new 600 MHz wireless licensees must provide LPTV and TV translator stations 120 days' notice of their intent to commence operations in areas of their geographic licenses where there is a likelihood of receiving harmful interference from an LPTV or TV translator station. The notice from the 600 MHz licensee to the LPTV/TV translator station must take the form of a letter, by certified mail, return receipt requested. After receiving such notification, the LPTV or TV translator station must cease operations or reduce power in order to eliminate the potential for harmful interference to the operations of the 600 MHz licensee. LPTV and TV translator stations operating on channels that include frequencies repurposed for 600 MHz Band guard band use (including the duplex gap) must cease operations on those frequencies no later than the end of the Post-Auction Transition Period (i.e., 39 months after the public release of the *Channel Reassignment PN*). In addition, an LPTV or TV translator licensee operating in spectrum reserved for the guard bands will be required to cease operating prior to that date if any 600 MHz Band licensee has notified it that their operations would be likely to cause harmful interference in areas where the wireless licensee intends to commence operations. Displaced LPTV and TV translator stations will be eligible to file an application for a new channel in the displacement window discussed above.

ii. Broadcast Auxiliary Services ("BAS")

The Commission decided to continue to license fixed BAS on a secondary basis in the UHF spectrum that remains allocated and assigned to full power television services nationwide. However, fixed BAS stations must cease operating and/or relocate out of the 600 MHz Band repurposed for wireless services, at their own expense, no later than the end of the Post-Auction

Transition Period (i.e., 39 months after public release of the *Channel Reassignment PN*). The Commission will also require BAS operations on channels that include frequencies that will be reserved for guard bands to cease operations no later than the end of the Post-Auction Transition Period.

In addition, if a new 600 MHz licensee intends to commence operations before the end of the Post-Auction Transition Period, the 600 MHz licensee must provide 30 days' advance notice to the BAS operator that it intends to commence operations and that the BAS station is likely to cause harmful interference to those operations. The BAS operator must cease operating on that channel within 30 days of receiving notice. The notice from the 600 MHz licensee to the BAS licensee must take the form of a letter, by certified mail, return receipt requested.

In addition, as a secondary service, BAS may not cause interference to repacked television stations. Should a repacked broadcast television licensee in the 600 MHz Band or the repacked UHF Band experience harmful interference from a BAS licensee, the BAS licensee must, pursuant to the Commission's rules, immediately cease operations and may not resume operations until the interference problem is resolved. 47 C.F.R. §§ 74.602(h), 74.702, 74.803(b).

iii. Television White Space ("TVWS") and Unlicensed Devices

The continued operation of TVWS devices on repurposed spectrum will be permitted, except in those areas in which a 600 MHz Band licensee commences operations. Since TVWS devices can operate only on channels identified in the TV bands databases, these databases can serve to ensure that unlicensed operations will no longer occur on a channel on which a licensee has commenced service. When a 600 MHz Band licensee plans to commence operations on frequencies that include channels available for unlicensed operations under the rules for TVWS devices, that licensee can notify any of the TV bands database administrators when and where it plans to commence operations. Through these actions, the TV bands databases would be updated and would preclude unlicensed operations in those areas.

iv. Low Power Auxiliary Station ("LPAS") and Unlicensed Wireless Microphones

Wireless microphone users may continue to operate in the 600 MHz Band during the Post-Auction Transition Period (i.e., for 39 months after public release of the *Channel Reassignment PN*), subject to certain conditions designed to protect the 600 MHz licensees' primary rights to make full use of their licensed spectrum. Specifically, for this transition period, to the extent that either licensed LPAS or unlicensed wireless microphone users operate in the 600 MHz Band, consistent with their secondary or unlicensed status they will not be entitled to any interference protection from operations of the primary 600 MHz licensees. The Commission will also require that wireless microphone users cease any operations in the 600 MHz Band if their operations cause harmful interference to any 600 MHz licensee's operations. Finally, the Commission established a hard date by which all wireless microphone operations must be transitioned out of the 600 MHz Band, requiring that all such operations cease no later than the end of the Post-Auction Transition Period (i.e., 39 months after public release of the *Channel Reassignment PN*). Similarly, the Commission required that wireless assist video devices cease operations in the 600 MHz Band no later than the end of the Post-Auction Transition Period. During the Post-Auction Transition Period, such operations are permitted on a secondary basis, but they are not entitled to interference protection from operations of primary 600 MHz band

licensees, and operations must cease if they cause harmful interference to operations of 600 MHz Band licensees.

D. Post-Transition Regulatory Matters

1. Broadcast Media Ownership Rules and Diversity

The Commission will grandfather existing broadcast station combinations that otherwise would no longer comply with the media ownership rules as a result of the reverse auction. Absent a waiver of the rules, however, the Commission will not accept channel sharing bids in the reverse auction that would cause a media ownership rule violation by a party to the channel sharing arrangement based on the rules and facts as they exist at the time the application to participate in the auction is filed. The Commission will conduct extensive outreach to broadcasters, including minority- and female-owned broadcasters, to ensure that they are fully informed about the incentive auction.

2. Channel Sharing Operating Rules

The Commission required that channel sharing agreements (“CSAs”) include certain key provisions regarding licensee rights and responsibilities. Specifically, in addition to the existing requirement regarding access to shared channel capacity, CSAs must contain provisions outlining each licensee’s rights and responsibilities in the following areas: (1) access to facilities, including whether each licensee will have unrestrained access to the shared transmission facilities; (2) allocation of bandwidth within the shared channel; (3) operation, maintenance, repair, and modification of facilities, including a list of all relevant equipment, a description of each party’s financial obligations, and any relevant notice provisions; and (4) termination or transfer/assignment of rights to the shared licenses, including the ability of a new licensee to assume the existing CSA. Channel sharing partners may craft provisions as they choose, based on marketplace negotiations, subject to pertinent statutory requirements and the Commission’s rules and regulations. CSAs also must include a provision affirming compliance with the channel sharing requirements in this Order, the *Channel Sharing Report and Order*,⁷ and the Commission’s rules. The Commission reserves the right to review CSA provisions and require modification of any that do not comply with these requirements or the Commission’s rules.

If a channel sharing station’s license is terminated due to voluntary relinquishment, revocation, failure to renew, or any other circumstance, the remaining channel sharing station or stations will continue to have rights to their portion(s) of the shared channel. The rights to the terminated portion of the shared channel will revert to the Commission for reassignment. The Commission will allow rights under a CSA to be assigned or transferred, subject to the requirements of Section 310 of the Communications Act, the Commission’s rules, and the requirement that the assignee or transferee comply with the applicable CSA.

A noncommercial educational (“NCE”) licensee operating on a reserved channel, whether it relinquishes its channel in order to share a non-reserved channel or agrees to share its reserved channel with a commercial station, will retain its NCE status and must continue to comply with the rules applicable to NCE licensees. In either case, the NCE station’s portion of

⁷ See *Innovation in the Broadcast Television Bands: Allocations, Channel Sharing and Improvements to VHF*, Report and Order, 27 FCC Rcd 4616 (2012).

the shared channel (which, at a minimum, must enable the broadcast of one standard definition (“SD”) programming stream) will continue to be reserved for NCE-only use. A reserved-channel NCE sharing station may assign its license only to a qualified NCE entity. If a reserved-channel NCE sharing station’s license is relinquished or terminated, only another entity meeting the NCE eligibility criteria will be considered for reassignment of the license.

The Commission adopted rules governing the power levels at which stations may operate when both a full power and a Class A station participate in a channel sharing agreement. A Class A station will operate under the Part 73 rules governing power levels and interference if it shares a full power television station’s channel. A full power station sharing a Class A station’s channel must operate under the Part 74 power level and interference rules.

A channel sharing station is entitled to the same cable and satellite carriage rights at its shared location as it would have at that same location were it not channel sharing. A Class A station that channel shares with a full power sharer will have only those carriage rights to which a Class A station would be entitled at the shared location were it not sharing. A full power sharee, whether a commercial or NCE station, that channel shares with a Class A licensee will have the same carriage rights at the channel sharing location that a non-channel sharing full power station would have at that location. If, as a result of a successful channel sharing bid, a station relocates to a different community of license within its DMA, its carriage rights will not be expanded or diminished, but its ability to exercise these rights may change based upon the facts of its specific channel sharing arrangement. For example, certain NCE and Class A stations may gain carriage on some cable systems, but lose carriage on others, as a result of the movements of their facilities or the changes in their communities of license. In addition, a full power commercial station that relocates within its DMA may gain carriage on some cable systems, but lose carriage on others, as a result of market modification requests. A broadcaster may seek to add communities to its market which it can now reach from its new location, and, conversely, a cable system may seek to exclude communities from the broadcaster’s market that the station no longer serves as a result of its move.

Stations changing their communities of license or signal contours as a result of channel sharing may impact other Commission rules, such as the cable network nonduplication rules, the syndicated exclusivity rules, and their status as “significantly viewed” in certain counties or communities.

3. 600 MHz Band Service Rules

i. Flexible Use

The Commission adopted flexible-use service rules for the 600 MHz Band. 600 MHz Band licensees may use the licensed, 600 MHz Band spectrum for any use permitted by the Table of Allocations, provided that the licensee complies with the applicable service rules.

ii. Regulatory Framework

The Commission decided that the flexible Part 27 rules should be applied to the 600 MHz Band. The regulatory framework will establish the license term, criteria for renewal, and other licensing and operating rules that will govern operations in the 600 MHz Band.

iii. Regulatory Status

Licenses in the 600 MHz may provide common carrier, non-common carrier, private internal communications, or any combination of these services, so long as the provision of service otherwise complies with applicable service rules. Applicants and licensees in the 600 MHz Band must identify the regulatory status of the service(s) they intend to provide, but are not be required to describe their particular services. The Commission reminded potential applicants that an election to provide service on a common carrier basis requires that the elements of common carriage be present; otherwise the applicant must choose non-common carrier status. If a potential applicant is unsure of the nature of its services and its classification as common carrier services, it may submit a petition to the Commission with its applications, or at any time, requesting clarification and including service descriptions for that purpose.

If a licensee elects to change the service or services it offers such that its regulatory status would change, it must notify the Commission within 30 days of making the change. A change in the licensee's regulatory status will not require prior Commission authorization, provided the licensee is in compliance with the foreign ownership requirements of Section 310(b) of the Communications Act that apply as a result of the change. The Commission noted that a different time period (other than 30 days) may apply, as determined by the Commission, where the change results in the discontinuance, reduction, or impairment of the existing service.

iv. Eligibility

The Commission found that open eligibility is appropriate for the 600 MHz Band and is consistent with the Commission's statutory mandate to promote the development and rapid deployment of new technologies, products, and services; economic opportunity and competition; and the efficient and intensive use of the electromagnetic spectrum. The Commission also clarified that adopting open eligibility for the 600 MHz Band is not inconsistent with the spectrum aggregation rules it established in the Mobile Spectrum Holdings Report and Order.⁸

v. Foreign Ownership

The Commission determined that all 600 MHz applicants and licensees shall be subject to the provisions of Section 27.12 of the Commission's rules. All such entities are subject to Section 310(a) of the Communications Act, which prohibits licenses from being "granted to or held by any foreign government or the representative thereof." In addition, a licensee that would provide a common carrier, aeronautical en route, or aeronautical fixed service in this band would also be subject to the foreign ownership and citizenship requirements in Section 310(b) of the Communications Act.

All 600 MHz applicants and licensees must provide the same foreign ownership information, which covers both Sections 310(a) and 310(b), regardless of which service they propose to provide in the band. The Commission expects it would be unlikely to deny a license to an applicant requesting to provide services exclusively that are not subject to Section 310(b), solely because its foreign ownership would disqualify it from receiving a license if the applicant had applied for authority to provide Section 310(b) services. However, if any such licensee later desires to provide any services that are subject to the restrictions in Section 310(b), the

⁸ See *Policies Regarding Mobile Spectrum Holdings*, WT Docket No. 12-269, Report and Order, FCC 14-63, 2014 WL 2505353 (rel. June 2, 2014) (*Mobile Spectrum Holdings Report and Order*).

Commission will require the licensee to apply to the Commission for an amended license, and the Commission would consider issues related to foreign ownership at that time.

vi. License Term

The Commission adopted a 12-year initial license term for the 600 MHz Band licenses, and subsequent renewal terms of ten years. In addition, the Commission required that, in the event that the license is partitioned or disaggregated, any partitionee or disaggregatee will be authorized to hold its license for the remainder of the partitioner or disaggregator's license term.

vii. Performance Requirements

Population-based benchmarks will be used to measure the 600 MHz Band's performance requirements within each PEA-based license. The Commission adopted the following build-out requirements:

- *600 MHz Band interim build-out requirement:* Within six (6) years of initial license grant, a licensee shall provide reliable signal coverage and offer service to at least forty (40) percent of the population in each of its license areas.
- *600 MHz Band final build-out requirement:* Within twelve (12) years of initial license grant (or at the end of the license term), a licensee shall provide reliable signal coverage and offer service to at least seventy-five (75) percent of the population in each of its license areas.

In addition, the Commission adopted the following penalties for failure to meet the build-out benchmarks:

- *Failure to meet 600 MHz Band interim build-out requirement:* Where a licensee fails to meet the 600 MHz Band interim build-out requirement in any license area, the 600 MHz initial license term and the final build-out requirement for that license shall be accelerated by two years (for both the license term and final requirement, from twelve to ten years).
- *Failure to meet 600 MHz final build-out requirement:* Where a licensee fails to meet the 600 MHz Band final build-out requirement for any license area, its authorization for each license area shall terminate automatically without further Commission action, and the licensee will be unable to regain the license.

Compliance Procedures. Licensees must certify compliance by filing a construction notification that they have met the benchmark within 15 days of the relevant milestone. Each construction notification must include electronic coverage maps and supporting documentation, which must be truthful and accurate and must not omit material information that is necessary for the Commission to determine compliance with its performance requirements.

The Commission emphasized that electronic coverage maps must accurately depict the boundaries of each license area in the licensee's service territory. If a licensee does not provide reliable signal coverage to an entire PEA, its map must accurately depict the boundaries of the area or areas within each PEA not being served. Each licensee also must file supporting documentation certifying the type of service it is providing for each PEA within its service territory and the type of technology used to provide such service. Supporting documentation must include the assumptions used to create the coverage maps, including the propagation model and the signal strength necessary to provide reliable service with the licensee's technology.

Licensees must use the most recently available decennial U.S. Census Data at the time of measurement to meet the population-based build-out requirements. Specifically, a licensee must base its claims of population served on areas no larger than the Census Tract level.

Gulf of Mexico. A 600 MHz Band licensee serving the Gulf of Mexico shall within six years provide reliable signal coverage and offer wireless service to at least 40 percent of all off-shore platforms in its license area and within 12 years (or at the end of the license term), provide reliable signal coverage and offer wireless service to at least 75 percent of all off-shore platforms in its license area in the Gulf of Mexico. All penalties and other compliance procedures adopted, excluding those discussing the methodology for meeting population-based build-out requirements, apply to a 600 MHz Band licensee with respect to its Gulf of Mexico license.

Performance Requirements of Impaired Licenses. The Commission plans to offer “impaired” licenses in the forward auction, i.e., licenses that contain areas within the license area where a wireless licensee may not be able to provide service because it would interfere with a broadcast television licensee’s coverage area, or conversely, those license areas in which a wireless provider may receive harmful interference from remaining television operations in or near the 600 MHz Band licensee’s area of operation. A licensee with a geographic service area that includes any impairments may meet the build-out benchmarks by providing reliable signal coverage and offering service to the relevant percentages of population in the service area that is not impaired. To the extent this applies to a licensee’s particular impaired license, at the relevant construction benchmarks, a licensee must provide with its construction notification an explanation of why it cannot serve its entire license area and/or meet its performance requirements within the entire license area. The submission must be truthful and accurate and must not omit material information that is necessary for the Commission to determine whether the licensee could have reasonably met its performance requirements for its entire license area.

viii. Renewal Criteria

The Commission found that all 600 MHz Band licensees seeking renewal of their authorizations at the end of their license term must file a renewal application, demonstrating that they have been and are continuing to provide service to the public over the license term (or, if consistent with the licensee’s regulatory status, that it used the spectrum for private, internal communication), and are otherwise complying with the Commission’s rules and policies (including any applicable performance requirements) and with the Communications Act. The Commission emphasized that the concept of a renewal showing is distinct from a performance showing. A performance showing provides a snapshot in time of the level of a licensee’s service, while a renewal showing provides information regarding the level and types of service provided over the entire license term. The Commission explained that a licensee that meets the applicable performance requirements might nevertheless fail to meet the renewal requirements.

The Commission adopted the following renewal criteria requirements. The Commission required that the renewal showing include a detailed description of the renewal applicant’s provision of service during the entire license period and discuss: (1) the level and quality of service provided by the applicant (e.g., the population served, the area served, the number of subscribers, the services offered); (2) the date service commenced, whether service was ever interrupted, and the duration of any interruption or outage; (3) the extent to which service is provided to rural areas; (4) the extent to which service is provided to qualifying Tribal land as defined in Section 1.2110(e)(3)(i) of the Commission’s rules; and (5) any other factors associated

with the level of service to the public. A licensee must also demonstrate at renewal that it has complied with all applicable Commission rules and policies, and the Communications Act, including any applicable performance requirements. For subsequent license terms, licensees are likely—absent extraordinary circumstances—to obtain license renewal if they submit satisfactory showings demonstrating that they have maintained or exceeded the level of coverage and service required at the final build-out benchmark (during the initial license term) and otherwise complied with Commission rules and policies and the Communications Act.

ix. Permanent Discontinuance of Operations

A 600 MHz Band operator’s authorization will automatically terminate, without specific Commission action, if service is “permanently discontinued,” as set forth in Section 1.955(a)(3) of the Commission’s rules. For providers that identify their regulatory status as common carrier or non-common carrier, “permanently discontinued” is defined as a period of 180 consecutive days during which the licensee does not provide service to at least one subscriber that is not affiliated with, controlled by, or related to, the provider in a PEA (or smaller service area in the case of a partitioned PEA license). For licensees that use their licenses for private, internal communications, because such licensees generally do not provide service to unaffiliated subscribers, “permanent discontinuance” shall be defined as a period of 180 consecutive days during which the licensee does not operate. The operation of so-called channel keepers, e.g., devices that transmit test signals, tones, and/or color bars, do not constitute “operation” under Section 1.955(a)(3) or the Commission’s other permanent discontinuance rules.

Further, consistent with this rule, if a licensee permanently discontinues service, the licensee must notify the Commission of the discontinuance within ten days by filing FCC Form 601 or 605 and requesting license cancellation. However, even if the licensee fails to file the required form requesting license cancellation, an authorization will automatically terminate without specific Commission action if service is permanently discontinued. A licensee will not be subject to the discontinuance rules until the date it must meet its interim build-out requirement, thereby negating the possibility that a licensee will lose its license if it chooses to construct early, but may discontinue operations before the interim build-out benchmark date. The permanent discontinuance rules will apply thereafter, to include any subsequent license renewal term.

x. Secondary Markets

Qualifications under Section 6004. In the *H Block Report and Order*,⁹ the Commission adopted Section 27.12(b), which restricts entities from holding licenses if they have been barred by a federal agency for reasons of national security, in accordance with Section 6004 of the Spectrum Act. Because that rule implements a statutory provision that applies to all spectrum bands covered under the Spectrum Act, Section 27.12(b) applies to the 600 MHz Band. Pursuant to Section 27.12(b), 600 MHz Band licensees are required to certify in an application seeking approval of a secondary market transaction involving 600 MHz Band licenses that neither the applicants nor any party to the application are persons barred from participating in an auction under Section 6004 of the Spectrum Act.

⁹ *Service Rules for Advanced Wireless Services H Block – Implementing Section 6401 of the Middle Class Tax Relief and Job Creation Act of 2012 Related to the 1915-1920 MHz and 1995-2000 MHz Bands*, WT Docket No. 12-357, Report and Order, 28 FCC Rcd 9483 (2013) (*H Block Report and Order*).

Partitioning and Disaggregation. Geographic partitioning and spectrum disaggregation are permitted in the 600 MHz Band.¹⁰ If a 600 MHz Band license is partitioned or disaggregated, the partitionee or disaggregatee will be authorized to hold its license for the remainder of the partitioner or disaggregator's license term. A licensee, by partitioning or disaggregation, will not be able to confer greater rights than it was awarded under the terms of its license grant; nor would any partitionee or disaggregatee obtain rights in excess of those previously possessed by the underlying Commission licensee. Each 600 MHz Band licensee that is a party to a partitioning or disaggregation arrangement (or combination of both) is required to independently meet the applicable 600 MHz Band performance and renewal requirements.

Spectrum Leasing. The Commission's current spectrum leasing policies, rules, and procedures contained in Part 1 of the Commission's rules will be applied to the 600 MHz Band in the same manner as those policies, rules, and procedures apply to other Part 27 services.¹¹

xi. Other Operating Requirements

The Commission adopted rules for the 600 MHz Band under Part 27 of the Commission's rules, and in order to maintain general consistency among various wireless communication services, the Commission also required 600 MHz Band licensees to comply with other rule parts that pertain generally to wireless communication services. For example, Section 27.3 of the Commission's rules lists some of the other rule parts applicable to wireless communications service licensees generally. The Commission thus found it appropriate to apply this and similar rules to the 600 MHz Band. Some of these other rule parts will be applicable by virtue of the fact that they apply to all licensees, and others will apply depending on the type of service that a licensee provides. For example:

- Applicants and licensees will be subject to the application filing procedures for the Universal Licensing System, set forth in Part 1 of the Commission's rules.
- Licensees will be required to comply with the practices and procedures listed in Part 1 of the Commission's rules for license applications, adjudicatory proceedings, etc.
- Licensees will be required to comply with the Commission's environmental provisions, including Section 1.1307 of the Commission's rules.
- Licensees will be required to comply with the antenna structure provisions in Part 17 of the Commission's rules.
- To the extent a licensee provides a Commercial Mobile Radio Service, such service is subject to the provisions in Part 20 of the Commission's rules, including 911/E911 and hearing-aid compatibility requirements, along with the provisions in the rule part under which the license was issued.
- To the extent a licensee provides interconnected VoIP services, the licensee will be subject to the E911 service requirements set forth in Part 9 of the Commission's rules.
- The application of general provisions in Parts 22, 24, 27, or 101 of the Commission's rules will include rules related to equal employment opportunity, etc.

¹⁰ See *Mobile Spectrum Holdings Report and Order* at Section VI.G.1 for certain limitations on secondary market transactions in the 600 MHz Band.

¹¹ See *id.*

4. 600 MHz Band Technical Rules

i. Out-of-Band Emission Limits

Interference to Adjacent 600 MHz Block Operations. The Commission adopted Section 27.53(g) of the Commission's rules for the 600 MHz Band, which requires that all out-of-band emissions (OOBE) be attenuated by at least $43+10*\log_{10}(P)$ dB, where (P) is the transmitter power in watts, for transmission outside the 600 MHz Band.

Interference to Television Operations. Under the 600 MHz Band Plan, the lower end of the 600 MHz Band downlink band will likely be adjacent to broadcast television operations, with a guard band between the two services. Under the 600 MHz Band Plan, mobile uplink operations are not adjacent to television broadcast spectrum and will therefore not interfere with television receivers. The Commission will similarly apply Section 27.53(g) of the Commission's rules to protect against interference to television operations. This OOBE requirement, in conjunction with the guard bands established, will prevent harmful interference to television and channel 37 operations.

ii. Power Limits

For 600 MHz Band downlink operations, the Commission decided to limit fixed and base station power for downlink operations in non-rural areas to 1000 watts ERP for emission bandwidths less than 1 MHz and to 1000 watts per 1 MHz ERP for emission bandwidths greater than one megahertz, and to double these limits to 2000 watts or 2000 watts/MHz ERP in rural areas, provided advance notice is given. In addition, the Commission decided not to apply the power flux density requirements of Section 27.55(b) to the 600 MHz Band because there is no provision for high powered (50 kW) stations within the 600 MHz Band. In the 600 MHz uplink band, the Commission decided to adopt the same power limit of three watts ERP for both portables and mobiles,¹² and prohibit higher-powered control station operations.

iii. Base Station Antenna Height Restrictions

The Commission found that specific antenna height restrictions for 600 MHz Band base stations are not necessary. The general requirement to not endanger air navigation and the effective height limitations implicitly resulting from the co-channel interference rules obviate the need for specific antenna height restrictions for 600 MHz Band licensees.

iv. Co-Channel Interference Between 600 MHz Band Wireless Broadband Systems

The Commission adopted Section 27.55(a)(2) of the Commission's rules to include the 600 MHz Band. This rule limits field strength levels at the edge of a license area to 40 dB μ V/m to protect adjacent wireless broadband systems from interfering with one another.

v. Interoperability Rule

The Commission adopted an interoperability requirement for the 600 MHz Band. Specifically, the Commission requires that user equipment certified to operate in any portion of the 600 MHz Band must be capable of operating throughout the 600 MHz Band.¹³ The

¹² See 47 C.F.R. § 27.50(c)(10).

¹³ See 47 C.F.R. §§ 27.55(a)(2); 2.1033.

Commission made clear that the interoperability requirement applies to the entire 600 MHz Band, regardless of how many band classes may be created by standards-setting bodies to cover this spectrum assigned for flexible-use licenses (i.e., devices must support the entire 600 MHz Band, regardless of whether services are provided over one 5+5 megahertz block, or multiple spectrum blocks).

vi. Other Technical Issues

In addition to the specific technical issues addressed above, the Commission decided to apply several Part 27 rules to the 600 MHz Band: equipment authorization, radio frequency (“RF”) safety, frequency stability, antennas structures; air navigation safety, and disturbance of AM broadcast station antenna patterns. Additionally, because some broadcasters may remain in the 600 MHz Band in areas close enough in proximity to new 600 MHz licensees that certain wireless licensees may not be able to operate within the entire boundary of their license (i.e., these 600 MHz licensees will hold an “impaired” license), the Commission explained that it will provide further guidance on the obligations of 600 MHz licensees holding impaired licenses, including any additional or modified technical rules that may apply only to licensees in these impaired areas.

III. INTERNET LINKS

Report and Order

- https://apps.fcc.gov/edocs_public/attachmatch/FCC-14-50A1.docx
- https://apps.fcc.gov/edocs_public/attachmatch/FCC-14-50A1.pdf
- https://apps.fcc.gov/edocs_public/attachmatch/FCC-14-50A1.txt