

Before the  
**FEDERAL COMMUNICATIONS COMMISSION**  
Washington, DC 20554

In the Matter of	)	
	)	
Review of the Commission's Rules Governing	)	WT Docket No. 17-200
the 896-901/935-940 MHz Band	)	
	)	

**REPLY COMMENTS OF THE CRITICAL INFRASTRUCTURE COALITION**

Alliant Energy  
Duke Energy Corporation  
Edison Electric Institute  
Exelon Corporation and Subsidiaries  
PECO Energy Company and  
Commonwealth Edison Company  
Harris Corporation  
Lower Colorado River Authority  
National Association of Water Companies  
NextEra Energy, Inc.  
Sensus USA Inc.

November 1, 2017

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The Critical Infrastructure Coalition (“CIC” or “Coalition”)<sup>1</sup> respectfully submits this reply to initial comments submitted in response to the Commission’s Notice of Inquiry (“*NOI*”) in the above-referenced proceeding.<sup>2</sup>

**I. INTRODUCTION AND SUMMARY**

The Critical Infrastructure Coalition supports the numerous commenters who share its concerns with the *NOI* proposals to reconfigure the 896-901/935-940 MHz band (“900 MHz band”) for broadband. As discussed in its initial comments,<sup>3</sup> Coalition members and their partners use 900 MHz band spectrum and adjacent bands for a wide range of critical communications that serve the public interest.<sup>4</sup> Furthermore, the ability of incumbent licensees in the 900 MHz band and adjacent spectrum to rely on their spectrum holdings provides a

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<sup>1</sup> The Coalition members are listed on the cover page. These comments represent the general consensus positions of the Coalition members listed on the cover page, but an individual member of the Coalition also may file its own reply comments.

<sup>2</sup> *Review of the Commission's Rules Governing the 896-901/935-940 MHz Band*, Notice of Inquiry, 32 FCC Rcd 6421 (2017) (“*NOI*”).

<sup>3</sup> Comments of the Critical Infrastructure Coalition, WT Docket No. 17-200 (Oct. 2, 2017) (“CIC Comments”).

<sup>4</sup> *Id.* at 3-6.

positive impact on the United States economy, and users and vendors are continuing to develop narrowband innovations within the existing framework.<sup>5</sup>

The Commission must continue to recognize the critical importance of 900 MHz band and adjacent spectrum networks and ensure they remain free from interference and available to serve the public. The Commission has previously highlighted that the 900 MHz Business/Industrial/Land Transportation (“B/ILT”) spectrum is “one of the few remaining opportunities” for utilities, land transportation, manufacturers, industry, petro-chemical, and other businesses “to obtain much-needed spectrum.”<sup>6</sup> In addition, the Commission has long recognized the “vital communications role” that 900 MHz B/ILT spectrum plays in enabling licensees “to safeguard our nation’s critical infrastructure industries,” as well as in facilitating efficient business and industrial operations, enabling the cost-effective production of goods and services offered to the public, and promoting the safety of employees.<sup>7</sup> Given the critical nature of these communications, B/ILT incumbents understandably demand substantial control over their communications systems, and require greater certainty than commercial carriers generally provide.<sup>8</sup>

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<sup>5</sup> *Id.* at 7-8.

<sup>6</sup> *Amendment of Part 90 of the Commission’s Rules To Provide for Flexible Use of the 896-901 MHz and 935-940 MHz Band Allotted to the Business and Industrial Land Transportation Pool*, Report and Order, 23 FCC Rcd 15856, 15863-64 ¶¶ 12-13 (2008) (“2008 900 MHz Order”).

<sup>7</sup> *Id.* at 15864 ¶ 13.

<sup>8</sup> *See NOI*, 32 FCC Rcd at 6425 ¶ 9 (noting that utilities “require low latency (under 20 milliseconds) and ultra-high reliability (99.9999%), and must serve rural and suburban communities as well as more populated areas, so utilities must rely on private internal communications systems rather than commercial networks.”) (citation omitted); Comments of NextEra Energy, Inc., WT Docket No. 17-200, at 5 (Oct. 2, 2017) (“NextEra Comments”) (noting that utilities “require greater certainty and hardness for their vital communications needs than commercial carriers generally are able or willing to provide”); Comments of the Ad Hoc Refiners Group, WT Docket No. 17-200, at 4 (Oct. 2, 2017) (“Ad Hoc Refiners Group Comments”) (stating that “[r]eliable private land mobile communications systems are essential” and, for its member companies, “private 900 MHz band systems are the only realistic option for meeting these requirements at several of their major refineries”).

Coalition members have been active participants in the Commission’s previous docket considering changes to the 900 MHz band.<sup>9</sup> They have carefully reviewed the new record and reiterate their position that the interference and financial harms that would result from introducing broadband into the 900 MHz band outweigh the alleged public interest benefits. As discussed below, any reconfiguration – whether voluntary realignment on a market-by-market basis or as originally proposed by the Enterprise Wireless Association and Pacific DataVision, Inc. (the “PDV Proposal”) – would compress the narrowband portion of the band, causing short-term disruption, ongoing costs, and long-term interference to existing operations in 900 MHz and adjacent bands. These same costs and interference issues would arise if the Commission were to pursue granting increased operational flexibility that would allow broadband operations in the 900 MHz band. Accordingly, in light of these persistent and unresolved concerns, the Commission should refrain from adopting changes to the 900 MHz band and retain the existing framework.

## **II. THE RECORD VALIDATES THE COALITION’S CONCERNS THAT THE COSTS OF RECONFIGURING THE 900 MHZ BAND OUTWEIGH THE LIMITED BENEFITS**

The intended and unintended costs of reconfiguring the 900 MHz band far outweigh any potential countervailing benefits. As the record shows, various incumbent B/ILT users expressed significant interference concerns, including the critical infrastructure industry (“CII”) entities that would allegedly benefit from the 900 MHz broadband services.<sup>10</sup> For example, Duke Energy Corporation (“Duke Energy”) said any changes to the band and channel assignments

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<sup>9</sup> See Realignment of the 896-901/935-940 MHz Band to Create a Private Enterprise Broadband Allocation, RM-11738 (proceeding terminated by *NOI*, 32 FCC Rcd at 6435).

<sup>10</sup> See, e.g., Comments of the Utilities Technology Council, WT Docket No. 17-200, at 3 (Oct. 2, 2017) (“UTC Comments”) (“[T]he Commission should refrain from realigning the band at this time” because, among other things, “insufficient information exists to demonstrate that a realignment of the band could be accomplished without adversely affecting utility mission critical communications.”).

would be “very disruptive” to its “operational capabilities and efficiencies because of the interference that would result from the reallocated channel assignments.”<sup>11</sup> Similarly, Westar Energy, Inc. (“Westar”) declined to support reconfiguration because it could result in interference that could only be mitigated by decreasing coverage, which is essential to the safe and efficient operation of Westar’s electric transmission and distribution operations.<sup>12</sup> Exelon Corporation and its subsidiaries PECO Energy Company and Commonwealth Edison Company (“Exelon”) likewise urged the Commission to retain the existing framework for 900 MHz, citing concerns about “the potential for harmful interference and the possibility of significant disruption to ongoing critical infrastructure radio operations.”<sup>13</sup> The Association for American Railroads (“AAR”) also noted continued concerns about interference to Advanced Train Control Systems that operate adjacent to the proposed broadband allocation.<sup>14</sup> And the Edison Electric Institute, which represents all U.S. investor-owned electric companies, agreed that the proposal for a 2/2 MHz narrowband and 3/3 MHz broadband realignment would threaten the “ultra-high communications reliability electric companies depend on” and lead to harmful interference to incumbent operations in the 900 MHz and adjacent bands.<sup>15</sup>

These concerns are well-founded as the record, both in this proceeding and in RM-11738, demonstrates that allowing broadband operations in the 900 MHz band likely would result in harmful interference to incumbent critical communications in the 900 MHz band and adjacent

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<sup>11</sup> Comments of Duke Energy Corporation, WT Docket No. 17-200, at 6 (Oct. 2, 2017) (“Duke Energy Comments”).

<sup>12</sup> Comments of Westar Energy, Inc., WT Docket No. 17-200, at 1 (Oct. 2, 2017) (“Westar Comments”).

<sup>13</sup> Comments of Exelon Corporation, WT Docket No. 17-200, at 4-5 (Oct. 2, 2017) (“Exelon Comments”).

<sup>14</sup> See Comments of the Association for American Railroads, WT Docket No. 17-200, at 8 (Oct. 2, 2017) (“AAR Comments”).

<sup>15</sup> Comments of the Edison Electric Institute, WT Docket No. 17-200, at 2 (Oct. 2, 2017) (“EEI Comments”).

spectrum.<sup>16</sup> As the Coalition explained in its comments, designating any portion of the band for broadband necessarily means reducing the amount of spectrum available for incumbent narrowband operations. Closely repacking incumbent narrowband users into a new, condensed segment of the band, as PDV proposes, would increase the potential for interference among incumbent users.<sup>17</sup> Moreover, as NextEra noted, this closer spacing would raise the noise floor, resulting in degraded system performance for incumbents.<sup>18</sup> In order to maintain existing levels of service and coverage, incumbents would be forced to add antenna sites, thereby further increasing interference risks.<sup>19</sup>

These interference concerns would be present regardless of whether the Commission pursues band reconfiguration or increases operational flexibility because, as NextEra explained, “broadband technologies tend to raise the overall noise floor in the environment in which they operate.”<sup>20</sup> However, as Southern Company Services (“Southern”) correctly noted, the PDV proposal “pose[s] the highest risk of interference” because it would place broadband operations in 900 MHz immediately adjacent to narrowband operations in the compressed 900 MHz segment and the 901-902/940-941 MHz narrowband Personal Communications Service (“NPCS”) band “with effectively no guard band or other separation.”<sup>21</sup> Lower Colorado River Authority (“LCRA”) agreed that narrowband users would have a far more degraded experience

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<sup>16</sup> See e.g., Duke Energy Comments at 6 (“[A]ny changes to the existing 900 MHz B/ILT band and channel assignments would be very disruptive to Duke Energy’s operational capabilities and efficiencies because of the interference that would result from the reallocated channel assignments.”). See generally Westar Comments at 4-5; AAR Comments at 9; Exelon Comments 3-4; EEI Comments at 13-15.

<sup>17</sup> CIC Comments at 2, 9-10.

<sup>18</sup> NextEra Comments at 7.

<sup>19</sup> *Id.*

<sup>20</sup> *Id.*

<sup>21</sup> Comments of Southern Company Services, Inc., WT Docket No. 17-200, at 11 (Oct. 2, 2017) (“Southern Comments”).

resulting from the combination of “interference from wideband operations” like LTE receivers, and the lack of a guard band.<sup>22</sup> Further, since narrowband receivers cannot tune away interference from wideband operations, this disruption “would be constant.”<sup>23</sup> As a result, portions of the newly consolidated band would be “unusable” and “[r]elocated B/ILT incumbents, hampered by interference from wideband operations, would be forced to vacate the band.”<sup>24</sup> In NextEra’s experience, interference issues have occurred even when CMRS providers are operating in compliance with the Commission’s out-of-band emissions (“OOBE”) limits within their authorized bands.<sup>25</sup> Therefore, protecting the incumbent narrowband systems in the proposed environment will require many more protections than those PDV has proposed, including “retaining the existing noise floor and emission mask” and “creating a guard band in the range of a full 1 MHz.”<sup>26</sup>

Licensees adjacent to the 900 MHz band presented similar evidence of interference risks. Sensus USA Inc. (“Sensus”) described the potential for harmful interference to its FlexNet radio system, which operates in adjacent NPCS spectrum and supports applications like advanced metering infrastructure (“AMI”).<sup>27</sup> In 2015, Sensus commissioned Real Wireless Ltd. to analyze the interference potential of PDV’s proposed broadband operations in the 900 MHz band.<sup>28</sup> The

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<sup>22</sup> Comments of Lower Colorado River Authority, WT Docket No. 17-200, at 10 (Oct. 2, 2017) (“LCRA Comments”).

<sup>23</sup> *Id.*

<sup>24</sup> *Id.*

<sup>25</sup> NextEra Comments at 8.

<sup>26</sup> *Id.* See also Comments of Motorola Solutions, Inc., WT Docket No. 17-200, at 5 (Oct. 2, 2017) (concluding that “there is nothing that can be done at the receiver to mitigate interference due to out-of-band-emissions” and “[f]ilter performance of the broadband transmitter is therefore critical to minimize interference from OOBE”).

<sup>27</sup> See Comments of Sensus USA Inc., WT Docket No. 17-200, at 4-5 (Oct. 2, 2017) (“Sensus Comments”).

<sup>28</sup> *Id.* at 5.



resulting report, which is appended to the Sensus Comments, concludes that such operations would cause unacceptable interference to adjacent NPCS operations.<sup>29</sup> Real Wireless Ltd. also found that “many of the assumptions underlying the PDV Proposal were either unrealistic or unsupportable,” and that PDV “presented an overly optimistic interference case that has a low probability of occurring in a purely mobile deployment and a nearly zero probability of occurring with substantial machine-to-machine traffic.”<sup>30</sup> Sensus stated – and Coalition members agree – that “[p]roponents of broadband operations at 900 MHz bear the burden of showing that such interference can and will be prevented. To date, they have not done so.”<sup>31</sup>

The few 900 MHz broadband proponents have, however, recognized the potential for interference to incumbent operations. EWA and PDV admitted that the technical rules they have proposed “do not guarantee that a licensee will never experience any instance of interference.”<sup>32</sup> Yet that is the standard that mission-critical communications require. Any interference to mission-critical communications, regardless of the severity, is unacceptable.<sup>33</sup> The DVA Consulting report that is appended to the EWA/PDV Comments likewise conceded that “sources for potential interference between the proposed broadband allocation and narrowband systems in adjacent bands do exist.”<sup>34</sup> Another consultant retained by PDV also acknowledged the potential

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<sup>29</sup> *Id.*

<sup>30</sup> *Id.* (citing Comments of Sensus USA Inc., RM-11738, at 9, 11-12 (June 29, 2015)).

<sup>31</sup> *Id.* at 2.

<sup>32</sup> Comments of Enterprise Wireless Alliance and PDVWireless, Inc., WT Docket No. 17-200, at 30 (Oct. 2, 2017) (“EWA/PDV Comments”).

<sup>33</sup> See LCRA Comments at 6 (“In LCRA’s experience, interference at any level is unacceptable.”).

<sup>34</sup> Dominick Arcuri, DVA Consulting, LLC, *Analysis of the Proposed Petition for Realignment of the 900 MHz Band under FCC Part 90*, at 31 (Dec. 7, 2015) (“DVA Consulting Report”), attached to EWA/PDV Comments, Attachment 2.

for harmful interference.<sup>35</sup> The Commission cannot accept these high risks for interference as being acceptable. For that reason, it should decline to move forward with PDV's Proposal to reconfigure the 900 MHz band.

Evidence in the record likewise confirms that relocating incumbent users would be costly.<sup>36</sup> Duke Energy's equipment costs would be in the range of \$3 million – and that is just the equipment necessary to accommodate new channel assignments.<sup>37</sup> Relocating railroad operations is estimated at \$100 million,<sup>38</sup> and transitioning AMI and Distribution Supervisory Control and Data Acquisition systems could cost between \$30 and \$50 million per electric company.<sup>39</sup> And these numbers are just the tip of the iceberg. As Westar and others point out, the PDV Proposal fails to address the costs incumbents would be required to bear in order to achieve comparable coverage and service post-realignment.<sup>40</sup> Many incumbents would require additional infrastructure under the realignment (*e.g.*, to offset the increased noise floor), and each additional site – and the associated tower leases, maintenance, and other costs – would result in

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<sup>35</sup> See Jay M. Jacobsmeyer, Pericle Communications Co., *Technical Impacts of a 900 MHz Private Enterprise Broadband Allocation*, White Paper, at 5 (Sept. 29, 2017), *attached to* Comments of Pericle Communications Co., WT Docket No. 17-200 (Oct. 2, 2017) (“There could still be rare occasions when harmful interference occurs.”).

<sup>36</sup> See, *e.g.*, Exelon Comments at 5 (“Allowing such broadband operations and relocating incumbent 900 MHz users would be very costly to accomplish.”); Sensus Comments at 9-10 (“The Critical Infrastructure Coalition has already warned the Commission that the PDV Proposal understates relocation costs significantly.”).

<sup>37</sup> Duke Energy Comments at 6-7.

<sup>38</sup> AAR Comments at 7.

<sup>39</sup> EEI Comments at 15.

<sup>40</sup> See Westar Comments at 6; Exelon Comments at 4 (“As the Coalition points out, in addition to the direct costs of reconfiguring the band, there would be ongoing operating costs that would increase in order to obtain comparable coverage, such as increasing the number of tower sites, the number of tower leases, the amount of equipment and maintenance.”).

increased operating costs on an ongoing basis.<sup>41</sup> For example, NextEra subsidiary Florida Power & Light Company would need to “reconfigure its existing systems potentially adding more than double the number of antenna sites” to offset the increased noise floor.<sup>42</sup> NextEra estimates that its capital impact alone would be approximately \$70 to \$90 million, and the annual operating cost impact would be no less than \$7 to \$9 million.<sup>43</sup> Similarly, Southern and other utilities in adjacent NPCS spectrum “would be compelled to deploy a substantial number of additional AMI transceivers at significant cost simply to maintain the same level of performance that they currently have.”<sup>44</sup> And, as the American Petroleum Institute correctly notes, “[c]ertain mission critical systems may require a new system be staged in parallel for an immediate cut over to minimize user impact.”<sup>45</sup> These costs and potential complications received scant attention from proponents. EWA/PDV did not even attempt to quantify the total cost of its proposed realignment.<sup>46</sup> Instead, they provide little more than wishful thinking that the costs should not “vary significantly” from those incurred by similar licensees during the 800 MHz rebanding process.<sup>47</sup> This argument appears to be based on the misconception that “[t]he 900 MHz landscape is significantly *less* complicated” than the 800 MHz landscape.<sup>48</sup> But, in fact, the

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<sup>41</sup> See, e.g., Comments of the American Petroleum Institute, WT Docket No. 17-200, at 6 (Oct. 2, 2017) (“API Comments”) (“[F]or larger systems with multiple repeaters, maintaining 120 kHz channel separation as commonly recommended by combiner manufacturers will force the use of multiple combiners. This has cost, antennas, cabling and rack space ramifications. Losses introduced from new combiners may require the installation of additional infrastructure, potentially including new tower sites.”).

<sup>42</sup> NextEra Comments at 3.

<sup>43</sup> *Id.* at 10.

<sup>44</sup> Southern Comments at 8.

<sup>45</sup> API Comments at 6.

<sup>46</sup> See EWA/PDV Comments at 20.

<sup>47</sup> *Id.*

<sup>48</sup> *Id.* at 19 (emphasis added).

smaller size of the 900 MHz band would make rebanding *more* complicated. The 800 MHz rebanding project involved a great deal more spectrum that could be used for aiding relocation efforts. By contrast, the proposed 2/2 MHz narrowband segment provides little room to shift incumbents around during relocation, and even less margin for error. Moreover, the 800 MHz rebanding process first ordered in 2004<sup>49</sup> has taken much, much longer than anticipated and is still ongoing.

Not surprisingly, given these uncertainties and enormous costs, most CII entities question the limited benefits of the proposals. A key premise of the PDV Proposal is that it will ultimately provide broadband capabilities to users, particularly CII entities, “whose needs are not met by existing commercial broadband networks.”<sup>50</sup> Yet few CII entities are clamoring for it, and are in fact opposed to introducing such operations into the 900 MHz band.<sup>51</sup> These utilities and CII entities urgently need access to broadband spectrum below one GHz, but recognize that the amount of broadband that would result from any realignment would not be sufficient to meet their needs.<sup>52</sup> The Commission seems to recognize as much, specifically asking commenters “to assess the costs and benefits of making a substantial change to the configuration of the 900 MHz

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<sup>49</sup> See *Improving Public Safety Communications in the 800 MHz Band*, Report and Order, Fifth Report and Order, Fourth Memorandum Opinion and Order, and Order, 19 FCC Rcd 14969 (2004).

<sup>50</sup> *NOI*, 32 FCC Rcd at 6427 ¶ 13 (citation omitted).

<sup>51</sup> See, e.g., UTC Comments at 3, 10. (“[A]t present, insufficient information exists to demonstrate that ... broadband networks could be deployed that would provide the same reliability on a cost-effective basis for utility communications.”); Exelon Comments at 5 (“[T]he public benefits of allowing such broadband operations in the band would be relatively small as the amount of spectrum available for broadband operations would be limited.”); Sensus Comments at 9 (explaining that under the PDV Proposal, for example, “broadband users would be limited to a 3 x 3 megahertz swath of spectrum, and even that amount would be held by one party, pdvWireless”).

<sup>52</sup> See, e.g., Duke Energy Comments at 6 (“While utilities need to have access to sub-one GHz broadband spectrum so that they may deploy cost-effective private LTE systems, reallocating the 900 MHz B/ILT band channels to provide this broadband spectrum is not in the best interest of Duke Energy or its customers.”); Sensus Comments at 9 (“[T]he benefits of accommodating broadband operations at 900 MHz are speculative at best.”); EEI Comments at 16 (“There is a limited public-interest benefit to the rebanding proposals in the *NOI*, but tremendous risk.”).

band, *particularly in light of ... the relatively small swath of spectrum.*”<sup>53</sup> Moreover, NextEra and others presented evidence that alternatives are already available in the marketplace.<sup>54</sup> Given these and other offerings on the horizon (*i.e.*, FirstNet), it would be illogical to disrupt the existing framework to gain a small swath of spectrum for broadband.

### **III. IF THE COMMISSION NONETHELESS PURSUES BROADBAND OPERATIONS IN THE 900 MHZ BAND, IT MUST ENSURE EXISTING USERS ARE MADE COMPLETELY WHOLE**

As discussed above, the Coalition opposes the proposals in the *NOI* that would allow broadband operations in the 900 MHz band and risk disruption to critical communications. If, however, the Commission decides to go forward with such changes, it is imperative that existing users be made whole. No one questions that retaining a home for incumbent narrowband users is important. Even the proponents acknowledge: “Innovation cannot come at the expense of degrading narrowband systems for incumbents that choose to continue operating them. The rules governing band realignment must ensure that incumbents are provided with comparable facilities at no cost to them.”<sup>55</sup> Yet, as several commenters point out, it remains unclear whether comparable facilities can be provided in all markets. As Duke Energy explained, given that it utilizes 173 of the 199 B/ILT channels, “it is doubtful” it “would be able to secure the required number of unencumbered and non-interfering channels to provide the same coverage and capacity currently enjoyed following any reallocation of channels and frequencies that would reduce the B/ILT channels to any number less than the 199 currently available.”<sup>56</sup> Similarly,

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<sup>53</sup> *NOI*, 32 FCC Rcd at 6430 ¶ 29 (emphasis added).

<sup>54</sup> See Sensus Comments at 9 (“[A]ny corresponding benefit is diminished by the fact that many other broadband solutions are or will soon be available to CII providers, including FirstNet and other commercial offerings.”); NextEra Comments at 9 (discussing current and potential commercial service offerings including from AT&T, Verizon, and Sprint).

<sup>55</sup> EWA/PDV Comments at 14 (citation omitted).

<sup>56</sup> Duke Energy Comments at 6.

LCRA said “it would be impossible to provide comparable facilities to incumbents such as LCRA that would have to be relocated because LCRA’s existing channel quantity and site density cannot be accommodated.”<sup>57</sup> Even the proponents concede that the 2/2 MHz segment might not accommodate all the licensees that need to be relocated in all markets.<sup>58</sup>

Moreover, even assuming *arguendo* that all existing licensees could be accommodated, there would be little or no spectrum available for them to expand their operations in the future.<sup>59</sup> As such, rebanding would “strand” incumbent operators at their existing capacity levels<sup>60</sup> and generally “frustrate beneficial system growth” in the band – precisely the result the Commission has previously sought to avoid.<sup>61</sup> Consistent with that precedent, commenters agree that any “make whole” arrangement must provide sufficient 900 MHz spectrum to address incumbents’ expansion needs.<sup>62</sup>

Finally, the Coalition believes – and the record confirms – in order to be made whole, incumbents must be reimbursed for all expenses related to relocation, including ongoing operational expenses (discussed above) that are attributable to the broadband operations. Westar, for example, urged the Commission to “be unequivocal in its assignment of the cost to PEBB [Private Enterprise Broadband] licensees of equipment/infrastructure necessary to achieve

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<sup>57</sup> LCRA Comments at 10.

<sup>58</sup> See *NOI*, 32 FCC Rcd at 6427 ¶ 14 n.45 (citing Reply Comments of Enterprise Wireless Alliance and Pacific Datavision, Inc., RM-11738, at 12 (July 14, 2015)); DVA Consulting Report at 6-7.

<sup>59</sup> LCRA Comments at 10 (noting that LCRA’s “ability to acquire new frequencies for coverage and growth would be severely limited under any new realignment plan”).

<sup>60</sup> Comments of The National Association of Manufacturers and MRFAC, Inc., WT Docket No. 17-200, at 5 (Oct. 2, 2017).

<sup>61</sup> 2008 900 MHz Order, 23 FCC Rcd at 15863 ¶ 12.

<sup>62</sup> See, e.g., Ad Hoc Refiners Group Comments at 4 (“[A] guiding principle in addressing the issues raised in the NOI is that sufficient 900 MHz spectrum be available for expansion of existing systems.”).

comparable service (and not just administrative costs.)”<sup>63</sup> Exelon likewise said “[t]he broadband licensees would need to cover such increased operating costs in order to make incumbent licensees whole.”<sup>64</sup> NextEra also recommended that “all costs incurred by existing licensees related to relocation ... be reimbursed.”<sup>65</sup> Unless and until these concerns are satisfactorily addressed, the Commission should decline to move forward with any broadband reconfiguration.

#### IV. CONCLUSION

For the foregoing reasons, the Coalition urges the Commission to refrain from allowing broadband operations in the 900 MHz band needed for mission-critical narrowband communications of utilities and other CII entities. As these and other comments have demonstrated, the costs of such changes outweigh the limited and uncertain benefits involved.

Respectfully submitted,

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<sup>63</sup> Westar Comments at 7.

<sup>64</sup> Exelon Comments at 4.

<sup>65</sup> NextEra Comments at 11.

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