

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

In the Matter of	)	
	)	
Connect America Fund	)	WC Docket No. 10-90
	)	
High-Cost Universal Service Support	)	WC Docket No. 05-337
	)	

**COMMENTS OF VIRGIN ISLANDS TELEPHONE CORPORATION  
D/B/A INNOVATIVE TELEPHONE**

Virgin Islands Telephone Corporation (“Vitelco”) d/b/a Innovative Telephone, by its undersigned counsel, respectfully submits the following comments in response to the Public Notice<sup>1</sup> in the above-captioned dockets seeking comments on cost model design and inputs.

**I. INTRODUCTION**

Vitelco is the incumbent local exchange carrier serving the territory of the United States Virgin Islands (“USVI”). In 2005, Vitelco served approximately 69,925 residential and business access lines. As of May 31, 2012, Vitelco served 49,241 residential and business access lines, a decline of almost 30 percent over seven years. Vitelco serves customers principally on the islands of St. Croix, St. John, and St. Thomas, as well as several minor outlying islands. Vitelco is regulated by this Commission as a price cap incumbent LEC. As discussed in comments previously filed in the above-captioned dockets, Vitelco faces a number of challenges in deploying broadband to its service territory, but has made a commitment to the territorial regulatory agency to make, and has already begun to make, substantial investments over the next several years to upgrade and extend its facilities.<sup>2</sup>

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<sup>1</sup> Public Notice, “Wireline Competition Bureau Seeks Comment on Model Design and Data Inputs for Phase II of the Connect America Fund,” DA 12-911 (Wireline Comp. bur. released June 8, 2012).

<sup>2</sup> Comments of Virgin Islands Telephone Corporation d/b/a Innovative Telephone, WC Docket No. 10-90 *et al.*, filed April 18, 2011.

In the *USF/ICC Transformation Order*,<sup>3</sup> the Commission recognized that price cap carriers serving territories outside the contiguous United States (hereinafter, “CONUS”) face unique operating conditions and challenges that may result in cost characteristics that differ from those of mainland LECs. It therefore directed the Wireline Competition Bureau to consider the unique circumstances of “price cap carriers serving Alaska, Hawaii, Puerto Rico, the U.S. Virgin Islands and Northern Marianas Islands ... when adopting a cost model, and we further direct the Wireline Competition Bureau to consider whether the model ultimately adopted adequately accounts for the costs faced by carriers serving these areas.”<sup>4</sup> Further, the Commission instructed the Bureau that if “the model ultimately adopted does not provide sufficient support to any of these areas, the Bureau may maintain existing support levels, as modified in this Order, to any affected price cap carrier, without exceeding the overall budget of \$1.8 billion per year for price cap areas.”<sup>5</sup>

The need for policies that take into account the unique characteristics of the U.S. Virgin Islands and other U.S. territories is evident from the significant disparity between broadband deployment in these areas and the rest of the United States. The National Broadband Map reflects that (as of June 30, 2011) not a single household in the entirety of the U.S. Virgin Islands had broadband service of download speeds greater than 3 Mbps and upload speeds greater than 768 Kbps. Thus, the U.S. Virgin Islands had the dubious distinction of being ranked *last among all of the states and U.S. territories*.<sup>6</sup>

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<sup>3</sup> *Connect America Fund*, WC Docket No. 10-90, *et al.*, Report and Order and Further Notice of Proposed Rulemaking, 26 FCC Rcd 17663 (2011) (subsequent history omitted).

<sup>4</sup> *USF/ICC Transformation Order*, para. 193.

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

<sup>6</sup> See National Broadband Map, “Rank Analysis” for the all states and territories, available at: <http://www.broadbandmap.gov/rank/all/state/percent-population/within-nation/speed-download-greater-than-3mbps-upload-greater-than-0.768mbps/ascending/> (last visited July 8, 2012). Vitelco emphasizes, however, that its capital improvement program, which is currently in its third year, is designed to make broadband service available in most areas of the USVI within the next several years.

Of course, broadband providers in other insular areas face similar issues in trying to deploy broadband in their respective service areas. This likely explains why, according to the National Broadband Map, the three lowest ranked areas in the percentage of households with broadband service of download speeds greater than 3 Mbps and upload speeds greater than 768 Kbps are U.S. territories – Guam, American Samoa, and the U.S. Virgin Islands.

## **II. CURRENTLY PROPOSED COST MODELS CANNOT ADEQUATELY MODEL THE COSTS OF SERVING THE U.S. VIRGIN ISLANDS**

### **A. The CQBAT Model Does Not Adequately Model Costs for the USVI**

To develop an appropriate CAF Phase II support mechanism, the forward-looking model eventually adopted by the Commission must identify the network cost information of an efficient wireline-based provider of fixed voice and broadband services in all areas of the country, including the USVI. As described at para. 5 of the *Public Notice*, the Bureau is considering two proposed cost models, but one of those pertains to Alaska only, leaving only the “CQBAT” model as a candidate for modeling costs for the rest of the country, including the USVI.

Despite the Commission’s directive that the “model and all underlying data, formulae, computations, and software associated with the model must be available to all interested parties for review and comment” and that “[a]ll underlying data should be verifiable, engineering assumptions reasonable, and outputs plausible[.]”<sup>7</sup> access to the CQBAT model proposed by the ABC Coalition for the parties most affected by the potential applications of its results has been very limited.

In December 2011, the Bureau requested that models be submitted in a form accessible to the public, subject to the reasonable restrictions applicable to Highly Confidential information.<sup>8</sup> Despite the Bureau’s request, access to the CQBAT model’s mechanisms has been insufficient to enable meaningful third-party analysis of underlying assumptions regarding network engineering

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<sup>7</sup> *USF/ICC Transformation Order*, para. 185.

<sup>8</sup> Public Notice, “Request for Connect America Fund Cost Models,” WC Dockets 10-90, 05-337, DA 11-2026 (Wireline Comp. Bur. rel. Dec. 15, 2011).

parameters and depreciation assumptions. In addition, CQBAT model information provided thus far is insufficient for third-party analysis of cost inputs used in the model, including equipment costs, labor rates and loadings, and cost of capital. Many input-related descriptions and support provided to-date in CQBAT documentation are sufficiently vague so as to render meaningful analysis and evaluation impossible. For example, input values often are described as “simple averages” but the related information sources, the ranges of data that comprise the averages and supporting documentation are not provided. In addition, engineering assumptions that lead to the sizing of plant capacity, *e.g.*, gauge of cable, DSLAM capacity, etc., are not provided in CQBAT support documentation, and neither are descriptions and explanations of the regression analyses used to determine certain materials costs.

As a practical matter, the meager level of explanation and documentation related to the CQBAT model’s assumptions, inputs, calculation formulae and software provided to date make it impossible for carriers to determine whether or not the model sufficiently captures the specific characteristics of their costs of providing broadband services and the degree to which the record must be augmented to enable accurate cost calculations.

Nonetheless, it has been possible to determine that certain costs specific to non-CONUS carriers are not included in the proposed CQBAT model. For example, the Commission specifies that the forward-looking model must calculate accurate network cost information for the provision of specified broadband services between the customer premises and the nearest Internet peering location. A review of certain underlying assumptions of the CQBAT model identified on the record indicates that these costs are significantly understated for Internet data traffic to and from the USVI (and most likely for other non-CONUS areas as well). The CQBAT model assumes the Internet peering location always is located at a regional tandem within the Local Exchange Carrier’s (“LEC”) LATA. In the case of Vitelco, however, the Company must transport Internet data traffic to Internet peering locations in the state of Florida, a distance of over 1,100 miles. Consequently, the long-haul transport costs to the nearest peering location specific to Vitelco are not included in the CQBAT cost calculations and the related support calculations are inaccurate and significantly understated.

In addition, although as noted above Vitelco's experts have not had access to detailed cost input data, it is highly unlikely that the CQBAT model accounts for higher costs of equipment and other supplies and materiel experienced in the USVI. The USVI is outside the customs territory of the United States, which consists "only" of the 50 States, the District of Columbia, and Puerto Rico.<sup>9</sup> Therefore, any carrier purchasing telecommunications equipment or other materiel manufactured (in whole or in part) outside the United States for use in the USVI must pay customs duties of 6 percent, in addition to any duties that may have been paid on original importation of the goods into the United States. All goods imported into the USVI, including domestic goods, are also subject to an excise tax in addition to duties. Moreover, because the USVI is outside the customs territory, many equipment suppliers require that USVI customers purchase from foreign distributors, often in Latin America. This can result in increased prices, greater risk due to currency fluctuations, and increased shipping costs. Even when products can be purchased from U.S. suppliers, they must be shipped and stored at considerable expense, as the USVI is at least 1,100 miles from the nearest mainland port, and due to shipping times the company must maintain higher inventories on-site than would be typical for CONUS companies. In addition, transporting equipment and personnel among islands is more costly and time-consuming than covering similar distances on land, and Vitelco incurs substantial warehousing expense to maintain inventories of supplies in both St. Thomas and St. Croix because replacements cannot be obtained immediately when needed. Vitelco estimates that the factors discussed in this paragraph alone (customs duties, excise taxes, procurement restrictions, shipping, and warehousing costs) add 15 to 30 percent to its costs of equipment and supplies compared to CONUS telecommunications companies.

The CQBAT model also likely does not take account of higher operational costs associated with the topography of the U.S. Virgin Islands,<sup>10</sup> such as the rocky, hilly terrain and heavy

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<sup>9</sup> 19 C.F.R. § 101.1 (2011).

<sup>10</sup> See also *Federal-State Joint Board on Universal Service*, Report and Order, 12 FCC Rcd 8776, ¶¶ 112, 314, 414-415 (1997) (finding that carriers serving insular areas face formidable

tropical vegetation in sparsely populated inland areas, that make the use of underground or buried cable expensive. VITELCO's operating territory is within a tropical zone, where conditions of a corrosive tropical environment and frequent storms result in higher maintenance costs, particularly for outside plant operations. Also, the terrain of VITELCO's operating territory is formed largely of volcanic deposits that are more difficult to excavate for construction purposes and consequently, add to the costs of operations.

The U.S. Virgin Islands also is burdened by a combination of an extremely high cost (six times the national average) and extremely unreliable electrical power supply, which means that any provider operating in this territory will incur much higher costs both for standard power and for maintaining and operating backup power than would be typical for other service areas in the United States. Vitelco also incurs greater personnel expenses due to the very small population of the USVI, which means that many positions requiring special skills must be filled from outside the territory; due to the remoteness of the territory, the company must pay high relocation costs and provide other incentives to attract qualified employees for these positions, which CONUS-based companies would not face.

#### **B. Limits to the Effectiveness of a CAF Phase II Model**

Even if the model's cost inputs could be adjusted to take account of the circumstances discussed in the preceding section, the use of a one-size-fits-all cost model platform for the calculation of CAF Phase II support may not render accurate results for Vitelco. This is due to the fact that the Company currently is in Year 3 of a five-year program that will result in an almost completely rebuilt network incorporating a state-of-the-art hybrid fiber-coaxial cable ("HFC") network architecture. This effort effectively implements a greenfield HFC network, the cost structure of which will be unique to Vitelco and perhaps only a few other LECs that may have undertaken such a large scale network upgrade utilizing the HFC technology.

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challenges because "insular areas generally have subscribership levels that are lower than the national average, largely as a result of income disparity, compounded by the unique challenges these areas face by virtue of their locations").

To the extent that a one-size-fits-all modeling approach used for CAF Phase II is unable to accurately incorporate the cost characteristics of both a state-of-the-art HFC network and the more prevalent technologies used by most other carriers, the model will not provide accurate results for all carriers. In view of this likely result, it may well be impossible to develop a CAF Phase II cost model that accurately predicts the costs of Vitelco while serving the overall purpose of efficiently providing a reasonable measure of the costs of providing broadband services for the nation's price cap carriers in general. This particularly is true in the case of Vitelco given not only its relatively unique HFC network architecture but also the other unique cost characteristics of non-CONUS carriers in general.

**C. The Bureau Should Consider Excluding Non-CONUS Price Cap LECs from the Application of the Adopted Cost Model**

As discussed in Section I, above, the Commission specifically authorized the Bureau to exclude "any" non-CONUS price cap LEC service areas from the application of the Phase II cost model, and instead to continue frozen Phase I support for such companies, if the Bureau concludes that the model ultimately adopted will not provide sufficient support to those areas.

For the reasons shown in the preceding sections, it appears highly doubtful that any cost model based on the CQBAT proposal will be able to model accurately the costs of providing ubiquitous voice and broadband services in the USVI, or in other non-CONUS service areas. At this time, there is no other proposed cost model under consideration. The CQBAT model as proposed would provide less than \$400,000 in annual support to the USVI, in contrast to Phase I support of over \$16.3 million per year. On its face, this result does not constitute adequate support, and the preceding demonstration of cost factors that are unique to the USVI confirms that the model cannot be correct as applied to this territory.

It may be that *some* of the differences between the USVI and CONUS service areas could be accounted for by territory-specific adjustments to the cost model; for example, by using company-specific cost inputs for various components of the model instead of generic inputs. At a minimum, it would certainly be necessary to account for the cost of backhaul to the nearest

Internet peering point, which is orders of magnitude higher for Vitelco than for typical CONUS companies. Because of the limited access provided to the CQBAT model so far, however, it is impossible to say how difficult it would be to compute such adjustments, or even whether they would be feasible for all components of the model. Moreover, as discussed in the previous section, even if the model could account for all carrier-specific input costs, it would not adequately model the actual costs of Vitelco's greenfield HFC deployment.

In deciding whether and how to attempt to adjust the cost model for non-CONUS companies, the Bureau must necessarily be guided by considerations of administrative feasibility and cost-effectiveness. Non-CONUS price cap LECs account for a very small percentage of the overall \$1.8 billion price cap component of the CAF budget.<sup>11</sup> Frozen Phase I support payments to the price cap incumbent LECs serving Alaska, Hawaii, Puerto Rico, USVI, American Samoa and the Northern Mariana Islands total approximately \$83 million,<sup>12</sup> less than five percent of the Phase II budget for price cap service areas.<sup>13</sup> It would not make budgetary or economic sense to devote a disproportionate share of the Bureau's resources to making incremental changes in the model to account for unique features of each of these areas.<sup>14</sup> Rather, it would be more sensible and produce greater benefits to devote those limited resources to improving the allocation of

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<sup>11</sup> *USF/ICC Transformation Order*, para. 126.

<sup>12</sup> Computed from USAC report of Frozen Phase I CAF support, available at [http://www.usac.org/\\_res/documents/hc/pdf/legacy/Frozen-High-Cost%20Support-021512.pdf](http://www.usac.org/_res/documents/hc/pdf/legacy/Frozen-High-Cost%20Support-021512.pdf) (accessed July 9, 2012). Incremental Phase I support for non-CONUS companies, if accepted in full, would at most increase this total by approximately \$4.9 million. Public Notice, "Wireline Competition Bureau Announces Support Amounts for Connect America Fund Phase One Incremental Support," DA 12-639, para. 9 (Wireline Comp. Bur. released April 25, 2012).

<sup>13</sup> Phase I support to Vitelco is approximately \$16.3 million per year, or less than one (1) percent of the price cap service area budget.

<sup>14</sup> Each non-CONUS area is likely to have its own unique set of cost-affecting conditions. The climate and geography of Alaska, for example, are obviously different than those of the USVI. Transport considerations affecting the Pacific territories are likely to be materially different than those in the Caribbean. Also, as already discussed, the USVI, American Samoa, and Northern Marianas incur costs due to their customs status that do not affect the other non-CONUS areas.

95% of the budget among the CONUS price cap study areas. Even if it were theoretically possible to fine-tune the cost model for each non-CONUS service area, the cost of doing so would probably exceed the incremental public benefit derived from a more accurate model.

### **III. OTHER COST INPUT ISSUES**

With respect to the data input issues identified in Part B of the *Public Notice* (paras. 72-106), Vitelco generally supports the use of company-provided data in preference to data from commercial datasets or use of modeled or estimated data. In Vitelco's experience, both commercial and government-compiled data sources tend to be less complete (or even nonexistent) for the insular areas than for the 50 States and District of Columbia. Further, for the reasons stated in preceding sections, any inputs based on nationwide averages or similar estimates (see, *e.g.*, paras. 96, 100, 104) are highly unlikely to provide accurate cost data for the USVI, regardless of their usefulness for CONUS-based service areas.

### **IV. CONCLUSION**

For the foregoing reasons, Vitelco urges the Wireline Competition Bureau to consider whether it is feasible and cost-effective to develop a cost model that would provide accurate cost information and adequate support for the U.S. Virgin Islands and other non-CONUS price cap study areas. If the Bureau concludes that the proposed models cannot provide sufficient support without major modifications, it should decline to devote its limited resources to this effort; instead, it should adopt the option provided by the Commission of maintaining Phase I cost support to any non-CONUS study area that would not be provided sufficient support by the adopted model.

Alternatively, if the Bureau does decide to apply a cost model to the USVI and other non-CONUS study areas, it should ensure that such cost model accurately reflects the higher input costs, higher Internet peering costs, and other unique cost characteristics of the USVI, instead of relying on “generic” cost inputs and formulas based on typical CONUS study areas.

Respectfully submitted,

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