

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

In the Matter of

Rural Health Care Universal Service Support
Mechanism

WC Docket No. 02-60

COMMENTS OF GENERAL COMMUNICATION, INC.

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INTRODUCTION AND SUMMARY

General Communication, Inc. (“GCI”) submits these comments in response to the Commission’s Notice of Proposed Rulemaking on the Rural Health Care Program (“RHC program”).¹ As the leading provider of broadband services to government, commercial, and residential users in Alaska, GCI understands the many ways in which “broadband can play an important role in the transformation of health care in the 21st century.”² Indeed, the RHC program is already revolutionizing service delivery in rural Alaska – areas not connected to the rest of Alaska by road. With support from the RHC program, health issues that previously required expensive and risky air ambulance missions or long commercial airline trips and stays away from home are now addressed locally, improving patient quality of life while dramatically reducing health care costs. GCI encourages the Commission to build on this success by improving and extending the RHC program.

¹ See *Rural Health Care Support Mechanism*, Notice of Proposed Rulemaking, WC Docket No. 02-60 (filed July 15, 2010) (“*RHC NPRM*”).

² *Id.* at 2, ¶ 1.

While GCI commends the Commission for its attention to new ways to promote the deployment of rural health care infrastructure, it is concerned that, as proposed, the Health Infrastructure Program would actually undermine the deployment of high capacity links to highly rural communities. The key issue for broadband deployment in rural Alaska is terrestrial middle-mile deployment, which can support lower latency, high bandwidth services for all users – health care, schools, public safety, other enterprise anchor tenants, and the mass market – more cost effectively over the long term than satellite services. To do this, the proposed health infrastructure program should effectively leverage rural health care providers as the anchor tenants of a multifunctional high capacity network. Yet the proposed Health Infrastructure Program would require health care providers to own or lease the capital facilities, and then figure out how to maintain and operate them sustainably without long-term support for operations. A better approach would be to allow health care providers to enter into long-term service contracts that would then support the deployment of a carrier’s multifunctional, multiuser network to these rural communities. The Commission should also recognize that limiting Health Infrastructure Program awards to \$15 million will likely exclude the deployment of sufficient middle-mile facilities to the most rural communities, such as rural Alaska.

In addition, the Commission should avoid self-defeating minimum speed requirements for either the proposed Health Infrastructure Program or the proposed Broadband Health Services Program. It is unclear whether the proposed speed thresholds apply only to last mile throughput (as the National Broadband Plan’s proposed universalization goals do) or to throughput to a Tier 1 Internet backbone POP. If the latter, the proposed speed thresholds will effectively exclude nearly all of rural Alaska, as the low latency, terrestrial middle-mile facilities are not in place to support those speeds to the Tier 1 Internet backbone.

The Commission should also reconsider relying on pro rata support reductions in the event that applications exceed the cap, and also should not use the Health Professional Shortage Area (“HSPA”) scoring to prioritize applications. HSPA scoring may underrate areas with low population density, and also fails to account for the lack of medical specialists, which is an important part of Alaska telemedicine. Instead, the NCES-based prioritization regime that the Commission is considering for the E-Rate program provides a better measure of a community’s rural nature and overall lack of resources.

Finally, the Commission can and should take a number of steps to improve the existing Rural Health Care program (referred to in the NPRM as the “Telecommunications Program”), including:

- (1) disburse support more than twice per year;
- (2) require applicants to submit their applications within 120 days of the start of the funding year, or of the service start date, whichever is later;
- (3) clarify that reimbursement for satellite services should not be capped by rates for unavailable terrestrial services;
- (4) increase service provider access to information about pending applications to speed error correction;
- (5) increase online application availability and transparency;
- (6) decline to apply the proposed “majority of beds” test to determine the eligibility of a health care provider, at least in small communities that are unlikely to have more than one site for the provision of health care services;
- (7) eliminate the location requirement under 47 C.F.R. § 54.601(a)(4); and
- (8) expand funding to conference services.

I. THE RHC PROGRAM HAS HAD A TREMENDOUS IMPACT ON RURAL ALASKAN HEALTH CARE.

A. The RHC program has been extremely successful in Alaska.

Alaska is geographically and demographically unique, presenting unparalleled challenges in the delivery and quality of health care. Covering 570,627 square miles, Alaska is by far the largest state in the Union – twice as large as Texas and four times the size of California.³ But with a population of only 698,473, Alaska’s population density is the lowest in the nation and, at only approximately 1.2 people per square mile, is seventy times smaller than the national average.⁴ Even its three largest communities remain small by national standards. Anchorage has only approximately 375,000 people, ranking 135th nationally. Fairbanks has only approximately 98,000 people, ranking 345th. The state capital of Juneau has only about 30,000 people, ranking it 818th out of the 940 metropolitan and micropolitan statistical areas.⁵ Outside of Anchorage (including its neighboring areas the Matanuska-Susitna Valley and the Kenai Peninsula), Fairbanks (and its suburbs) and Juneau, Alaska’s population is generally located in small regional centers that are surrounded by small villages.

Many rural communities are hundreds of miles from the nearest road and accessible only by airplane, boat, dog sled, or snowmachine. (See Figure 1, below.) Population centers in these off-road communities are tiny. Even more “sizable” regional hubs like Barrow and Nome have

³ U.S. Census Bureau Population Estimates, *available at* <http://www.census.gov/popest/gallery/maps/popdens-2009.html>.

⁴ Cumulative Estimates of Resident Population Change for the United States, States and Puerto Rico: April 1, 2000 to July 1, 2009, U.S. Census Bureau Population Estimates, <http://www.census.gov/popest/gallery/maps/popdens-2009.html>; <http://www.slideshare.net/HINZ/impact-of-telehealth-in-alaska>.

⁵ *Cumulative Metropolitan and Micropolitan Statistical Area Estimates*, U.S. Census Bureau, <http://www.census.gov/popest/metro/CBSA-est2009-pop-chg.html>.

populations of only about 4,000 and 3,500, respectively. Approximately 120 Alaskan villages have fewer than 1,000 residents, many have fewer than 100 residents,⁶ and several isolated villages, such as Kupreanof, Kasaan, Bettles, and False Pass, have fewer than 50 residents. In total, 32 percent of Alaskans – over 45 percent of whom are Alaska Natives – live in rural communities that are highly dispersed, not connected to any road system, and with ingress and egress limited to air and, depending on the season, waterways or temporary ice road transportation.⁷ Moreover, populations in rural Alaska fluctuate seasonally. In rural communities with fish processing facilities, such as Dillingham, Dutch Harbor, King Salmon, and St. Paul, the population can increase dramatically during the summer fishing season, as fishing boats dock to load fuel and supplies and unload their catch and workers migrate for temporary work in the processing plants.

⁶ See State of Alaska, Alaska Community Database Custom Data Queries, http://www.commerce.state.ak.us/dca/commdb/CF_CUSTM.htm (aggregating population figures for each Alaskan city).

⁷ See *State Fact Sheets: Alaska*, United States Department of Agriculture, Economic Research Service, <http://www.ers.usda.gov/statefacts/ak.htm> (noting that 225,260 of 698,473 Alaskans lived in rural communities in 2009); Stewart Ferguson, *et al.*, *The Impact of Telehealth in Alaska: An 8 Year Retrospective of the AFHCAN Project*, <http://www.slideshare.net/HINZ/impact-of-telehealth-in-alaska>, slide 3 (“Impact of Telehealth in Alaska”) (noting that 46% of Alaskans are Alaska Natives).

Figure 1
Map of Alaska’s Year-Round Road System



As might be expected, the state faces a shortage of medical professionals, especially among specialists and psychiatrists, to treat its population. Alaska stands 48th in the nation in its “doctors to residents” ratio. 49% of all physicians in Alaska are primary care physicians, compared to a U.S. average of 28%.⁸ For rural Alaska, the situation is even bleaker as 65% of all Alaskan doctors are located in Anchorage.⁹ Professionals and patients alike must continually deal with geographic obstacles in order to provide or obtain critical medical care. Indeed, timely

⁸ Impact of Telehealth in Alaska at slide 3.

⁹ *Id.*

medical care is often an expensive, if not unattainable, airplane flight away.¹⁰ At least 59 percent of the state's residents are probably underserved.¹¹

Confronted with such challenges, Alaska has led the way in developing innovative telemedicine platforms and networks to anchor the delivery of care. Alaska has built a network of 550 health aides/practitioners in 170 rural Alaska villages. These aides can use telemedicine to conduct triage; to determine what can be treated locally and when a patient must be flown to Anchorage; to enable the exchange of documents, images and records, to conduct patient education; for both non-real-time and real-time consultation; and to provide doctor-led treatments, including telepsychiatry.¹² The Alaska Federal Health Care Access Network ("AFHCAN") reports that as of 2007, it was serving nearly 10,000 patients using telehealth.¹³ The RHC program has been a key part of this innovative growth of telemedicine in the country's most remote state, supporting connections between villages and regional centers, and between regional centers and Anchorage or the Lower 48. Unsurprisingly, given its unique geography and demographics, Alaska has been the top beneficiary of RHC program disbursements from fiscal years 2002 through 2008.

Telehealth continues to evolve and improve health care delivery in rural Alaska, but requires more bandwidth to do so. A prime example of this evolution is the Yukon-Kuskokwim Health Corporation ("YKHC"), which administers a comprehensive health care delivery system for nearly fifty rural communities in the Yukon Kuskokwim Delta – a region approximately 400

¹⁰ *Id.* at slide 6.

¹¹ *See* <http://acrh-ahec.uaa.alaska.edu/frontier/alaska.html>.

¹² *See* Impact of Telehealth in Alaska at slides 10-11.

¹³ *Id.* at slide 13.

miles west of Anchorage by air. YKHC's services today include health promotion and disease prevention programs, dental services, behavioral health services, including psychiatric and substance abuse counseling and treatment, ophthalmological care, and environmental health services. In almost all cases, YKHC facilities provide the only health care service options available for the individuals who live in its service areas.

Prior to 2008, YKHC had basic asymmetric connectivity (1.5 mbps download, 512 kbps upload) in most of its villages that was used for medical and administrative applications, VoIP, and Internet service. In mid-to-late 2008, YKHC began expanding bandwidth to a symmetrical 3 Mbps for remote clinics and to 5 Mbps for the larger subregional clinics, which allowed for the use of one or two, respectively, high-definition, full motion video suites for psychiatry, radiology, remote consultations, other telemedicine applications, and professional training.

The improvement in care from enhanced videoconferencing and other high bandwidth applications is marked. For example, local patients have been provided with access to remote behavior health professionals who have been particularly invaluable in the areas of suicide prevention and substance abuse treatment. While x-ray film was previously sent to radiologists via mail – meaning a broken bone might take three to four days or longer to diagnose – electronic files now enable radiology services to provide a reading of x-rays almost in real time. Expanded bandwidth has also accommodated system demands associated with dental and digital mammography systems.

Success stories resulting from telehealth advances in Alaska abound.¹⁴ The Bristol Bay Area Health Corporation reports, for instance, that one of its physicians in Dillingham was able

¹⁴ See <http://success.gcimbs.net/health.mov> for a short video of telehealth adoption in the Y-K region.

to demonstrate to a health aide how to relocate a toddler's dislocated elbow via videoconferencing – a procedure the aide had never done or been taught. The health aide was able to successfully relocate the elbow without having to call for an air ambulance to transport the toddler to Dillingham, which in this case would have been impossible in the near term due to prohibitive weather conditions.

The Maniilaq Association, which manages social and health services for about 6,500 people within the Northwest Arctic Borough and the village of Point Hope, recounts an instance in which its technicians had to boat to the village of Noorvik in poor weather conditions in order to install video equipment. The technicians arrived to find a pregnant patient in labor, and were able to set up the equipment quickly enough to deliver the Association's first "telebaby" via videoconferencing.

Another success story involves an eight year-old YKHC cancer patient from Chevak, Alaska, who was being treated at Seattle Children's Hospital. The young girl was isolated from her family and not responding well to treatments. The patient's case worker believed that it was important for her to connect with her family and friends in the village to improve her response to treatment – a basic behavioral health treatment. The solution was a video connection and upgraded bandwidth between the locations. For the next year, after the circuit was upgraded and a video connection was established between Seattle and Chevak, the patient was able to connect with her family and friends several times a day, and her response to treatment dramatically improved. These patients' stories are far from unique.

Looking to the future, it is clear that as YKHC and other providers continue expanding their broadband-based health delivery, bandwidth will need to be increased to accommodate these enhanced services. As explained in the Commission's recently-issued technical paper

analyzing health care broadband needs, over the next decade, health professionals “will need to exchange increasingly large files as new technologies such as 3D imaging become more prevalent.”¹⁵ While most of rural Alaska now depends on satellite technology to transport traffic across the middle mile, providing additional advanced telehealth services over satellite will become increasingly challenging. Satellite service is expensive, has limited throughput capacity and inherent latency and, thus, is not ideal for high capacity, latency-sensitive telehealth services such as real-time, high definition, full motion video teleconferencing. Moreover, satellite service’s limited throughput capacity means that such service does not provide a cost-effective method to keep up with ever-increasing bandwidth needs at projected rates for growth for the mass market (which GCI anticipates will increase by three percent per month for the foreseeable future (*i.e.*, 43 percent per year)) in addition to enterprise services such as rural health care and E-rate services. It is not feasible to augment satellite capacity to keep up with such increases in demand. In addition, satellites themselves need to be replaced approximately every 15 years, at a cost of hundreds of millions of dollars per satellite. Thus, the future of telehealth in Alaska – along with the future of broadband at the National Broadband Plan’s universalization targets of 4 Mbps download and 1 Mbps upload – lies with deploying terrestrial fiber and/or microwave backbone facilities connecting rural Alaskan communities with the Anchorage/Fairbanks corridor, and the state’s main fiber connections to the Lower 48.

Capturing economies of scale will be critical to delivering broadband to rural Alaska. As GCI explained in great detail in response to the Commission’s inquiries in the NBP proceeding,

¹⁵ *Health Care Broadband in America: Early Analysis and a Path Forward*, FCC Omnibus Broadband Initiative Technical Paper No. 5, Aug. 2010, available at [http://download.broadband.gov/plan/fcc-omnibus-broadband-initiative-\(obi\)-working-reports-series-technical-paper-health-care-broadband-in-america.pdf](http://download.broadband.gov/plan/fcc-omnibus-broadband-initiative-(obi)-working-reports-series-technical-paper-health-care-broadband-in-america.pdf), 5.

due to the vast distances, severe climate, difficult terrain, and widely dispersed population, the largest impediment to providing broadband to all of Alaska, particularly rural Alaska, is the lack of cost-effective middle-mile connectivity.¹⁶ Enterprise broadband service, including services to rural health care providers, in the vast rural areas of Alaska is constrained by middle-mile capacity to a much greater degree than by the last-mile technology that may be deployed.¹⁷

Alaska shows that investment in broadband infrastructure to support telehealth is a sound public investment. As an example, the cost savings to date from such systems in Alaska have been substantial. YKHC is the anchor tenant for DeltaNet, a regional microwave network¹⁸ owned by a GCI affiliate, and they have found that the introduction of video technology has led to a direct savings of about \$250,000 per year in travel alone across the organization, as well as a significant increase in productivity of its staff due to the decreased need for travel. More broadly AFHCAN, a grant-driven initiative to provide telehealth and telemedicine services to Alaskan federal beneficiaries, has estimated that annual travel savings generated by the use of its telehealth services equaled \$3.3 million for 3,666 patients (based on 2009 data), with total travel savings amounting to approximately \$20 million for 21,740 encounters with patients since

¹⁶ See generally, Comments of General Communication, Inc. – NBP Public Notice #11, GN Docket Nos 09-47, 09-51, 09-137, 1-2 (filed Nov. 4, 2009).

¹⁷ Indeed, at least for Alaska, middle-mile capacity issues demonstrate that the universal broadband speeds to be achieved and supported must be measured not just over the last mile, but to the Tier 1 POP. In focusing on 4 Mbps download and 1 Mbps upload speeds in the last mile as the measure of universal broadband, the NBP assumed that higher capacity backhaul would be available to support those last mile speeds. See Federal Communications Commission, *Connecting America: The National Broadband Plan* at 156, n.2 (2010) (“National Broadband Plan”) (“For purposes of the plan, ‘actual speed’ refers to the data throughput delivered between the network interface unit (NIU) located at the end-user’s premises and the service provider Internet gateway that is the shortest administrative distance from that NIU.”).

¹⁸ *I.e.*, a terrestrial network connected back to the internet backbone by satellite rather than by a terrestrial link.

2001.¹⁹ These savings will increase exponentially at the projected growth rate of telemedicine adoption in Alaska.

And, of course, travel cost savings is just one aspect of improved health care. Telehealth means less waiting time for medical treatment and more locally-delivered health care – things that urban Americans take for granted.

B. Rural health care providers serve as key regional anchor tenants.

It is important to note that the benefit of the RHC program expands far beyond the improvement of health care itself. Through USF support, rural health care facilities serve as anchor tenants that not only bring much-needed medical services to rural areas, but also justify the terrestrial broadband infrastructure investment that also benefits the regions’ non-medical institutions, government, public safety, rural residents, and small businesses. In addition to improved health care, the RHC program-supported expansion of broadband communications options to residents of Alaska’s vast wilderness areas – to which RHC support of anchor tenants is a critical component – enhances regional economic development, economic opportunities and education.

II. THE COMMISSION SHOULD ADOPT THE PROPOSED HEALTH INFRASTRUCTURE PROGRAM IN A MANNER THAT EFFECTIVELY LEVERAGES RURAL HEALTH CARE PROVIDERS AS THE ANCHOR TENANTS OF A MULTIFUNCTIONAL HIGH CAPACITY NETWORK AND THAT SUPPORTS MIDDLE-MILE DEPLOYMENT WHERE NECESSARY.

The NPRM commendably explores how the Commission can use its authority under Section 254(h)(2)(A) of the Communications Act to create a program that would support the development of a health infrastructure. While the objectives of the proposed “health

¹⁹ See Christopher T. Patricoski, *Telemedicine Applications in Alaska: Innovations of the Last Frontier*, available at http://ww2.smh.com/sections/servicesprocedures/medlib/education/podcasts/documents/patricoskiMD_05-21-2010.pdf, at slide 86.

infrastructure program” are laudable, the proposal appears to run counter to one of the core ideas in the National Broadband Plan: aggregating demand to support the extension of high capacity networks to rural communities to serve a multiplicity of both enterprise anchor tenants and the mass market. This is especially true in Alaska, where the biggest obstacle to delivering high capacity services for health care is not the cost of deploying the last mile, but the cost of connecting a remote, roadless community to the rest of the world by a low-latency, high throughput middle-mile circuit.

Rather than using a model in which health care providers leverage their expertise in health care service delivery and carriers build and operate multifunctional high capacity networks, the NPRM appears to contemplate health care providers owning and operating the core of the multifunctional network. For example, the NPRM proposes requiring that the health care providers have an ownership interest an indefeasible right of use, or a capital lease in the facilities funded by the program.²⁰ It is difficult to see how this model makes sense. Requiring ownership or leasing the network facilities forces the health care provider into being a communications network operator, and to incur all the costs and managerial burdens of operating and maintaining the network. Moreover, because operating the network is not the health care providers’ area of core expertise, the likely result is underutilized facilities, as the health care provider is less likely to keep up with advances in fiber optic wave technology or microwave transmission. In GCI’s experience, health care providers want and need a reliable service that gives them the capacity they need to run their health care applications, not physical ownership of or long term property interests in underlying facilities.

²⁰ *RHC NPRM* at 25, ¶ 55.

The NPRM has apparently contradictory provisions with respect to operations and maintenance of the new health infrastructure network that do not appear to create a coherent whole. On the one hand, the NPRM proposes to support “reasonable, necessary and customary maintenance costs,” but possibly only for a limited period, such as three years.²¹ On the other hand, the NPRM appears to rule out support for ongoing network operations, such as operating personnel, and proposes not to support “operational expenses.”²² As such, the NPRM seems to imply that electrical power – a significant input cost to most networks, especially in areas such as rural Alaska that are not part of an interconnected power grid – would not be supported. Yet the NPRM also proposes that, as part of the application process, the participant health care providers would have to submit a “sustainability report demonstrating that the project is sustainable” within approximately ten years.²³ For areas such as rural Alaska, which usually have a single regional health care provider, a single community school and an otherwise small population, it is difficult to see how these health infrastructure networks are supposed to be built, maintained and operated on a long-term basis within the constraints of the proposed infrastructure program.

The proposed health infrastructure program also has other features that appear to defeat any meaningful application to significant middle-mile connectivity problems – *i.e.*, the problem that an entire community, taken together, lacks sufficient bandwidth to the outside world. The NPRM, for example, suggests a cap on infrastructure funding of \$15 million. While this cap might be adequate if a rural health care facility has a relatively short distance to reach a high capacity Internet backbone facility, this will do little to address the middle-mile problems of

²¹ *Id.* at 17, ¶ 39.

²² *Id.* at 19, 20, ¶¶ 42, 43.

²³ *Id.* at 29, ¶ 65.

rural Alaska. As an example, GCI's successful Broadband Infrastructure Program application was awarded a loan/grant combination of approximately \$88 million to connect 65 small villages²⁴ in two southwestern Alaska regions to Anchorage and the fiber backbone to the lower 48.

Furthermore, the NPRM makes clear that – as would be expected given the proposed structure for a health care provider owned or capital leased network – any recipient that shared its facilities with entities other than eligible health care providers would face significant cost allocation and reporting requirements.²⁵ These requirements will impose a further burden on a recipient health care provider that cannot be supported by the proposed infrastructure program, beyond an initial period, because they are ongoing administrative costs.

The better approach would be to provide health care providers with support with which to enter into long term contracts for high capacity networks capabilities that support the health care providers' telemedicine and broadband needs. This would fund exactly the types of networks that the health infrastructure program envisions, but allow (although not require) those networks to be provided by carriers that can use this funding as part of a multisource strategy to support the construction and ongoing operation and maintenance of high capacity, low latency networks to that community, as well as to the health care provider itself.

²⁴ 35 of these villages were connected by a regional microwave network, but that network did not have a low latency terrestrial connection to Anchorage.

²⁵ See *RHC NPRM* at 30-33, ¶¶ 67-82.

III. THE COMMISSION SHOULD AVOID SELF-DEFEATING MINIMUM SPEED REQUIREMENTS.

For both the proposed health infrastructure fund and the proposed Health Broadband Services Program, the NPRM proposes minimum speed requirements. For the Health Infrastructure Program, the NPRM proposes a 10 Mbps minimum speed, while for the Health Broadband Service Program, the NPRM inquires about a 4 Mbps minimum speed requirement.

While the impetus behind these minimum speed thresholds is understandable, they do not adequately take into account middle-mile limitations, and thus would exclude vast areas such as rural Alaska if what is being proposed is an actual throughput requirement of 4 or 10 Mbps to the Tier 1 POP. In rural Alaska, the infrastructure is not in place to provide low latency broadband at 4 or 10 Mbps. While high latency connections could be provided over satellite in some instances, low latency terrestrial middle mile connections do not exist for the vast majority of rural Alaska.

If, on the other hand, the NPRM is simply proposing that local connectivity be 4 or 10 Mbps²⁶ for the Health Broadband Services Program or the Health Infrastructure Program, respectively, then the Commission should recognize that this standard is not necessarily ensuring sufficient bandwidth for advanced telemedicine applications outside of a community or surrounding region. In the case of rural Alaska, it might be possible, for example, to have low latency local connections within Nome of 4 or 10 Mbps, but not low latency 4 or 10 Mbps

²⁶ Notably, the National Broadband Plan's broadband universalization target speeds were only for last mile connectivity, and not for throughput to the Tier 1 backbone point-of-presence. National Broadband Plan at 156 n.2.

connections to the surrounding village clinics served by the Nome Hospital, or all the way from Nome to Anchorage or the lower 48.²⁷

IV. IF APPLICATIONS EXCEED THE CAP, THE COMMISSION SHOULD PRIORITIZE APPLICATIONS TO REFLECT A COMMUNITY’S RURAL NATURE AND RESOURCES.

In the event that applications under the existing RHC program (renamed the “Telecommunications Program” in the NPRM) and the Health Broadband Services Program exceed the applicable cap – proposed at \$300 million per year – the NPRM seeks comment on how such funds should be prioritized. The Commission should not adopt the pro rata reduction mechanism or allocate based on the Health Professional Shortage Area (“HPSA”) scores. Instead, the Commission should use the prioritization regime proposed in the Commission’s E-Rate Notice of Proposed Rulemaking, which uses the Department of Education’s National Center for Education Statistics (“NCES”) scoring based on urban-centric locale codes.²⁸ Pro rata reductions present obvious problems. Unless the initial filing window were set for a limited period very early in the funding year, neither the service provider nor the applicant would know that they would be subject to a pro rata funding reduction until long after the services had been provided – potentially even after the close of the entire funding year. This puts both applicants and service providers in the untenable position of not being able to manage the risk of non-reimbursement. Even if the initial filing window closes early, with first-in-time prevailing thereafter, there is still no assurance that the limited support will be targeted to the areas with the greatest need. Furthermore, as drafted, the proposed Rule 54.675(f) inexplicably only proposes

²⁷ Satellite can provide some high bandwidth dedicated services, but not at low latency.

²⁸ See *Schools and Libraries Universal Service Support Mechanism; A National Broadband Plan For Our Future*, Notice of Proposed Rulemaking, CC Docket No. 02-6, GN Docket No. 09-51, 25 FCC Rcd 6872, 6889 ¶ 39 (May 20, 2010) (“*E-Rate NPRM*”).

pro rata reductions for the telecommunications program, and not also for applications under the Health Broadband Service Program.²⁹

HSPA scores also do not form a sound basis for prioritization. HSPA scores are an inaccurate rural scoring tool, and are currently undergoing review.³⁰ The HSPA scores are for survey areas or organizations, not necessarily individual health care providers (that is, unless a health care provider is the only one in an organization). HSPA measures primary, and not specialist care, and thus misses an important component of telemedicine.³¹ Furthermore, the geographic portion of HSPA scoring is based on the ratio of health care providers to population³² – which will inherently be lower in low population areas. The current HSPA scoring is organized by “type” – county, geographic area, comprehensive health center, or Native American tribal population. In Alaska, where the highest score is 19, several boroughs and at least one Native American tribal population have no HSPA score at all.³³ Meanwhile, in Arizona, the highest score is 24. This is despite the fact Alaska is the least densely populated

²⁹ The draft rule appears at odds with ¶ 130 of the NPRM, which discusses reducing all health care providers *pro rata*, not just those applying under the telecommunications program.

³⁰ *Updated: Secretary Announces Appointment of Committee to Review Criteria for the Designation of Medically Underserved Areas and Health Professional Shortage Areas*, July 21, 2010, <http://www.hrsa.gov/about/news/pressreleases/100709shortagecommitteeappointments.html>.

³¹ *RHC NPRM* at 52, ¶ 130; <http://bhpr.hrsa.gov/shortage/primarycare.htm>.

³² <http://bhpr.hrsa.gov/shortage/primarycare.htm>.

³³ Some scores in Alaska are as follows: Aleutians East Borough (18); Bristol Bay Borough (15); Camai (7); Eastern Aleutians Tribe, Inc. (19); Maniilaq Association (7); Nome Area (19), Northwest Arctic Borough (19), Norton Sound Health Corporation (7), Bethel Census area isn't scored at all, YKHC is 19. Kodiak Island has no score, the Kodiak Area Native Association is not even listed. Alaska does not have counties, but is organized into boroughs.

state in the U.S.,³⁴ with a demonstrable need for telemedicine and a lack of health care providers in rural areas. Thus, HPSA is not a strong measure of the rural character of an area and is not a good test for the Rural Health Care Program to use to set important priorities.

In light of these problems, a more accurate rural scoring tool is the one proposed in the Commission's E-Rate Notice of Proposed Rulemaking, which uses the Department of Education's National Center for Education Statistics ("NCES") scoring based on urban-centric locale codes.³⁵ This approach is far more granular – examining the individual school level – and would provide a much better “rural” measurement than the HPSA, particularly given that the HPSA system is burdened with definitions of health care providers and racial factors. The NCES scoring system is agnostic with respect to all factors but proximity to population centers.

V. THE COMMISSION SHOULD IMPROVE THE CURRENT RHC PROGRAM.

Although the NPRM focuses on creating a new Health Infrastructure Program and an upgraded Health Broadband Services Program, there are also a number of ways in which the Commission can make the existing RHC program more user-friendly and attractive to both health care providers and service providers. The Commission should consider adopting the following recommendations to advance the goals of the RHC program:

- (1) disburse support more frequently than twice per year;
- (2) require applicants to submit their applications within 120 days of the start of the funding year, or of the service state date, whichever is later;

³⁴ See 2000 U.S. Census data at http://factfinder.census.gov/servlet/GCTTable?_bm=y&-ds_name=DEC_2000_SF1_U&-CONTEXT=gct&mt_name=DEC_2000_SF1_U_GCTPH1_US9&-redoLog=false&-_caller=geoselect&-geo_id=&-format=US-9|US-9S&-_lang=en.

³⁵ See *E-Rate NPRM* at 6889, ¶ 39.

(3) clarify that reimbursement for satellite services should not be capped by rates for unavailable terrestrial services;

(4) increase service provider access information about pending applications to speed error corrections;

(5) increase online application availability and transparency;

(6) decline to apply the proposed “majority of beds” test to determine the eligibility of a health care provider, at least in small communities that are unlikely to have more than one site for the provision of health care services;

(7) eliminate the location requirement under 47 C.F.R. § 54.601(a)(4); and

(8) expand funding to conference services.

Each of these recommendations is discussed in detail below.

A. Disburse support more than twice per year.

The Commission should increase the frequency with which USAC actually disburses RHC support. Today, a participating service provider is limited to two cash payments per year if its invoices for supported services exceed the provider’s obligation to pay into the Universal Services Fund. Long delays in payment unnecessarily burden the party (either the RHC provider or the carrier) that is awaiting reimbursement from the fund, and create disincentives to participation by asking participants to, in effect, provide bridge financing. More frequent payments, akin to norms in the commercial realm, will encourage funding applications and broaden use of the RHC program. Indeed, most telecom services are billed on a monthly basis, USAC currently has a direct payment process in place in which *de minimis* RHC providers (i.e., those that pay less than \$10,000 in the process) receive checks as each invoice is received, and

for E-rate, USAC pays on a rolling basis as well. USF payments should match the commercial monthly billing schedule.

To the extent that the twice annual disbursement limitation is related to the requirement to offset support against contribution obligations, the NPRM proposes to eliminate the offset rule.³⁶ GCI fully supports elimination of the offset rule, which is obsolete and duplicates the functions served by the “red light” rules.

B. Require applicants to submit their applications within 120 days of the start of the funding year, or of the service start date, whichever is later.

A year-long period to submit applications makes sense, given the historical under-demand for the program, and the Commission could improve the application and approval process simply by requiring a rural health care provider to submit its application for support within 120 days of the beginning of the funding year or within 120 days of the service state date, whichever is later. Under current rules, an applicant can start receiving services early in the funding year, but is not required to submit its application until the last day of the funding year. Inevitably, this means that RHCD receives a large number of applications at the close of the year for which funding is sought. This creates a backlog which delays both the processing of the applications for the now-concluded funding year as well as newly filed applications for the new funding year.

By imposing a requirement that health care providers apply for funding within 120 days of funding or service availability, USAC will be spared from a year-end deluge of applications which historically have contributed to processing delays. USAC’s processing load will be spread more evenly throughout the year, with the result that processing times will decrease. This will

³⁶ *RHC NPRM* at 54, ¶ 137.

provide greater certainty in a more timely manner to both rural health care providers and service providers.

C. Clarify that reimbursement for satellite services should not be capped by rates for unavailable terrestrial services.

The Commission should clarify that USAC should reimburse for actually-available and comparable services, and not set reimbursements based on services apparently provided in the community but which are not actually available or appropriate. In its 2003 Report and Order, the Commission stated, “[W]here rural health care providers opt for more expensive satellite-based services when a cheaper terrestrial-based alternative is available, the provider, and not the support mechanism, will be responsible for the additional cost.”³⁷ Currently, the Rural Health Care Division of USAC (“RHCD”) has implemented this by limiting telecommunications support for satellite connections only to the terrestrial rate when there are any lower-priced terrestrial circuits in place on a route, even if those terrestrial circuits are not actually available for use by the RHC program funding recipient. This approach unnecessarily denies access to telehealth services, at least until such time that additional terrestrial capacity is made available.

In some instances, a route may have a limited capacity on a terrestrial connection that is fully utilized, so that any incremental additional capacity must be provided over satellite. In other words, under RHCD’s current methodology, even where a provider’s only real option is satellite capacity, RHCD will limit compensation to the terrestrial rate when that is lower. An actual example is GCI’s contract for VSAT services in Heart Butte, Montana:³⁸ RHCD would

³⁷ *Health Care Support Mechanism*, Report and Order, Order on Reconsideration and Further Notice of Proposed Rulemaking, 18 FCC Rcd 24546, 60 ¶ 44 (2003).

³⁸ GCI Contract # HC-162.

only support a satellite connection based on the terrestrial price for circuits, even though Heart Butte Indian Health Service was requesting a single T1 and the actual terrestrial capacity was already exhausted and could not support their seemingly low capacity request. The result was anathema to the goals of the RCHD – because of the support shortfall, service providers and patients did without the benefits of telehealth in the interim period until additional terrestrial capacity was built. USAC’s approach also deprives providers of a way to satisfy incremental demand when the additional demand is not yet sufficient to support expanding terrestrial capacity.

This type of funding problem needn’t exist – and RHCD’s methodology is not mandated by any Commission rule or order.³⁹ Instead of paying at lower terrestrial rates when those facilities are unavailable, and therefore illusory, RHCD should compensate providers based on available and comparable service. Thus, in the Heart Butte example above, compensation would be set at the difference between the equivalent terrestrial urban service and the satellite rate due to insufficient terrestrial capacity.

D. Increase service provider access to information about pending applications to speed error correction.

Today, there is no on-line way a chosen service provider can help ensure that applicant mistakes do not derail the evaluation process. For its E-Rate applications, USAC has developed a process that allows the service provider to view applications so that simple errors can be corrected. Both the applicant and the selected E-Rate provider receive a receipt acknowledgement letter with basic details about the application received and under review. As a

³⁹ *Cf.* 47 CFR § 54.603(b)(4) (requiring that a health care provider select the most cost-effective method of providing the requested service).

result, transcription or other errors can be addressed early, before the evaluation process advances too far down the line. In stark contrast to E-Rate, RCHP only provides the service provider information indicating that a document has been submitted in its Packet Status Reports, without any indication of what the document is, its contents, or relevance to a particular service provider. This limits a service provider's ability to review the applicant's submission for errors. It is clear that the RHC program would be well-served by adopting a process akin to that of E-Rate in order to increase service provider access to important information and to cure simple errors. This is especially important because of the position RHCD has taken that it authorizes precise amounts, rather than an "up to" maximum cap.

E. Increase online application availability and transparency.

The Commission should also take steps to broaden online application availability and transparency. Currently, for example, an applicant can file Form 466 online if it posts a Form 465 in the funding year. Multiyear contracts, however, do not call for the filing of a Form 465 for every year of the contract. As a result, any health care provider that has procured services through a multiyear contract is committed to paper filings for the subsequent years. If, on the other hand, that provider chooses not to solicit a multiyear contract, it forfeits the other efficiencies and cost-savings offered by such an arrangement. Surely the Commission does not want to discourage multiyear contracts, which ultimately increase the efficiency of the RHC program itself. Allowing providers that have solicited proposals for such contracts to file Form 466 online in all subsequent years would be a straightforward improvement to the RHC program that would benefit providers and USAC alike.

In addition, the RHC forms lack clarity, are difficult to follow, and vary between the electronic and paper versions. For example, while a paper version of the instructions for Form

466 is readily available, there are no instructions provided for the online application, even though the online and paper applications are subtly different. By cleaning up and clarifying the online application process, the efficiency of the RHC program will be increased, thereby advancing the goals of the program.

F. Decline to apply the proposed “majority of beds” test to determine the eligibility of a health care provider, at least in small communities that are unlikely to have more than one site for the provision of health care services.

In its discussion of potentially expanding the definition of eligible health care providers, the Commission asks whether it should “allow a facility to receive support as a skilled nursing facility if . . . it has a certificate of need to provide skilled nursing services for at least 51 percent of its total beds[.]”⁴⁰ While GCI wholly supports the Commission’s proposal to expand eligible entities, it believes that this particular definitional approach does not dovetail well with the reality of highly rural areas, such as Alaska. Many Alaskan villages have populations under a few hundred residents. In such areas, one facility often has a wide variety of uses – including acute care, skilled nursing and end-stage renal dialysis, as well as other purposes – and therefore would fail the majority of beds test. Accordingly, the Commission should decline from adopting this test as a measure of an eligible health care provider. A better approach would be to create an exemption to any percentage of beds requirement for a community with only a small number (such as one or two) of health care delivery sites. In this situation, the likelihood of fraud is very low, and the likelihood of excluding the community’s only point of service is high.

⁴⁰ *RHC NPRM* at 50, ¶ 125.

G. Eliminate the location requirement under 47 C.F.R. § 54.601(a)(4).

The Commission should eliminate the requirement in 47 C.F.R. § 54.601(a)(4) that “each separate site or location of a health care provider shall be considered an individual health care provider.” There is no longer any apparent need for this requirement, and it serves only to proliferate the number of applications that must be filed and to create potential problems for applicants that must determine when a site or location is sufficiently “separate” to require its own application.

When the Rural Health Care program was first adopted, it limited each site or location to a bandwidth capacity of 1.544 Mbps.⁴¹ However, the Commission eliminated this per-location cap in 1999 because the cap made it difficult for rural health care providers to receive the benefit of the program, and because it was unnecessary.⁴² No other provision of the rules requires defining each site as a separate “health care provider.” To the extent USAC and the Commission need to enforce 54.601(c)’s limitation on the maximum supported distances, it can be accomplished through separate schedules without formally requiring each location to be a separate health care provider. Similarly, these separate applications are not necessary to police services for ineligible locations, as the health care provider remains accountable for seeking support only for supported services to supported health care providers and purposes.

⁴¹ *Federal-State Joint Board on Universal Service*, Report and Order, CC Docket No. 96-45, 12 FCC Rcd 8776, 8811, ¶ 64 (1997).

⁴² *Changes to the Board of Directors of the National Exchange Carrier Association, Inc.*; *Federal-State Joint Board on Universal Service*, Sixth Order on Reconsideration in CC Docket NO. 97-21 Fifteenth Order on Reconsideration in CC Docket No. 96-45, 14 FCC Rcd 18756, 18767, ¶ 17 (1999).

H. Expand funding to conference services.

The Commission should expand RHC program funding to conference services. Under the program, these services could be funded as Internet services. These services are already supported under the E-Rate program, and there is no reason why they should not also be available to rural health care providers.⁴³

CONCLUSION

GCI is dedicated to furthering the Commission's goal of delivering the best broadband services throughout Alaska as quickly as possible, even in the most remote villages, to improve the quality and delivery of health care. Informed by its experience serving the entirety of Alaska, GCI urges that the Commission adopt its set of recommendations for the Rural Health Care Program. Supported by these measures, the program will be equipped to revolutionize health care delivery not only in Alaska, but across the nation.

Respectfully submitted,

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⁴³ Eligible Services List of the Schools and Libraries Support Mechanism, Oct. 18, 2002, available at http://www.universalservice.org/_res/documents/sl/pdf/ESL_archive/EligibleServicesList_101802.pdf, at 3.