

October 23, 2017

In the Matter of: Wireline Competition Bureau Seeking Comments on E-rate Category Two

WC Docket No. 13-184

Dear Honorable Members of the Commission:

The Vigo County Public Library (VCPL) in Terre Haute, Indiana can provide reliable and fast Internet service to all of customers with E-rate Category Two funding (at the 80% reimbursement rate). While Category One funding has been instrumental to purchasing access, before the library began to receive Category Two funding to upgrade our internal switches, cabling, and wireless access points, we were unable to take advantage of the service to its fullest extent to help our patrons.

In 2015, we used the Cat2 funding (totaling \$9,296) to upgrade the services to support increased bandwidth usage for our West branch. We upgraded to Cat6 cabling, purchased new wireless access points (WAPs), upgraded the switches in the building to support 1Gbps port connections (up from 100 Mbps), and purchased an uninterrupted power supply (UPS) which greatly reduced connection issues in the building due to the frequent power fluctuations in the area.

In 2016, we upgraded the switches at our Main library to 1 Gbps ports (from 100 Mbps ports – totaling \$52,676), and in 2017 we are using the funding to purchase upgraded UPSs and WAPs to meet increasing demand and allow for more connected devices and increased bandwidth capacity at each WAP (totaling \$21,473). We plan on using funding in the last two years to help pay for upgrading all Cat5 cables to Cat6 in our Main building, and build fiber uplinks to our east and west wings (which have inadequate coverage) and between our floors. While we don't have exact costs for these projects, we estimate they will cost \$70,000 total.

In looking at a one month snapshot in 2015 (from Sept 19-October 19), we had an average of 288 people a day using the WAPs, and had 857GB transferred over our network. In 2016, that same month saw 442 average daily users, with 1.5TB transferred. This year, that month snapshot showed 470 daily users, who transferred 2.24TB of data. Before the Cat2 upgrades, this kind of traffic would not have been possible, and certainly not sustainable. While we have done very small cabling projects ourselves, and obviously had WAPs and switches in our buildings before 2015, the Cat2 funding was essential in upgrading the old equipment to support increased usage.

We have no specific comments on the application or reporting process for eRate funding. However, for administration of the budgets for future funding periods, please consider the following policy changes:

- Allow Cat2 funds to be used to purchase public access computers, both desktops and laptops. Our Cat2 funding has allowed us to upgrade the backbone in our building to provide access, but we lack adequate funds to upgrade the end-user machines.
- Allow funding to be used at our discretion across all buildings. Currently, we have to use Cat2 funding amounts for our specific properties, and cannot share the funds amongst them. This restriction has limited the amount that we could accomplish, especially with our smaller branch.
- Allow equipment purchased with eRate funds to be moved within our properties. Currently, equipment purchased with eRate monies must remain in the building we purchased it for. The ability to shift equipment between our properties as needed would be beneficial.
- Allow delivery of service to off-site locations. Currently any eRate services must only be used on our properties. However, as illustrated below, many areas in our communities have inadequate access to broadband. We currently are not able to serve these customers with library-hosted hot spots that would provide better access.
- Loosen the restrictions on labeling eRate purchased equipment – especially cables. While labeling single devices such as UPSs and WAPs is not labor intensive, labeling cable is time-consuming and greatly added to the labor costs of wiring projects.

In regards to the amount of money received, we would welcome an increase and use it to its fullest extent. With increased funding, we could have done the cabling project sooner – we already have reached capacity with our existing cabling. We will also need to continually upgrade our existing equipment with newer technology to meet the demand, which as you can see from the above snapshot month has doubled in just a year.

VCPL's mission is to stimulate positive change in the community by creating an environment rich in opportunity in which people can explore, expand their perspectives, and transform their own lives and the lives of future generations. The concept of the VCPL's mission statement includes serving as a community convener for organizations and groups to generate discourse and ideas for improving and increasing sustainability in the community. The VCPL strives to be a cornerstone for family, cultural, and civic life and to create an environment for exploration, innovation, and creativity.

Terre Haute is the county seat in Vigo County and is historically a union and blue-collar town. The county's demographics include a racial make-up of 88% white, 7% black, 2% Asian, and 2% Hispanic/Latino. The county experiences a high level of poverty with approximately 20% of Vigo County

residents living at or below the poverty level. A majority of the local elementary schools have a free and reduced lunch program enrollment of more than 50%, with some schools exceeding 90%. Conversely, Terre Haute is home to five institutions of higher education, including Indiana State University, Saint-Mary-of-the-Woods College, and Rose-Hulman Institute of Technology, one of the top engineering schools in the nation. Terre Haute serves as a regional hub for the Wabash Valley area, consisting of western Indiana and eastern Illinois, for resources and services as well as for culture and entertainment. VCPL's customers have a variety of needs, as the demographics of the county are very diverse, and the Library provides services to Vigo County residents at all stages of life and development.

Providing reliable and free high-speed Internet access is an integral part of fulfilling VCPL's mission for the community. Here are a few examples of how we have transformed lives in Vigo County:

- A customer who comes to the library to take online classes on Excel, so she can learn new skills for her job. She lives in a rural area and the access she does have access to at home is unreliable, slow and expensive, so she comes to the library.
- Customers who are between jobs who use the library's broadband to file for unemployment, search for jobs, and apply for jobs. Many of these customers also use the library's wifi to take advantage of the online learning courses we also offer to expand their skill sets. These customers often can't afford internet access at home.
- A customer who needed access to Video Relay Service (VRS), which we were able to provide with the upgraded switches, and now have available in one private meeting room, and on all of our customer laptop computers.
- A customer between jobs who uses the library wifi access to participate in a Skype interview with a potential employer.
- A group of students who come to the library to work on a group project, where the library has a robust connection that allows the students to connect their devices at once, allowing them to work together more efficiently.
- The teacher for Vigo County School Corporation's High School Equivalency class who says reliable internet access is essential for her students in preparing for the HSE exams, and students use the service in every class. Online resources like Khan Academy and Rice Bowl, which provide free online courses, lessons, and practice exams in all subjects, would not be available to these students at the library without our Cat2 upgrades.
- Students in a Lifeskills class who are non-readers, who use interactive online activities to improve their literacy skills. Without the Cat2 funding, these interactive programs would not be accessible over library wifi.

- Participants in the library's "Art Hacks" program who use streaming videos of working artists, video tutorials, and Pinterest boards to learn new skills and find inspiration to create their own works of art.
- The League of Women Voters, Wabash Valley Genealogical Society, NAACP, Taxpayers' Association and many other community organizations who use the library's broadband to provide media-rich programming, classes, workshops, forums, and public meetings.
- The ESL Women's Conversation Group (WCG), who has taken virtual tours of the Smithsonian National Museum of Natural History and were able to explore exhibits, such as "Human Origins" and "African Voices", which led to discussions on cultural diversity and the historical interpretations of our similarities and differences. They have also used the broadband access to examine issues like fake news, tested budgeting apps, and learned how to create video games. The WCG students find the inclusion of interactive digital media greatly enhance their experiences and ability to grasp and talk about complex subjects.
- A student who needed to complete online homework, who not only used our wifi, but was able to complete it in a quiet space with a library laptop.

These customers, and many thousands more, all use the library's wifi to enrich and transform their lives. Whether looking for a new job, taking classes, connecting with family and friends, or simply downloading a book to read, the service we are able to provide is appreciated by our community. We would not be able to offer the range of programming and other services without the funding provided by Category 2 to upgrade our equipment.

Please maintain secure funding for the full five year budget period, as was adopted for the 2014 Modernization. Our library, and many others, will continue to depend on it to provide the service our customers count on.

Sincerely,



Heather Rayl

Director of Technology and Special Services