

## Riverview Tower: Empowering Residents with Low-Cost, Reliable Connectivity

In Cleveland, Ohio, the senior citizen residents of Riverview Tower can now access high-speed broadband for telehealth appointments and other everyday uses thanks to DigitalC, a nonprofit wireless broadband provider. **BROADBAND COMMUNITIES** thanks Katie Grootegoed, director of strategic partnerships and empowerment at DigitalC, and Jeffery Patterson, CEO of the Cuyahoga Metropolitan Housing Authority, for helping gather information for this profile.

By Sean Buckley / *Broadband Communities*

**R**iverview Tower occupies a prime spot in Ohio City, one of the oldest neighborhoods in Cleveland. It was built in 1964 as part of Riverview Estates, an 11-acre development that overlooks the Flats and downtown Cleveland.

Today, about 498 senior citizens call Riverview Tower home. The 17-story apartment building is the largest single-standing residence operated by Ohio's Cuyahoga Metropolitan Housing Authority (CMHA).

Riverview Tower residents can now access high-speed internet courtesy of DigitalC, a local nonprofit organization working to connect the unconnected in Cleveland. DigitalC delivers reliable, affordable, high-speed internet and collaborates with community partners to provide devices, digital literacy training and tech support to Cleveland residents.

Katie Grootegoed, director of strategic partnerships and empowerment at DigitalC, says she has been surprised that senior citizens want to connect to the internet. "In the last few months since we got the Riverview building up and running with internet service, we already have a 40 percent take rate in the building," she says. "We provide internet service as well as training, skill building and devices."

Jeff Patterson, CEO of CMHA, says it's important for Riverview residents to be connected. "Having that many people connected at one site is amazing," he notes.

### **NARROWING THE DIVIDE**

In Cleveland, a lack of broadband connectivity is an unfortunate reality – especially in the

### **PROPERTY OF THE MONTH HIGHLIGHTS**

~ Riverview Tower, Cleveland, Ohio ~

- Broadband access services
- 498 one-bedroom units
- Building community room
- Free devices to access the internet
- Digital literacy training



In Cleveland, Ohio, Riverview Tower is home to 498 senior citizen residents who now can access free, high-speed internet thanks to DigitalC, a nonprofit organization working with local community partners to connect unconnected residents in the city.

area where Riverview Tower is located. According to the U.S. Census Bureau's 2019 American Community Survey, Cleveland ranked last among U.S. cities with more than 100,000 residents for broadband access. In addition, the U.S. Census Bureau shows Cleveland ranks highest for the number of residents living in poverty (30.8 percent), including nearly half of the city's children (46.1 percent).

Through its fixed wireless internet service provider unit EmpowerCLE+, DigitalC plans to provide affordable broadband service to Cleveland's 34 neighborhoods. It intends to connect 40,000 city households by 2024.

DigitalC's project is a five-year, public-private partnership with a \$70 million budget. The organization raised more than \$20 million from private donors and expects to rely on public sector funds for the remaining \$50 million.

Since the COVID-19 pandemic, EmpowerCLE+ has connected more than 1,530 Cleveland households to its broadband service in the Central,

Fairfax, Clark-Fulton, Glenville, Hough and Buckeye-Woodhill neighborhoods. DigitalC "has helped make Cleveland's digital future equitable," Grootegoed says.

#### **A PARTNERSHIP APPROACH**

Today, DigitalC has about 1,700 customers across Cleveland. Grootegoed says the customer reach is "due to our partnerships – both public and private – that are assisting in all aspects of helping us getting our customers signed up and getting our infrastructure in place."

One DigitalC partner is Meta (formerly Facebook). As part of its effort to get more people connected to the internet, the social media company is providing funding, installation and delivery of fixed wireless internet services that will support more than 1,000 households with low-cost, high-speed internet.

Because of Meta's investment, EmpowerCLE+ high-speed internet service is now live and accessible to residents at CMHA properties,

including Addison Square, Willson Tower, Riverview Tower and Scranton Castle. As a result, nearly 1,100 public housing multiple-dwelling-unit (MDU) apartment buildings in Cleveland now have access to affordable, high-speed internet.

"Meta is helping us bring broadband services to four low-income MDUs in the city," Grootegoed says. "We have worked to connect each building with an average 40 percent take rate, which is remarkable."

Besides Meta, DigitalC works with other community partners to cover the costs of broadband subscriptions for low-income residents. The most DigitalC charges residents is \$19.44 a month.

"All residents in Riverview Tower have fully subsidized internet paid for through Dollar Bank and MetroHealth [hospital system]," Grootegoed says. "This is because of our strong partnership, so it's a community effort."

When CMHA started the process of getting its residents connected to the internet, the initial concept was to give each building a computer lab.



DigitalC is helping residents access telehealth, local transit schedules, and banking services in their preferred languages.

However, Patterson says there were questions about how CMHA could get connectivity at each home within a building. Without in-home internet services, residents could connect only when the computer labs were open.

“Being able to connect at home allows a parent to be more active in the child’s life and assist with homework,” Patterson says. “Everybody does not work or study on the same clock. It gives people access when they’re available and fits their timelines.”

## FOCUS ON SENIORS

The Riverview Tower development consists mainly of senior citizens, a group that has shown a willingness and desire to learn digital skills and get connectivity. “We started skill-building classes and digital literacy training because the demand was so high,” says Grootegoed. “Our biggest customer base is seniors, not only for connectivity but also for training and upskilling.”

CMHA’s Patterson says that “many seniors want to connect, and once they learn how to get online, they connect with their children and grandchildren differently.” He notes that being online enables seniors to complete employment applications, pay rent, and do other everyday tasks. “People used

to get general information by calling or looking in a newspaper, but now having access to the internet puts valuable information right at their fingertips,” he says. “People’s economic status should not dictate their ability to get that information.”

## DRIVING DIGITAL LITERACY

As the nation’s seventh-largest housing authority, CMHA has strong roots in the Cuyahoga County community. Today, the agency oversees 10,500 housing units and another 15,600 housing choice voucher households. In all, it serves 55,000 people across the county.

The housing authority began to recognize a need for digital inclusion before 2016. At that time, the U.S. Department of Housing and Urban Development implemented a plan under then-President Obama’s ConnectHomeUSA initiative to promote digital inclusion within public housing and states.

CMHA was one of 26 agencies to participate in a ConnectHomeUSA pilot project. “As we started that program, we started to connect and develop partnerships with several nonprofit organizations,” says Patterson. “One of those partners is DigitalC, which has worked to provide

access to residents at many different CMHA sites.” Patterson added that CMHA also works with “another nonprofit organization to provide training and equipment to residents at different sites.”

CMHA also saw the ways the pandemic highlighted the importance of having internet access and digital skills. “If the pandemic taught us anything, it’s that there’s a strong need for digital inclusion and digital literacy training,” Patterson says. “So many of the things people do now [online] are things that were not able to be done in person during the pandemic.”

## ENABLING TELEHEALTH, EVERYDAY APPLICATIONS

The new connectivity enables Riverview Tower residents to access various online applications that positively impact their daily lives. MetroHealth is helping provide training in using telehealth applications, including scheduling appointments online, checking medical records and communicating with doctors.

Grootegoed says providing a way for Riverview residents to speak to doctors online is crucial because getting to a facility is challenging for some. “Many residents are either immobile or have transportation issues, so we’re trying to make sure the social determinants of health are being met and working to improve quality of life,” she says.

Telehealth is only one of several applications that the DigitalC network will enable. Because many Riverview residents are Spanish speakers, they face language barriers. Having affordable broadband service is key to supporting this population.

DigitalC is also working to give residents the ability to access everyday applications, such as local transit and banking services in their preferred languages. The organization provides devices and teaches residents how to use them to access the resources they need, including information about the building.

“CMHA has done a good job with newsletters and various electronic outreach campaigns,” Grootegoed says. “Residents can also see their doctors online because we

can bookmark [doctors' contact information] for them on their devices. They know what the words mean because they are in their languages."

In addition, DigitalC can help residents easily navigate the public transportation system online and apply for benefits. "We download the Regional Transit Authority schedule for them so they are not waiting outside when [a bus] is not running," Grootegoed says. "They can now do that from their apartments instead of going all the way down to the bus stop."

## VITAL STATISTICS

### *Property Description:* Riverview

Tower is a senior high-rise public housing development overseen by the Cuyahoga Metropolitan Housing Authority (CMHA). It's home to about 500 seniors. The 17-story apartment building was built in 1964 and is the largest single-standing residence operated by CMHA.

### *Demographics:* Senior citizens

### *Greenfield or retrofit?* Retrofit

### *Number of units:* 498

### *Style (High-rise/mid-rise/garden):*

High-rise

### *Date services started being delivered:*

May 2022

### *Any special requirements that the property had:*

In addition to broadband access, residents needed devices and training in using the internet in their apartment units. DigitalC was not allowed to enter residents' units.

## LESSONS LEARNED

### *What was the biggest challenge?*

Riverview Tower residents have many needs: broadband access, devices and training on how to use the internet in their apartments. It was a challenge for DigitalC to provide all of these and not be allowed to enter residents' units.

### *What was the most significant success?*

Riverview Tower residents now connect with family and friends because of DigitalC's internet service. The nonprofit provider has

assisted more than 40 percent of residents in less than five months.

### *What feedback does the leasing/sales office get from residents/guests?*

The resident experience has been great; residents appreciate the high-speed, reliable internet and DigitalC's team on the ground to help with training and technical issues.

### *What should other owners consider before they begin a similar deployment?*

Understand what residents can pay and what they want to use the service for. These two components were vital for CMHA and DigitalC to provide the best service and resources.

## SERVICES

**Services:** DigitalC provides 50 Mbps broadband access to residents via CBRS wireless spectrum. Services are then distributed within the living units via Wi-Fi access points.

**Do additional service providers operate separate broadband networks on the same property?** Spectrum/Charter is also available on the property.

**Technical support:** DigitalC provides on-site technical support.

**Is the point of contact for resident technical support the property manager, the service provider, or a third party?** The service provider, DigitalC, provides technical support.

## BUSINESS

**Who owns the network?** DigitalC owns all equipment and the network.

**Is there a marketing agreement with the property owner?** Yes

**If yes, is it exclusive or nonexclusive?** Nonexclusive

**Does the agreement include an incentive such as a door fee or revenue share?** No. DigitalC is a nonprofit organization.

**How do the service provider and owner work together to market the services?** DigitalC often "tables" in the building at various times to educate residents about

how to connect to the internet. Also, DigitalC and CMHA utilize marketing and outreach through as many mediums as possible, including building management.

**Network benefits:** DigitalC service and devices enable residents to access telehealth services, view the local transit schedule, and connect with family and friends. Residents also can take digital courses on how to access online services.

## TECHNOLOGY

**Broadband architecture:** DigitalC worked with Nokia to build a CBRS-based wireless broadband network using general authorized access. Nokia deployed an LTE network core, radio units and indoor and outdoor customer premises equipment, which DigitalC employees and end users install. DigitalC uses Wi-Fi access points inside the building to enable residents to connect to the internet.

**Technology/medium:** In large-building apartments, including Riverview Tower, DigitalC deploys Wi-Fi access points in the hallways so residents can connect from their living units. For all other residential housing (single-family households, small MDUs, etc.), it enters the residences to install Wi-Fi routers inside.

### *Vendors/products*

- Meta (funding)
- Microsoft Airband (adviser, funding)
- Nokia (LTE equipment, CPE)
- Siklu (millimeter wave wireless mesh equipment)
- Ubiquiti (rooftop wireless access points) ❖

Sean Buckley is the editor-in-chief of **BROADBAND COMMUNITIES**. You can contact him at [sean@bbcmag.com](mailto:sean@bbcmag.com).

