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**BEFORE THE UNITED STATES SENATE COMMITTEE ON COMMERCE, SCIENCE, AND
TRANSPORTATION**

“OVERSIGHT OF THE FEDERAL COMMUNICATIONS COMMISSION”

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Chairman Wicker, Ranking Member Cantwell, and distinguished Members of the Committee, thank you for the invitation to testify. It is a privilege to appear before you again.

At the outset, I want to commend the Committee on its notable and bipartisan achievements—from passing the TRACED Act, which would increase the FCC’s authority to crack down on robocalls, to introducing the STREAMLINE Small Cell Deployment Act, which would update our infrastructure rules to account for new, 5G technologies.

On that note, I want to begin today with an update on the steps we are taking at the FCC to accelerate the buildout of 5G and other broadband infrastructure in communities across the country.

When I first testified before the Committee in 2017, the U.S. faced significant challenges. Outdated rules were holding back broadband deployment. It took too long and it cost too much to build Internet infrastructure in this country. We were at risk of ceding U.S. leadership in 5G—and the half a trillion dollars it could add to our economy—to our global competitors. Indeed, China was putting up new cell sites—the building blocks for 5G—at twelve times our pace.

We needed to take bold action. And that is exactly what we have done at the FCC. I want to highlight two decisions in particular that have made a difference.

First, in March of 2018, we examined some of federal rules that apply to the construction of small cells. These are the backpack-sized antennas that provide next-gen connectivity. They can be attached to light poles or other structures in a matter of hours. But the federal review process could take years and cost hundreds of thousands of dollars. This is because our rules treated a single, unobtrusive small cell the same as a new, 200-foot tall tower. Applying all that red tape to every one of the thousands of new small cells needed for 5G threatened to hold the U.S. back. So we excluded small cells from those large tower reviews.

Second, in September, the FCC addressed the state and local review process that applies to small cells. We did so by building on the commonsense reforms already enacted by elected officials in their own communities. This meant updating the shot clocks that have long applied to the local review process, thus ensuring timely decision-making. And it meant providing clarity on the types of fees that can effectively prohibit service in violation of federal law. As specified in the decision, wireless providers—not cities—will pay the costs imposed by the buildout of small cell infrastructure.

These and other FCC reforms are delivering results. Internet speeds are up nearly 40 percent. Americans saw more fiber broadband built to their homes and businesses last year than ever before. The number of small cells put up in this country increased from around 13,000 in 2017 to more than 60,000 in

2018. The digital divide—the percentage of Americans lacking access to high-speed Internet—narrowed by almost 20 percent last year alone. Investment in broadband networks is now increasing—reversing the significant declines we saw in 2015 and 2016. And a new forecast shows the U.S. will have twice the percentage of 5G connections as Asia.

In fact, the U.S. now has the largest 5G deployment in the world. Fourteen cities went live last year, and we expect 92 5G builds by year's end. While there is much more work to do to secure U.S. leadership and ensure every American has a fair shot at next-generation connectivity, we are now heading in the right direction. The FCC's new policies are working.

But more than the numbers, I've had the chance to see firsthand how the FCC's decisions are helping to create jobs and benefit American workers in communities around the country.

I saw this recently in South Carolina. That's where a company built a 100,000 square foot manufacturing plant less than a year ago to meet the increase in demand for small cells. At the facility, Jake and his crew told me that they got jobs at the plant less than six months ago. They had been employed in general steel and construction work before. They now have 5G jobs. And the company says they are expanding their workforce by nearly 10 percent every month to keep up with demand.

I saw this in Elkmont, Alabama. That's where a small-town manufacturing plant is already seeing a big boost from 5G. The facility makes the harnesses and other gear that America's tower climbers use to install new small cells. The plant has doubled production over the last year and a half with new small cell builds underway.

I've also seen firsthand the hard work that America's tower crews are doing every day to bring more broadband to more Americans. In fact, the successes we are seeing in accelerating infrastructure deployment has created a new opportunity. Industry estimates that it needs to fill another 20,000 job openings for tower climbers and telecom techs to complete this country's 5G build. That would nearly double the size of this group of skilled workers, bringing thousands of families into the middle class.

In April, I announced a jobs initiative to help address this opportunity. It looks to community colleges as a pipeline for these 5G jobs. And it is modeled on a program developed by Aiken Technical College in Graniteville, South Carolina. In 12 weeks, the program can take someone with virtually no training, teach them the mix of classroom and physical skills necessary to build and install new cell sites, and enable them to land a good-paying job in the tower industry. Dr. Gemma Frock, who developed the program, says that 100 percent of her students have received job offers upon graduating from the program.

We need to expand this model program to community colleges across the country to ensure we have the skilled workforce in place to build next-gen networks. I am working toward that goal with a number of stakeholders. These efforts will help address our country's need for 5G workers and close the skills gap.

Programs like these can make a real difference in communities around the country. A few months ago, I joined Senator Blackburn at an automotive manufacturing plant in Chattanooga, Tennessee. This plant partners with a local community college to offer classroom training and on-the-job technical

skills to its workers. Immediately upon graduation, students have the potential to get a job—either with the manufacturer or in other high-tech fields—and they start out making more than \$40,000 a year.

While we know that broadband deployment can create jobs, it can also save lives. I have seen it in places like Sioux Falls, South Dakota, where doctors used telehealth to treat rural patients for severe burns following a chemical explosion. I have seen it in the small community of Manokotak, Alaska, where a broadband-enabled otoscope can allow an ENT located in Dillingham to diagnose a child's ear infection before it threatens her hearing.

For years, the FCC has played a key role in supporting the deployment of broadband to these facilities through our Rural Health Care Program. But there's a new trend in telehealth—a trend towards connected care everywhere. The delivery of high-tech, high-quality health care is no longer limited to the confines of connected, brick-and-mortar facilities. With remote patient monitoring and mobile health applications that can be accessed on a smartphone or tablet, we now have the technology to deliver high-quality care directly to patients, regardless of where they are located.

I first learned about this trend from Senator Wicker during a trip to Jackson, Mississippi. I then had the opportunity to see the results first-hand in the Mississippi Delta, where I witnessed how an innovative remote patient monitoring program run by the University of Mississippi Medical Center was making a real difference for members of this very rural community.

The Delta is ground zero for the country's diabetes epidemic. It sees diabetes at rates that are about twice the national average. Ruleville, Mississippi is no exception to this trend. In addition to having one of the highest rates of diabetes in the state, more than half of all children in this area live in poverty. That only adds to the challenge of finding and accessing affordable health care. But using remote patient monitoring technologies, the pilot program was helping to treat and control cases of Type II Diabetes in the Delta.

One of the program's patients is Ms. Annie. She noticed the first signs of her diabetes when she woke up one day with blurred vision. After seeing little progress in managing her diabetes with traditional care options, Ms. Annie signed up for a remote patient monitoring pilot program. She walked me through the blood sugar monitor that she uses at home. The monitor uses Bluetooth to connect to her iPad, which chimes every morning to remind her to check her blood sugar. Ms. Annie then pricks her finger and her A1C level is displayed on-screen. Based on that, the iPad app suggests appropriate actions—from a particular food or exercise, to watching a relevant video. If she forgets to enter her numbers that day, she'll get a phone call from a nurse. With this technology, Ms. Annie's A1C levels have gone down and she says she's never felt better.

At the FCC, we are taking steps to align public policy in support of this movement in telehealth. Last August, we initiated a proceeding to provide up to \$100 million for connected care pilots that benefit low-income patients, including those eligible for Medicaid and veterans. It would support a limited number of projects over a two- or three-year period, with controls in place to measure and verify the benefits, costs, and savings associated with connected care. It could take the results we've already seen in the limited trials to date and help replicate those results in communities across the country.

From chronic disease management to pediatric cardiology, from PTSD to opioid dependency, this pilot has the potential to make a real difference for low-income individuals that might lack access to

quality health care today. I anticipate moving to the next stage of the proceeding this summer, and I look forward to working with my colleagues at the FCC, federal and state partners, members of the Committee, and all stakeholders as we stand up the Connected Care Pilot Program.

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In closing, I want to thank you again Chairman Wicker, Ranking Member Cantwell, and Members of the Committee for holding this hearing and for the opportunity to testify. I look forward to continuing to work with you on reforms that will accelerate the buildout of broadband networks and the opportunity it enables. I welcome the chance to answer your questions.