Page title: Why 5G Will Be The Foundation of Smart Cities

Meta description: By making networks faster and more flexible, 5G will be a central factor in the

development of smart cities. Here's how.

Word count: 937

According to the last few years' worth of studies by the UN, urbanization is the new normal. The <u>organization reported in 2018</u> that over 4 billion people lived in urban areas worldwide; they predicted that number would rise to nearly 7 billion – or over two thirds of the global population – by 2050.

With more people now living in urban areas than rural areas, it makes sense that technological innovations are focusing increasingly on how to make cities safer, healthier, and more efficient. These are the hallmarks of "smart cities": cities that use technology to improve the lives of citizens via better communication between residents and city officials.

One innovation that will prove crucial to the development of smart cities is the 5G network. Keep reading to learn more about the need for smart cities, how smart cities will work, and how 5G is central to enabling their development.

## How smart cities work

As mentioned above, smart cities are premised on the idea that the vast number of resources and operations that keep cities running can only be cost-effective and efficient if they are <u>automated and connected</u>. So, developing a smart city means connecting everything from streets and buildings to public and personal devices.

How is this interconnection facilitated? Typically, through the placement of sensors throughout the city that will collect, transfer, and analyze data. Some of this data is "latency-tolerant," meaning it does not need to be collected or analyzed quickly to be effective and thus can be communicated across low-bandwidth pipes – commonly called massive machine type communication (MMTC). Examples of such communication applications include smart buildings or systems to monitor air and water quality.

[...]