

# Private 5G gives you more.



## Martin Male

Business Development  
Partner

Professional Services  
UK & Ireland

Martin has extensive experience in transformational leadership and business strategy execution. He has helped companies in both the public and private sector with their business transformation with a focus on the upstream, core value-adding and downstream operations to deliver a higher value business model.

The number of connected devices is expected to rise from 25 billion in 2020 to 84 billion by 2024.<sup>1</sup> If you're not already making use of the Internet of Things (IoT) to streamline operations, cut downtime, reduce waste, improve worker safety and create new customer experiences, it should be high on your to-do list. 5G is making many new use cases viable and others more compelling by redefining what's possible and the economics of deployment.

---

## Connect more than ever before

Massive IoT, connecting huge numbers of devices, was one of the key driving forces behind developing 5G and one of the biggest reasons why companies are adopting it. Combined with 5G's extremely low latency, this is going to spur a new wave of IoT-based applications. It's going to help enable the factory of the future, complete with automated guided vehicles (AGVs) and artificial intelligence/machine learning (AI/ML)-driven quality control. And it's going to transform experiences like going shopping or to watch a football game.



**...the industrial sector, including manufacturing, retail and agriculture, will account for over 70% of all IoT connections by 2024.”<sup>2</sup>**

---

## Reach more places

Private 5G, deployed on company sites using licensed spectrum, is making previously impossible, or at least hugely impractical, uses possible. Because private 5G needs fewer access points than Wi-Fi and can be tailored to the company's needs, it's a great solution for extreme and hard-to-reach environments. Several ports have already adopted private 5G to monitor shipping traffic, improving efficiency and safety. And mining companies are looking at using 5G for asset tracking and to deploy AGVs – with private 5G they can even do that underground. Manufacturers are using it to monitor and track raw materials, equipment and finished goods throughout production facilities and warehouses.

---

 **Prioritise critical functions**

Private 5G is just that: private. You decide who uses your network and how – you have the potential to segment the network to give people and devices access to only what they need to do their jobs. This potential to break up your network also allows you to give critical functions priority, allowing them to run uninterrupted over those less critical. Other types of connectivity can't give you this level of control.

And it's not just about protecting your data, 5G is designed to be highly resilient and resistant to threats such as distributed denial of service (DDoS) attacks that can cause downtime and impact your bottom line.

---

**31 Do more today, and even more tomorrow**

Private 5G, especially when used in conjunction with edge computing, makes all kinds of new solutions possible. It can:

- **Extend established solutions:** With 5G you could extend solutions you're already using, such as asset tracking and condition-based maintenance, to places it was difficult to reach before.
- **Accelerate existing applications:** A great example of this is near-real-time quality control using 5G to transmit video for AI/ML-based image analysis at the edge and sending results back all within a fraction of a second.
- **Expand use cases:** You may already be using Wi-Fi or LoRa to track assets to improve safety and efficiency. With 5G you could expand how many devices you can monitor; so, for example, instead of just tracking pallets, you could track each product on those pallets.

But the business case for adopting private 5G isn't just about what you can achieve today. Private 5G could not only help you to improve existing applications and realise your current digital transformation projects, it could also inspire entirely new initiatives. It's only when you actually see 5G in action that you'll see that potential.



**You can't learn 5G in a book, you have to get hands-on with the technology. It's only through playing out different scenarios, testing the limits of each application and practising that you get to really understand it. Even though 5G is still in its infancy, companies that have started testing the technology have identified possibilities that they'd never imagined before."**

Mehdi H. Quraishi, Director Innovation, Private 5G, MEC & Partnerships, Verizon Business Group



## Get started with a 5G virtual workshop.

Our architecture consultants will work with you to understand your business challenges, ideate how 5G and multi-access edge computing help address them and build the business case. This advice could accelerate your efforts and help you get more from your investment.

[Find out more >](#)

---

## Be more secure

Concerns over security can make considering any new technology less appealing. But 5G, when built right, offers many security advantages over existing forms of connectivity. You should select a provider carefully, as not all will choose to implement all the security features that are part of the 5G spec. The right partner will give you a network with strong protections against impersonation threats, like man-in-the-middle attacks, and more.

---

## More affordable than you might think

A private network with all these capabilities may sound like something only for massive organisations with deep pockets, but it's not. Licences for 5G are typically inexpensive, more of an admin charge than a sizable fee. 5G needs fewer base stations, so the deployment and maintenance costs could be far lower than alternatives. And because you don't need a contract for each device, the ongoing costs of supporting a large number of devices could be a lot lower than you expect.

## Future proof your network.

We are working with businesses and innovators to bring groundbreaking 5G ideas to reality. Private 5G could help you get ahead of the game by delivering extremely high-performance, extremely low latency connectivity across your sites now.

Don't get left behind.

1 Juniper Research, [The Internet of Things: Consumer, Industrial & Public Services 2020-2024](#), April 2020

2 Ibid

## Next steps

Verizon's private 5G solutions can enable you to get on the 5G ladder now. We'll help you every step of the way, from deciding what connectivity is right for each site, through architecture design and acquiring licences, to deployment and ongoing management. We can also help you deploy edge computing and storage as needed and manage the whole infrastructure.

[Find out more >](#)