



Your boldest ideas made possible

Our 5G expertise



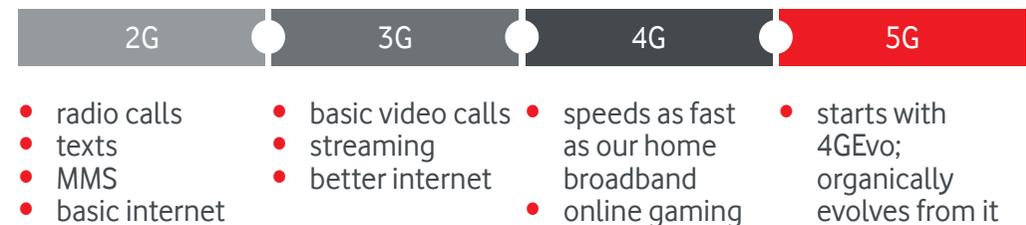
Running a business has never been so exciting. As new technologies arise, businesses leap into the digital world, and embrace innovations that suit their profile the most. However, new technology requires a new network.

A network that's better, faster, stronger, and built for the future. This is 5G.

What is 5G capable of?

- Peak speeds will reach and **exceed 1Gbps.**
- Our network capacity will increase; our customers will enjoy **higher and more consistent average speeds** – even in areas with less-than-ideal coverage.
- Latency is the round trip time between the device and the server; the lower it is the better. With **more than 60% latency reduction**, customers can deploy interactive apps or games without worry; 5G will keep them responsive.
- **Internet of Things** will become a reality with 5G network background.

Where does 5G come from?



What will 5G do for me?

Technical details	Possibilities
Capacity: 5G radio frequency has a wider bandwidth	Connect more things easily without network strains or slow connection
Less latency for mission critical services	Messages can be transmitted in real time, enabling services like power lines, railways, methane detection, remote surgery
Enhanced Mobile Broadband to do business in real time	Be always connected to fast broadband and enhance your customer experience with ultra-fast gaming or live interactive broadcasting
Augmented Reality (AR) based on geolocation data and local visual navigation	Special offers as people shop, better tourist information on-the-go
Internet of Things: day-to-day devices can be connected to the internet. It is estimated that soon there will be 1 million IoT devices per km2.	Bins, fridges, buildings, even cities can be smart; they can communicate, improve efficiency, and provide enhanced possibilities for the customer
Network slicing to support a multitude of applications, each with different performance requirements	Offers the guaranteed bandwidth and low latency for e.g. self-driving cars and V2V services

What will 5G do for me?

Even for voice calls, 5G unlocks more possibilities.

VoLTE (Voice over 4G, aka Voice over Long-Term Evolution) enables voice calls to be carried across our 4G data network, instead of using 2G or 3G.

This means



Making and receiving calls and using data without interrupting 4G download speeds



Clearer calls and less background noise



Less buffering or pixelation during video calls



Connecting customers to their family and friends – even faster than before

Why Vodafone

Vodafone **was the first operator to install** the new Massive MIMO panels in Europe, **paving the path to 5G.**

Our possibilities are **rooted in research**; we're running 5G trials in the UK, Germany, Spain and Italy.

At our 5G Mobility Lab, we've been **operating a 200-tonne crane 70km away in real time.**

We're working with customers to help them work out how 5G can future-proof their business.