

CityFibre

/ GIGABIT  
CHESTER

# Gigabit revolution in Chester



# Investing in Chester's digital future

## Chester will benefit from next generation full fibre broadband as part of CityFibre's national fibre-to-the-premises (FTTP) roll-out.

With the rapid growth of data consumption putting increasing pressure on the country's Victorian-age copper infrastructure, public sector organisations, businesses and residents are becoming more frustrated with slow, unreliable internet connections hampering their ability to thrive in the information age.

Thankfully, with the birth of the Gigabit City movement, Chester has now joined the ranks of some of the best digitally connected cities in the world.

Now Chester is set to benefit from a substantial city-wide full fibre roll-out.

The project will see a private investment from CityFibre of at least £23m, bringing transformational gigabit-speed internet connectivity within reach of nearly every home and business in the city.

Chester was chosen because it is a thriving and dynamic, city, steeped in history from the Roman times, when Chester was the capital city of England, to the rise of the Tudor dynasty from its Welsh borders, Chester has always retained its dominance as a key city in the UK. Known as the 'famous walled city', Chester is home to iconic covered walkways, one of the largest amphitheatres in the UK, and the best surviving Roman fortress wall in Northern Europe. The city holds plenty to offer both for tourists and those who live there, with is so much culture and entertainment to be enjoyed, combined with a top-class university and excellent job prospects, all of which makes Chester a prime Gigabit City.

We are in the early stages of the project, services are not yet live but once our new fibre network is activated, services will be available from an increasing range of broadband providers.

With a new, independent, city-wide full fibre infrastructure, Chester will be able to enhance its standing as a globally competitive digital city; transforming the online world at home, increasing productivity, sparking innovation and driving economic growth by creating new jobs, attracting start-ups and enticing further inward investment.

# £23m

investment from CityFibre



“CityFibre’s new investment in Chester is testament to the City’s role as a driving force in our Borough’s economy. It comes at a time when the Council is particularly focused on economic recovery and when connectivity has never been more important, both for businesses and residents. Alongside our own regeneration schemes such as the Heritage Action Zone on The Rows, the new Northgate Development, and our ambition plans for the area around Chester train station, this investment from CityFibre shows confidence in our City and will help secure Chester’s position as a place that is resilient and looking to the future.”

**Cllr Richard Beacham**

Cheshire West and Chester Council's Cabinet Member for Housing, Regeneration and Growth

# What does this mean for Chester?

Spanning 2020 and into 2021, as part of their sustainability and emissions agenda, Chester and Cheshire West Council has detailed their priorities, which includes enhancing digital infrastructure, such as full fibre broadband to premises. In order to secure a long-term future for the district including residents and businesses, the council recognises that investing in digital infrastructure will allow the economy to benefit across the entire borough.

With full fibre beneath its streets, Chester's entire digital landscape will be transformed – making the city more innovative, more productive and giving a digital boost to the local economy for decades to come.

The applications and benefits of gigabit-speed internet connectivity are almost endless. Full fibre broadband will not only revolutionise the online world at home by unlocking new forms of entertainment and making flexible home working a reality, it will also provide a step change in internet speed and quality for the whole community.

With a gigabit infrastructure at its heart, Chester will be ideally positioned to attract and foster new businesses as well as retain and grow those already based in the city.

Thousands of enterprises of all sizes will be provided with a digital advantage equivalent to that enjoyed by companies based in the world's most technologically advanced cities.

Enhanced digital connectivity also enables those in education, health and social care sectors to adopt the latest technologies; introducing innovative e-learning techniques and remote lessons in schools, colleges and universities, and providing the perfect foundation for crucial health and social care solutions such as telemedicine, remote monitoring of the elderly, and convenient online GP consultations.

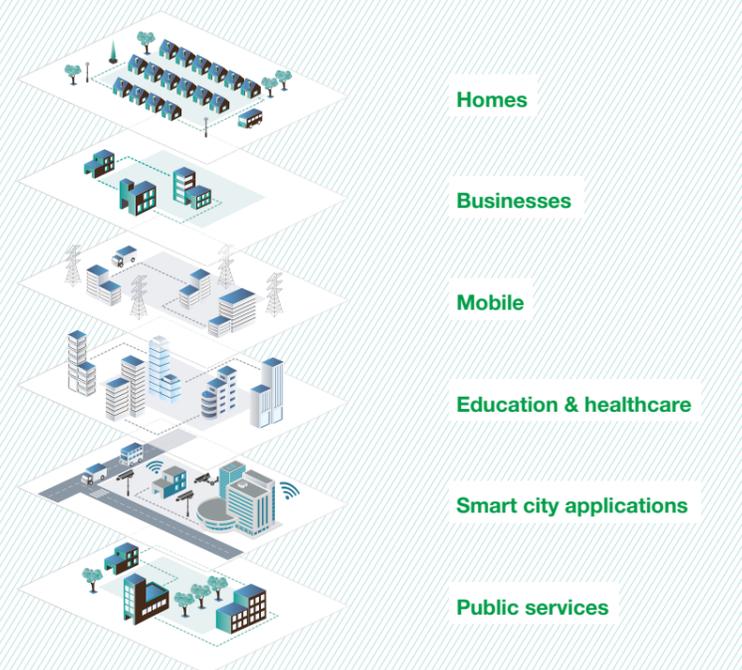
Full fibre also brings about the potential for vastly improved mobile network services and experimentation with smart city initiatives such as big data projects, high definition CCTV and smart traffic controls.

Ultimately, as every aspect of our lives becomes increasingly dependent on bandwidth, Chester will be primed to thrive – making it one of the UK's most attractive areas to live and work.

## What is a Gigabit City?

A Gigabit City is a metropolitan area with a full fibre infrastructure capable of supporting the current and future digital requirements of the entire city, including residents, public sector, businesses and mobile operators.

CityFibre is the UK's third national digital infrastructure platform and the builder of Gigabit Cities, creating futureproof platforms for economic growth, innovation and global competitiveness.



Homes

Businesses

Mobile

Education & healthcare

Smart city applications

Public services

## Economic impacts

# £34m

from private household benefits via increases in house prices and household wealth\*

# £4m

from increased business productivity\*

# £4m

from new business start-ups\*

# £4m

from healthcare technologies\*

# £27m

from smart city infrastructure\*



### Homes

Residents will be able to access full fibre broadband services in their homes, revolutionising user experience with seamless multi-device streaming, buffer-free video calling and real-time gaming, as well as supporting the adoption of flexible working practices and IoT technologies.



### Education

With a full fibre infrastructure at its core, Chester can lead as an educational centre of excellence, using online technologies to deliver engaging content to students and enhance research facilities. Fast, reliable and cost-effective, full fibre also allows schools, colleges and universities to improve back office efficiency and transform the way they operate.



### Mobile

Connecting mobile sites to full fibre removes capacity issues, providing seamless 4G connectivity for those on the move throughout the city. As a Gigabit City, Chester will be ready to respond and adapt, ensuring its citizens are among the first to benefit from mobile innovations such as 5G.



### Smart city initiatives

Full fibre provides the perfect foundation to implement smart city solutions from city-wide WiFi to traffic control and high definition CCTV.



### Businesses

With more businesses moving their services and data to the cloud, full fibre connectivity is becoming essential. By connecting to Chester's gigabit network, local businesses will experience increased productivity and cost savings with instant access to data, smooth-running cloud applications, and reliable hosting and backup.



### Healthcare

E-Health, M-Health, telemedicine and wellness projects can be quickly introduced, enabling a range of new technologies to better diagnose, treat, monitor and support patients, as well as help improve the overall health of the entire population.



### Public services

In a Gigabit City, Councils can connect entire estates to full fibre, from offices and schools, to hospitals and community hubs. This enables them to introduce efficiencies and reduce costs, transforming the access and provision of public services, and helping to eliminate the digital divide.

**“Next generation Full Fibre connectivity will drive innovation and productivity, ultimately giving Chester businesses the speed and reliability they need to thrive locally, nationally and internationally. Thousands of residents will benefit from this investment too, ensuring we can create a community and economy where everyone can feel connected.”**

**Cllr Richard Beacham**  
Cheshire West and Chester Council's Cabinet Member for Housing, Regeneration and Growth

\*All figures cited here indicate the estimated economic impact of full fibre deployment in Chester over a period of 15 years and can be found in the study commissioned by CityFibre and undertaken by Regeneris, 'Economic impact of full fibre infrastructure in 100 towns and cities 2018'.

# What is full fibre and why do we need it?

The term fibre is often misused. Many broadband services advertised as 'fibre' will actually be relying on a 'last mile' of copper wire, causing a crippling bottleneck on connection speeds and upload capabilities at times of peak use.

CityFibre, however, only invests in full fibre networks, which means fibre at every point in the network, including the 'last mile'. With fibre connecting directly into premises, all users can enjoy the transformative benefits of reliable gigabit-speed internet connectivity.

Full fibre investment is especially important in the UK as our internet infrastructure is still reliant on capacity-constrained copper

cabling. Sitting at the bottom of The Organisation for Economic Co-operation and Development's (OECD) league table for full fibre coverage, the UK is falling perilously behind.

It's not just full fibre providers like CityFibre which are aware that we need to close this fibre gap and safeguard our digital future. Revolutionising the UK's digital infrastructure is now a key focus for our country's leaders too, with national government policy direction positioning full fibre and 5G at the heart of the UK's industrial and digital strategies.

With purpose-built full fibre underpinning the city's connectivity needs, Chester will be primed to thrive in the information age for decades to come as bandwidth and connectivity demands continue to grow exponentially.

## Standard fibre broadband (FTTC)



## Full fibre broadband (FTTP)



"Think what we could achieve if the whole country had the same lightning access to this essential tool of progress. If the Spanish can do it, why can't we? Let's say goodbye to the UK's manana approach to broadband and unleash full fibre for all by 2025."

**Boris Johnson**  
UK Prime Minister

# Building a network for the future

Using CityFibre's well-planned city approach, Chester's full fibre network will be designed and built with enough fibre and duct in place to serve nearly every home, business, public building and mobile site with gigabit speeds now and far into the future.

Construction of a network on this scale will cause some disruption to the city. However, we will work closely with Cheshire West and Chester Council and make every effort to manage disturbance wherever possible, using modern construction techniques for smooth, fast deployment.

While construction will last a number of years, the amount of time spent in one road is likely to be just a few days. We will notify all concerned in advance to ensure they have the details of exactly what is happening in their street and when.

Given the complexity of building the network and onboarding broadband providers, at this moment in time it is difficult to put an exact timetable in place for when the services will be live in Chester. However, we are working hard to ensure that the city can start experiencing the benefits of a full fibre network as soon as possible.

While we work on building the network, we are asking residents and businesses in the area to pre-register their interest. We will then alert them when services become available.

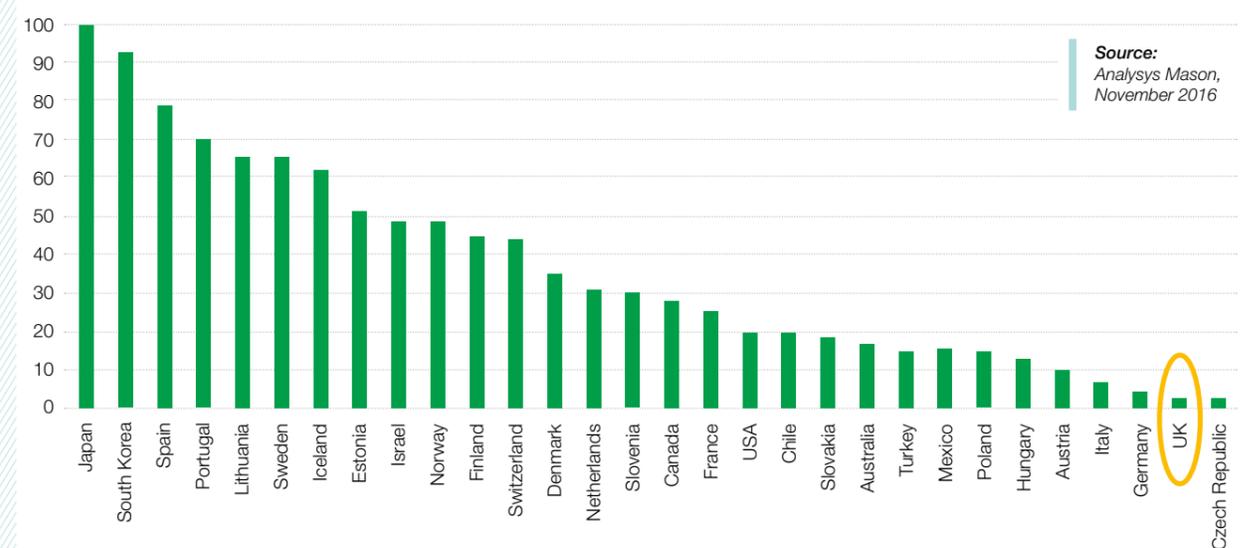
Find out more at [cityfibre.com/residential](http://cityfibre.com/residential)

## Full fibre in practice

In 1994, the City of Stockholm invested in the development of an open, operator-neutral full fibre network, bringing full fibre to everything in the city, including within reach of 90% of households.

This €600-million investment has brought over €1.8-billion return to the city, delivering essential growth benefits such as increased property and rental values, ICT savings for local government and public services, annual savings and increased employment for businesses, including a host of successful start-ups such as Spotify, Skype and Mojang, the makers of online game Minecraft.\*

## Fibre coverage to premises in OECD nations (% of premises passed)



Source: Analysys Mason, November 2016

\* Stokab, a socio-economic analysis, Marco Forzati Crister Mattson, Acreo Swedish ICT AB

# How can you help?

Strong, regular community engagement is vital to the success of this FTTP roll-out. Here are four simple ways to help this project:

- 1 Become an advocate**  
Help us to promote the benefits of the Gigabit City project by providing a quote, speaking at events and spreading the news across your networks
- 2 Share on social**  
Follow, mention and share on Twitter and LinkedIn with **@CityFibre** and use the hashtag **#GigabitChester**
- 3 Register your interest**  
Get the latest updates on the project and pre-register your interest in full fibre broadband at [cityfibre.com/residential](http://cityfibre.com/residential)
- 4 Tell us your thoughts**  
We're always open to feedback. Get in touch with Julie Derbyshire and let us know the best way to make the project a success in your community.

If you have any questions or would like to find out more about the ways you can help make this project a success, please contact Julie Derbyshire, City Manager: [Julie.Derbyshire@cityfibre.com](mailto:Julie.Derbyshire@cityfibre.com)

## About CityFibre

As the UK's third national digital infrastructure platform and the builder of Gigabit Cities, CityFibre designs, builds, owns and operates alternative communications infrastructure. Working completely independently from the incumbent network builders, CityFibre promotes healthy market competition with an open-access, supplier neutral network model. With dense duct and fibre footprints in over 60+ cities throughout the UK, it provides a portfolio of active and dark fibre services to its customers which include service integrators, enterprise and consumer service providers, local authorities and mobile operators. CityFibre is committed to bringing gigabit capable full fibre broadband to up to 8 million UK homes and businesses. The company is jointly controlled by Antin Infrastructure Partners and West Street Infrastructure Partners (a fund managed by Goldman Sachs).