
Continuing to Connect Telecoms 2015-2017

INTRODUCTION

This document is to present how telecommunications can be further advanced in Northern Ireland by Government. It is set against the background that telecommunications in the UK is fully privatised and independently regulated. Telecommunications policy is a reserved matter with responsibility primarily resting at Westminster.

It is set against the context of significant budgetary pressures on the Northern Ireland Executive. Government intervention must address market failure and be additional to investment from the private sector.

The proposals cover a two year period from 2015 to 2017. During this period, there may be a Comprehensive Spending Review and departmental restructuring. The proposals will be reviewed if these impact on telecoms.

POLICY CONTEXT

The telecommunications market in Northern Ireland, as in the rest of the UK, is fully privatised and independently regulated on a national basis by the Office of Communications (Ofcom).

Telecommunications is a reserved matter meaning that it has not been devolved to the Northern Ireland Executive but is controlled centrally by the Department of Culture, Media and Sport (DCMS) in London.

Under the Communications Act 2003, the Department of Enterprise, Trade and Investment has been given limited powers to intervene where there is evidence of market failure but this has to be undertaken with caution in order to avoid distortion of the market and comply with European regulations.

STRATEGIC CONTEXT

The **Digital Agenda for Europe¹ (DAE)** aims to help Europe's citizens and businesses to get the most out of digital technologies. The DAE targets broadband speeds of 30Mbps or above (aka Superfast or Next Generation Access) for all European Union citizens, with half of households subscribing to connections of 100Mbps or higher (Ultrafast) by 2020.

¹ Digital Agenda for Europe homepage <http://ec.europa.eu.digital-agenda/>

The **UK Government** has stated its commitment² to continue to invest in broadband that will result in extending superfast broadband to 95% of premises by 2017 and to explore with the industry how to expand coverage further using more innovative fixed, wireless and mobile broadband solutions to reach at least 99% of premises across the UK by 2018”.

It also recognises the need to plan ahead to make sure that our digital communications infrastructure meets the needs of users in the UK and maintains a competitive edge to retain and attract business³.

The **Northern Ireland Executive’s Economic Strategy** recognises that, to underpin economic growth, Northern Ireland needs a modern and sustainable economic infrastructure. It also recognises the need to build on NI’s existing strengths, including our status as one of the first UK regions to deliver extensive next generation broadband services.

A key aim of the **Executive’s Regional Development Strategy** is to implement a balanced approach to telecommunications infrastructure that will provide a competitive advantage.

The **Programme for Government 2011 -2015** sets growing a sustainable economy and investing in the future as a priority and states that this means ‘enhanced economic infrastructure’. The continued development of Northern Ireland’s telecoms infrastructure is also relevant to other Programme for Government targets which aim to improve the quality and cost effectiveness of public services in terms of access and the range of contact channels available, including better quality and consistent online services.

The **Economic Pact** between the Northern Ireland Executive and the UK Government acknowledges the need to build on Northern Ireland’s strong communications infrastructure in boosting the Northern Ireland economy.

CURRENT MARKET ASSESSMENT

Broadband

The telecommunication industry is continuing to spend in Northern Ireland but, given the economics of network deployment, private sector led investment generally tends to be focused in lower cost urban and suburban areas. This means the extent of the services available, and the number of service providers offering these services, tends to be greatest in areas of higher population density.

² Connectivity, Content and Consumers – Britain’s digital platform for growth (DCMS, July 2013)

³ Digital Communications Infrastructure Strategy –Consultation August 2014

There is some limited private sector led investment outside these areas, particularly by service providers using fixed wireless technology. However, in light of the critical role that broadband deployment and adoption can serve in the process of enabling economic growth across the region, DETI has intervened to balance private sector investment trends with the Next Generation Broadband Project and the more recent Northern Ireland Broadband Improvement Project [covered later], which have both served to provide improved broadband technologies and infrastructure into more rural areas.

Eight in ten households in Northern Ireland (80%) have taken up an internet connection in the first quarter of 2014, coming close to the UK average of 82%.

In terms of the take-up of superfast broadband services (defined by Ofcom as 30Mbps+), Northern Ireland exceeds the UK average, with penetration of 22% of premises.

Fixed access broadband take-up	Take-up of fixed broadband, % of residential premises	Take-up of superfast broadband, % of premises
England	73%	22%
Scotland	73%	16%
Northern Ireland	70%	22%
Wales	69%	13%
Total UK	73%	21%

Source: Ofcom UK Communications Infrastructure Report: December 2014

Over four in ten households in Northern Ireland have a tablet computer. Among the UK nations, tablet take-up is highest here and in Wales having increased by 16 percentage points over the past year to 45%. Rural areas of Northern Ireland saw the most dramatic rise from 19% in Quarter 1 of 2013 to 52% in Quarter 1 of 2014⁴

⁴ Communications Market Report (Ofcom -August 2014)

Mobile

Significant investment by mobile phone companies is delivering better 3G coverage for consumers in Northern Ireland. EE and Three have improved their shared network, which has seen 3G population coverage reach 95%. O2 and Vodafone are committed to making improvements to their shared network to deliver similar levels of coverage.

As part of the 4G spectrum auction in early 2013, O2 Telefonica is obliged to provide indoor mobile broadband reception to at least 98% of the UK population by end 2017. O2 has committed to achieving this in Northern Ireland by 2015. A 4G network which meets this requirement is likely to cover more than 99% of the UK population when outdoors.

In addition to the UK-wide coverage obligation, the Regulator requires the same operator to provide indoor service to at least 95% of the population of each of the UK nations. Outdoor coverage for the network meeting this obligation is likely to be around 97% of the population of each nation, and Northern Ireland will have similar levels of other parts of the UK.

Service providers are currently upgrading their existing 2G and 3G networks with a view to increasing coverage.

98.9% of Northern Ireland premises currently have 2G mobile coverage from at least one operator.⁵

99% of Northern Ireland premises currently have 3G mobile coverage from at least one operator.⁴

79.2% of Northern Ireland premises currently have 4G mobile coverage from at least one operator⁴.

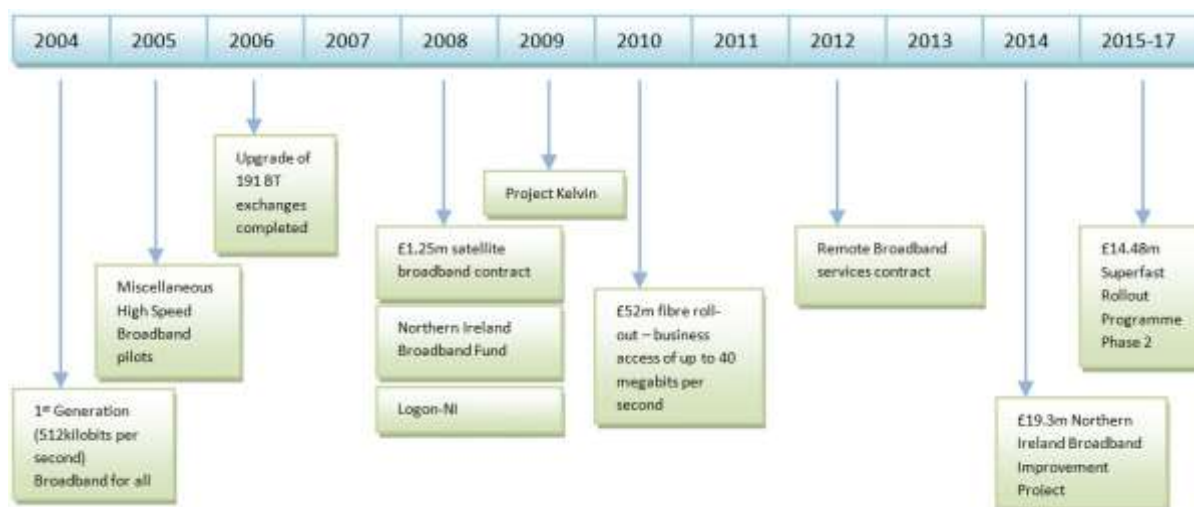
GOVERNMENT INVESTMENT

Broadband

Since 2004, DETI has developed and delivered a number of important infrastructure projects, drawing on funding from the EU, UK Government and Northern Ireland Executive sources. By the end of 2015, some £64m of public investment will have been made in broadband.

⁵ Communications Market Report (Ofcom: August 2014)

HISTORY OF NI GOVERNMENT INVESTMENT



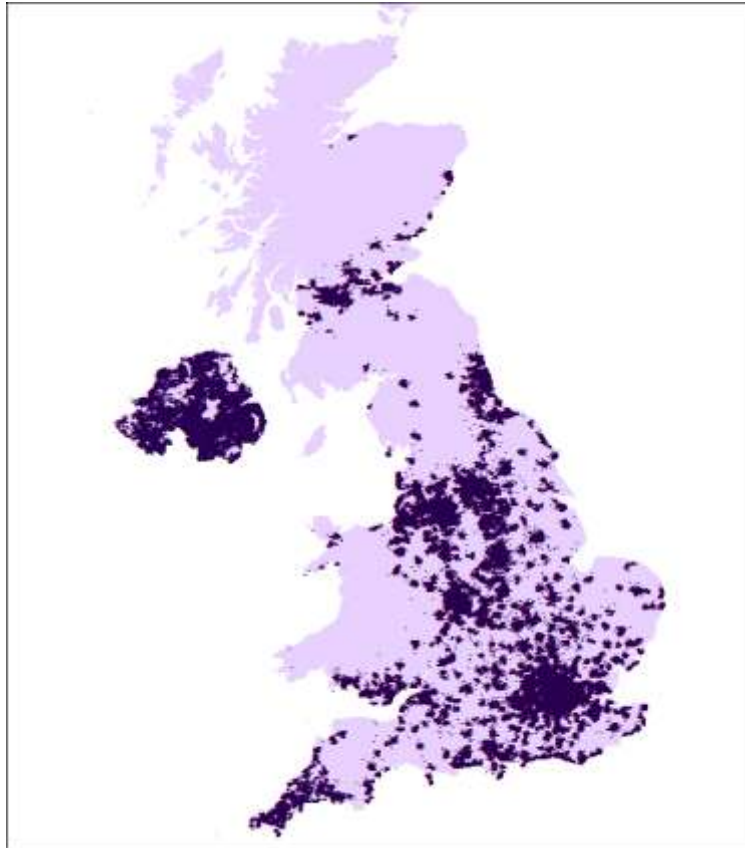
Project Kelvin established a direct international link between the North West and North America.

Next Generation Broadband Project has helped deliver access to higher speed broadband services to at least 85% of businesses across Northern Ireland.

Fibre deployment has been completed to 1,265 cabinets and when added to BT's own investment, some 2480 cabinets allow around 89% of telephone lines in Northern Ireland to be connected to a fibre enabled cabinet.

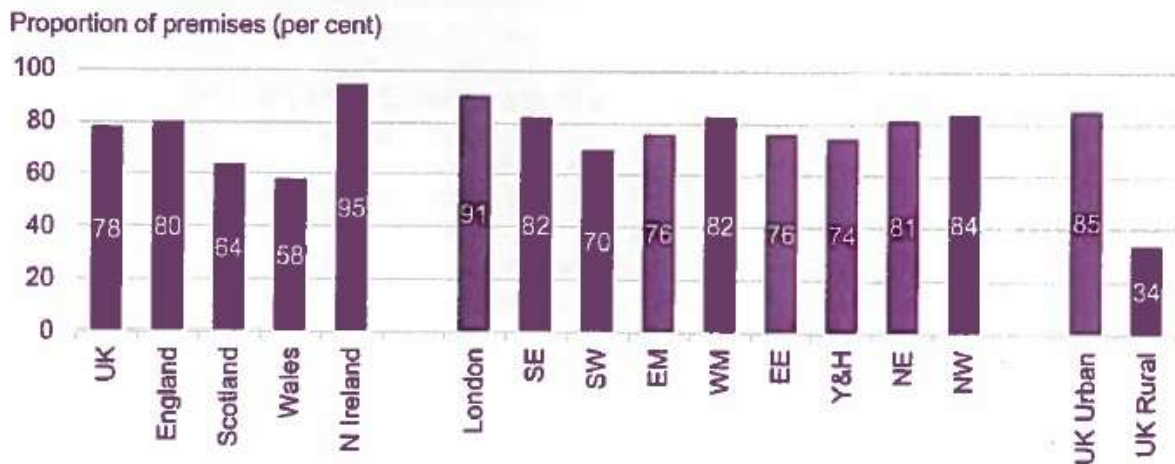
Remote Broadband Service contract promoted satellite broadband services to domestic consumers and business premises. **Northern Ireland Broadband Fund** supported 8 projects which resulted in the roll out of fixed wireless services across rural Northern Ireland and the completion of a number of technology trials to explore potential broadband solutions in rural areas.

POSTCODES WHERE NGA NETWORKS ARE AVAILABLE



The map (Source: Ofcom) shows the postcodes where Next Generation Access (30Mbps) networks are available. Throughout most of the UK, superfast broadband roll out is largely concentrated in urban areas, where it is cheaper to deploy new infrastructure because of population density, the impact of public sector interventions to extend NGA availability in Northern Ireland is clearly visible.

Figure 5.4 Proportion of premises able to receive NGA broadband services



Sources: Ofcom/BT Openreach/Kcom, June 2014 data

The **Northern Ireland Broadband Improvement Project** will further extend broadband coverage. It is expected to provide access to standard 2Mbps broadband to 96% of premises and superfast broadband to at least 85% of premises by 2015. More choice and improved speeds will be brought to at least 45,000 premises.

The UK Government is making further funding available to extend superfast broadband across the UK. Under the Superfast Rollout programme, Northern Ireland has an indicative allocation of £7.24m and DETI is seeking to match this amount resulting in a potential total of £14.48m. This may be further supplemented with a supplier contribution. If a further intervention presents value for money, this will provide further or improved broadband coverage across Northern Ireland.

Mobile

In comparison to broadband, the mobile coverage has been more problematic in Northern Ireland. Issues such as reliability, customer experience and inadvertent roaming have continued to feature as unwelcome and constant areas of complaint. The Mobile market has been in a process of rationalisation and consolidation. A number of operators have chosen to share infrastructure, which has helped reduce operating costs. A number of operators have also been successful in the outcome of the auction for 4G spectrum.

The UK Government is implementing the **Mobile Infrastructure Project (MIP)** across the UK to improve basic voice and data services. Northern Ireland will benefit in that around 72 provisional mast sites have been identified to address those 'not spot' areas where no mobile coverage is available and from which improved services will be delivered by 2015. The industry has indicated that this project, while aimed at basic services, allows it the opportunity to upgrade 3G/4G services where possible.

In addition, the UK Government has agreed with the four mobile networks that they improve mobile coverage across the UK. It will bring a further £5bn in investment from the four operators and result in cutting total 'not-spots' where there is currently no mobile coverage by two-thirds. This will support the Government's existing £150m MIP project to take mobile coverage to the areas of the UK that have no coverage at all.

FUTURE DEMAND

The online activity of citizens in Northern Ireland will continue to grow, and the requirement for higher bandwidth intense services will increase. This will be even more challenging given the multiple use of these services within individual households.

We need to ensure that our telecommunications infrastructure continues to offer a competitive advantage, both in terms of our businesses being able to compete

successfully in external markets and in promoting Northern Ireland as an attractive inward investment location. With this in mind, DETI is conducting an audit of broadband services to business parks that it has identified.

Businesses will require higher bandwidth services with many sectors, such as ICT digital, financial/legal services and manufacturing, needing to share or store large volumes of data. Usage and availability of cloud based software services is increasing, with more businesses using ICT to share/store data and information within their business and also between the business and customers/consumers.

Fast mobile data is becoming essential for businesses in Northern Ireland. The availability of fast mobile broadband will allow businesses to be more confident about implementing ICT for use by remote workers, enabling them to be more productive and efficient.

Mobile services are vital from a tourism perspective. Social media is transforming the travel industry in terms of visitor behaviour and will have a major impact on how the hospitality and tourism sector will compete effectively in the future. It is already happening – 52% of Facebook users have said that their friends' photos have influenced their holiday choice; 41% of consumers write reviews about their travel experiences; and 24% of UK consumers share their experiences via social media while on holiday and a further 49% when they return home.

Northern Ireland can be rightly proud of what has been achieved. The infrastructure that has been put in place contributes to us having a world class facility that attracts foreign investment. However, we must not fall into the trap of becoming complacent. We are well aware that not every area is well served and particularly deep rural areas continue to experience difficulties in coverage, speeds and reliability

The market is fast moving. As we move into the hard to reach rural areas, technological advances are helping us to improve broadband access and to meet the ever increasing needs of technologically advanced customers.

It is estimated that the availability and take-up of faster broadband speeds will add around £17 billion to the UK's annual Gross Value Added by 2024⁶.

PROPOSALS

Working within the budgetary pressures we face and in line with the strategic and policy context outlined earlier, DETI will work to ensure that Northern Ireland remains at the forefront of the development and deployment of telecoms infrastructure.

⁶ UK Broadband Impact Study (SQW -November 2013)

Improve infrastructure

- DETI will continue to liaise with DCMS to ensure that Northern Ireland benefits from any future funding from the UK Government to extend the roll-out of superfast broadband to rural areas and the support to business through super connected cities.
- We will specifically work to complete the broadband Superfast Rollout Programme Phase II and secure around £14.48m public funding on a value for money basis.
- DETI will assess if further intervention is required in mobile infrastructure once the industry investment and the UK Government project have completed.
- DETI will continue to explore other sources of funding to help Northern Ireland achieve the goals of the Digital Agenda for Europe initiative by 2020.
- We will continue to work with the telecommunications regulator Ofcom and other statutory bodies to ensure that the regulatory environment within which telecoms infrastructure development takes place is sustainable.
- We will continue to work to ensure that the development of telecoms infrastructure is balanced across Northern Ireland, capable of supporting effective and efficient public services and contributing to economic growth.
- We will consider the outcome of the audit of broadband services to identified business parks.

Educate and Inform

- We will engage with business partners and the community to explore how we ensure that Northern Ireland is fully exploiting the benefits of our telecoms infrastructure.