

Broadband Open Market Review

Department for the Economy

Project Stratum

State Aid Public Consultation

Extending Broadband across Northern Ireland.

1. INTRODUCTION

Since 2007, the Department for the Economy (DfE) has channelled over £77m of public investment into initiatives to encourage private sector upgrade to broadband networks, primarily in rural areas and where the private sector alone would not invest. By the end of June 2018, following the completion of current projects, approximately 88% of premises in Northern Ireland have access to superfast services¹. This falls short of the 95% target set by the UK Government which was largely achieved by December 2017.

As a result approximately 12% cannot yet access superfast broadband. The majority of these remaining premises are in rural areas. 63% of rural premises can get 30 Mbps, in comparison to 98% of urban premises². In addition, we have the largest economic reliance on rural businesses in the UK³ and some 25% of SMEs in NI cannot yet access 30 Mbps⁴.

Funding has been made available as a result of the Confidence and Supply Agreement for further broadband improvement which could provide substantial enhancements to Internet connectivity across Northern Ireland.

Project Stratum aims to improve broadband connectivity by extending Next Generation Access (NGA) broadband infrastructure so that the remaining 12% of premises can access services of at least 30 Mbps. The Programme Area of Project Stratum covers Northern Ireland (**Annex A**). The project will seek to be complementary to recent announcements made under Future Telecoms Infrastructure Review. The overarching aspiration of Project Stratum is to deliver

¹ [Ofcom Connected Nations update Spring 2018](#)

² [Ofcom Connected Nations update Spring 2018](#)

³ FSB NI response to Ofcom annual plan consultation – Feb 2016

⁴ Ofcom Connected Nations December 2017

future-proofed broadband access to as many premises in the intervention area as possible.

DfE intends to launch an open procurement in early 2019, in respect of the remaining area without NGA broadband infrastructure (known as “white NGA”), which comprises around 100,000 premises. Through this current consultation, we wish to confirm that all premises who cannot yet access speeds of greater than 30Mbps have been correctly identified.

The UK Government received approval on 26 May 2016 from the European Commission on its new National Broadband Scheme for the United Kingdom (referred to hereafter as the 2016 NBS). DfE proposes to conduct this further procurement under the 2016 NBS.

2. MARKET ENGAGEMENT AND ANALYSIS OF EXISTING COVERAGE

In preparation for this procurement, DfE conducted a new Open Market Review (OMR) between 19 June 2018 and 27 July 2018 to establish existing and planned (within the next 3 years) coverage of broadband infrastructure across Northern Ireland. This included both commercial coverage by existing and prospective NGA broadband infrastructure providers and coverage procured under DfE’s existing contracts with BT.

DfE contacted all known broadband infrastructure operators within the Programme Area and other providers known to have (or potentially have) plans to deploy new networks across the UK with a formal request for information. The OMR was also publicised through a notification on its Citizen Space Consultation Hub website. Operators were requested to provide information on their existing and planned NGA broadband infrastructure (capable of delivering download speeds of at least 30 Mbps), and to provide details of their coverage at a premise level so as to enable greater granularity of mapping.

This information, together with DfE's own data sources, has been used to define the proposed intervention area for the forthcoming procurement.

This public consultation sets out that proposed intervention area, so as to enable all interested stakeholders (including the public, businesses, internet service providers and broadband infrastructure operators) to comment on the proposals. In particular, this provides an opportunity for broadband infrastructure operators to review DfE’s mapping to ensure that it correctly represents the information provided by them in the course of the OMR.

All responses to the public consultation will be carefully considered and, where necessary, will be incorporated into the final map of the intervention area. The final intervention area maps and a summary report confirming details of the changes made to the proposed intervention area will be published on the DfE’s website shortly after the close of this consultation period. Where responses to the consultation are received, DfE will publish a report on the outcomes of the

consultation and provide an explanation of how the information submitted has been treated. The finalised intervention area will then be submitted to BDUK's National Competence Centre (NCC) for approval against the State aid framework.

3. STATE AID FRAMEWORK AND RULES

This section provides a brief introduction to the State aid Framework for the purpose of informing responses to the public consultation. Respondents may wish to obtain their own professional/legal advice on the application of the State aid framework and rules that relate to this proposal.

The European Commission has published 'EU Guidelines for the application of State aid rules in relation to the rapid deployment of broadband networks' (2013/C 25/01).⁵ These guidelines summarise the principles of the Commission's policy in applying the State aid rules of the Treaty to measures that support the deployment of broadband networks, and seek to ensure that State aid schemes for broadband are well-designed so that they target market failures and minimise negative effects on competition.

The guidelines require public interventions to be targeted so as to limit the risk of crowding out private investments, of altering commercial investment incentives and ultimately of distorting competition.

Planned public interventions can seek State aid approval directly from the Commission, or (as is the case with this proposal) seek clearance under a national scheme which has been pre-approved by the Commission.

Projects under the 2016 NBS will need to demonstrate their State aid compliance (in accordance with the terms of the scheme) in order to receive clearance from BDUK's National Competence Centre.

The Commission's guidelines distinguish between two types of broadband networks, namely basic broadband and NGA networks.

Basic broadband networks are generally those based on currently widely-deployed technologies such as fixed wired telephony networks (using ADSL/ADSL2+ technologies), non-enhanced cable TV networks (e.g. DOCSIS 2.0), mobile networks (2G/3G (UMTS)), some fixed wireless access (FWA) networks, and satellite networks.

NGA networks rely wholly or partly on optical elements (optical fibre) and are capable of delivering an enhanced broadband capability compared to existing basic broadband networks. Current qualifying NGA technologies are fibre-based networks (FTTx), advanced upgraded cable networks (DOCSIS 3.0) and certain advanced wireless access networks capable of delivering reliable high speeds.

⁵ <http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2013:025:0001:0026.EN.PDF>

Guidance on the characteristics of qualifying NGA technologies is available from BDUK.⁶

The Commission's guidelines also require that public intervention should be able to ensure a 'step change' in broadband availability. This is demonstrated by:

- Significant new investments in the broadband network;
- The new infrastructure brings significant new capabilities to the market in terms of broadband service availability and capacity, speeds and competition⁷.

The 'step change' in broadband availability shall be compared to that of existing as well as concretely planned networks.

The Commission's guidelines also distinguish between geographic areas on the basis of their existing or planned broadband infrastructure:

- 'White' areas are those in which there is no qualifying broadband infrastructure and none is likely to be developed within 3 years;
- 'Grey' areas are those where only one network is present or is to be deployed within the coming 3 years; and
- 'Black' areas are those where at least two networks of different operators exist or will be deployed in the coming 3 years.

This geographic mapping of White/Grey/Black areas is carried out separately in relation to basic broadband and NGA networks. NGA networks are mapped on the basis that, amongst other things, they have substantially higher upload speeds (compared to basic broadband networks)⁸ and are able to deliver broadband services at an access (download) speed of more than 30Mbps.

Public intervention can only take place in white NGA areas under the 2016 NBS. White NGA areas are those in which there are no NGA networks and none is likely to be developed within the next 3 years.

4. PROPOSED INTERVENTION

Data from broadband infrastructure operators has been mapped into white, grey or black areas at a postcode level, using the following criteria:

⁶ <https://www.gov.uk/government/publications/2016-nbs-tech-guidelines>

⁷ See Footnote 66 of the Commission's Guidelines - this sets out that the subsidised network should be pro-competitive (i.e. allow for effective access at different levels of the infrastructure).

⁸ Substantially higher upload speeds means at least a doubling of the maximum upload speed available on current generation access network(s) for given 'up to' packages available on basic broadband networks in the relevant intervention area.

For basic broadband:

- A postcode is turned grey if there is only one broadband infrastructure operator providing basic broadband services (with speeds greater than 2 Mbps) to that postcode;
- A postcode is turned black if there are at least two broadband infrastructure operators providing basic broadband services (with speeds greater than 2 Mbps) to that postcode; and
- All other postcodes remain white.

The Northern Ireland Better Broadband Scheme is a national scheme, run in partnership with the DfE, the Department for Digital, Culture, Media and Sport (DCMS), and registered retail service providers. It is jointly managed by DfE and the DCMS.

The Northern Ireland Better Broadband Scheme has been developed by the UK Government to provide access to a subsidised broadband installation to homes and businesses that are unable to access a broadband service with a download speed of at least 2 Mbps and who will not benefit from other broadband roll out.

This means that all postcodes in Northern Ireland are classed as basic broadband grey. There are no basic broadband white postcodes in Northern Ireland. As all postcodes are classified as basic broadband grey, no further analysis was undertaken to identify basic broadband black postcodes.

For NGA:

- A postcode is turned grey if there is only one broadband infrastructure operator providing NGA services (with speeds greater than 30 Mbps) to that postcode;
- A postcode is turned black if there are at least two broadband infrastructure operators providing NGA services (with speeds greater than 30 Mbps) to that postcode; and
- All other postcodes remain white.

In addition, the proposed intervention area includes a number of 'under review' areas. These areas have previously been indicated to have planned commercial coverage for NGA broadband (i.e. mapped as grey or black NGA), but those plans have been reported through the OMR as being 'at risk'. These areas will be subject to continued monitoring and verification of supplier plans within the 3 year period by DfE. In the event that these commercial plans fall away these premises will be mapped as white NGA and form part of the proposed

intervention area and eligible for intervention via this aid measure.⁹ These are summarised in Table 1

	Number of Postcodes	Number of Premises
White	15,226	100,448
Grey	27,489	414,762
Black	13,523	330,015
'Under Review'	870	6,916

Table 1 - Summary of Premises Information

DfE proposes to conduct a new procurement under the 2016 NBS to procure coverage to target the remaining 'white NGA' areas as follows:

- By conducting a new procurement under the 2016 NBS (and in accordance with the Public Contracts Regulations 2015).

As noted above, if commercial plans fall away in the 'under review' areas then these will be considered as 'eligible for intervention' and considered as 'white NGA' areas.

If it is possible, DfE intends to make coverage information available at a premises level within the identified white postcode areas to bidders, to ensure that bids can target those premises without NGA broadband coverage efficiently. This will include information at a premises level received in response to this consultation.

It should be noted that the procurement will not deploy basic broadband technologies. In accordance with the requirements of the 2016 NBS where there is overbuild of broadband infrastructure, the premises will receive over 30 Mbps or at least a doubling of current speeds. Where doubling is not possible, the supplier will be obliged to demonstrate that the design is optimised to limit the over-build of existing basic broadband networks with speeds that are below 30 Mbps.

⁹ See paragraph 65 of the Commission's guidelines.

5. NEW PROCUREMENT

DfE commenced an extensive pre-market engagement and warming exercise in October 2018. DfE also issued its outline requirements to enable feedback from potential bidders to be taken into account in the design of the scheme and to understand the capacity and capability of the market.

DfE also considered the ability of the private sector to deliver the project, available resources, and its own capacity and capability to develop its approach to intervention. It is likely to use an investment gap funding approach to procure an infrastructure provider. However, no decision has been made and will depend on the outcome of the pre-market engagement.

Currently, it is proposed to carry out the procurements in accordance with the Public Contracts Regulations 2015 and EU Public Procurement Directives. The tender is most likely to utilise the Open Procedure and will be conducted in a transparent and non-discriminatory manner, as required by the 2016 NBS.

The procurement will be designed to meet the specific requirements of the 2016 NBS, which recognises the need to optimise the number and quality of bidders, in particular by reducing the hurdles to participation in procurements by smaller suppliers, and encouraging collaboration between larger and smaller operators so that a range of appropriate solutions can be brought forward. This is also a key objective of the pre-market engagement exercise. When the procurement is launched, the white areas could potentially be sub-divided into a number of lots or areas to promote this. However, DfE does not discount the possibility that some or all of these lots may be aggregated if this represents the most economically advantageous approach to meeting the requirements that will be set out in its Invitation to Tender (ITT).

DfE's priority will be to ensure that the available public funding is used most effectively by ensuring coverage of premises currently getting relatively slow broadband speeds (less than 30 Mbps). However, areas with higher speeds may be targeted, subject to the need to provide a 'step change' in broadband capability (as outlined above). In addition, DfE may seek to target certain NGA white areas to provide broadband capability with speeds well above 100 Mbps.

As noted above, an allocation of funding for the extension of broadband through Project Stratum has been identified. Should further funding become available, within an appropriate timeframe, then it may be committed to this project. Up to £200m could be made available and DfE will confirm any amounts in any forthcoming procurement following this Open Market Review.

6. TIMESCALES

This consultation will be open until 14 January 2019.

Once the consultation is closed and DfE has finalised the intervention areas and the necessary approvals have been sought and agreed, an ITT will be issued in early 2019 via eTenders-ni procurement portal and OJEU, inviting suppliers to bid for the opportunity to deliver extended NGA broadband coverage. The intention is to award a contract during 2019. The related extended deployment plans for broadband infrastructure should begin by 2019.

7. STATE AID PUBLIC CONSULTATION

The EU Guidelines (at paragraph 78) and the 2016 NBS set out the requirements to hold a public consultation in order to validate the intervention area mapping by allowing all interested stakeholders an opportunity to comment on the planned aid measure.

The purpose of this document is to fulfil those requirements by publishing a description of the proposed aid measure, and seeking feedback from all interested stakeholders. The mapping for basic and NGA broadband are shown in the attached maps (**Annex B**).

The attached map of the NGA broadband Intervention Areas relies on the definitions of white, grey and black areas, as set out in the EU Guidelines (and as summarised above). DfE will only target the areas identified as white on the map.

This State aid public consultation and the proposed NGA broadband Intervention Area maps are available to all stakeholders on the DfE website at www.economy-ni.gov.uk. Further hard copies will be made available at Local Authority offices and public libraries across Northern Ireland.

8. RESPONDING TO THIS STATE AID PUBLIC CONSULTATION

DfE is requesting information and supporting evidence in relation to basic and NGA broadband infrastructure within the project area and wishes to hear from all relevant stakeholders (including residents and businesses as well as broadband infrastructure operators), particularly in relation to areas to be targeted as part of the NGA intervention area at **Annex A**.

For the avoidance of doubt, there is no need to respond to this public consultation if you have no comment to make.

For Residents and Businesses

At **Annex C**, lists of postcodes have been provided in white, grey, black or 'under review' classifications. We invite residents and businesses to review these postcodes.

For residents and businesses, where the ability to receive an NGA service is in doubt, information must be provided in response to this State aid public consultation and as a minimum include:

- Your name.
- The address of the property and postcode area that the submission relates.
- Contact landline telephone number (if available).
- Email address (if available).

For Groups and Organisations

If you are replying on behalf of a group or organisation and are not an infrastructure provider, we invite you to review the postcodes list and highlight any that should be reconsidered including:

- The address of the property and postcode area that the submission relates.
- Contact landline telephone number (if available)
- Email address (if available).

We would also ask that you to confirm that these details can be passed onward in compliance with the GDPR regulation and include:

- Your organisation's name (if applicable).
- Your organisation's address (if applicable).
- Your name.
- Position.
- Contact telephone number.
- Email address.

For infrastructure providers

If the response is from an infrastructure provider and you wish to comment on the white, grey and/or black or 'under review' classifications within the attached data (**Annex C**), or on the wholesale products to be offered via the subsidised network, then the submission should also include the specific information set out in Section 9.

For written submissions from infrastructure providers, DfE would be grateful if you would also include the following:

- Your organisation's name (if applicable).
- Your organisation's address (if applicable).
- Your name.
- Position.
- Contact telephone number.
- Email address.

DfE can arrange access to the Response Template (or subset thereof if you are reporting on a specific area) for infrastructure providers.

DfE also requests confirmation from an authorised signatory that the information provided is suitably accurate and up-to-date.

9. INFORMATION REQUESTED FROM INFRASTRUCTURE PROVIDERS

This section specifies the information you are requested to provide in response to this State aid public consultation in relation to the presence of broadband infrastructure.

DfE is requesting information on, and supporting evidence for, any current or planned (within the next 3 years) investment in broadband infrastructure in Northern Ireland, where this may not be already included within the proposed NGA broadband intervention area map attached.

For any current or planned coverage not included within the proposed State aid intervention areas shown on the attached map, DfE is requesting information at premise level, using the template based on that issued by DfE on 19 June 2018 to show existing or planned coverage by your broadband infrastructure investment. By 'covered' (or 'passed'), DfE means that fixed network infrastructure is or will be available to the premises, potentially subject to a final drop connection, or that the premises are able to receive a suitable quality radio signal over the air interface, potentially subject to the installation of a suitable antenna.

Any information provided in response to this State aid public consultation should include, but need not be limited to:

- Detailed maps for NGA broadband showing existing and planned coverage, for at least the next 3 years;
- Details of premises covered or passed where fixed network infrastructure is or will be available to the premises within the next 3 years, potentially subject to a final drop connection, or where the premises are able to

receive a suitable quality radio signal over the air interface, potentially subject to the installation of a suitable antenna;

- A detailed description of the technology solution(s) deployed (or to be deployed) in your broadband infrastructure, demonstrating how they meet the minimum standards as set out in the BDUK NGA Technology Guidelines;
- A description of the services/products currently offered and, separately, those services/products to be offered within the next 3 years;
- Installation, annual/monthly subscription, and additional volume or per-service tariffs for those services/products (identifying whether such tariffs are inclusive or exclusive of VAT);
- Upload and download speeds typically experienced by end-users, and how these may vary by factors such as distance, increased take-up or demand, contention, etc.;
- Appropriate indicators of the quality of services (e.g. contention ratios, bandwidth allocation per user, etc), including any characteristics (e.g. latency, jitter) that are required to support advanced services such as video conferencing or HD video streaming;
- Evidence to substantiate actual or planned coverage claims, including business cases and evidence of available funding to enable plans to be fulfilled; and
- Details and planned timing of roll-out of any future investments, including further investments required to cope with future increases in take-up or demand.

Please supplement the required information above with any supporting evidence as you consider appropriate (e.g. links to public websites).

DfE would also be interested to hear from operators their views as to the types of wholesale access products they would like to see offered on any newly created subsidised NGA network infrastructure. This information may inform the intervention design. Please note that we are not obliged to include these products in the ITT (unless already required under any State aid decision).¹⁰

10. Next Steps

Following any responses received to this State aid public consultation by the closing date of 14 January 2019, DfE plans to publish the final Intervention Area maps shortly after the close of the consultation period.

¹⁰ Operators will still be able to request new forms of access products on the subsidised NGA network infrastructure through the formal general access provisions under the terms of a future State aid Decision.

This is expected to be followed by the launch of the ITT to suppliers to bid for the opportunity to fulfil a new contract to deliver the extended coverage.

Information about the Project Stratum can be found at <https://www.economy-ni.gov.uk/consultations/extending-broadband-across-northern-ireland-project-stratum>

11. WHERE TO SEND YOUR RESPONSES AND DETAILS

Please send your responses **no later than 12 noon on 14 January 2019** to:

Telecoms Branch
Department for the Economy
Netherleigh
Massey Avenue
Belfast
BT4 2JP

or

e-mail: stratum@economy-ni.gov.uk

You can also leave a telephone message on **028 9052 9352**.

The lists of postcodes published on the DfE website will also be available at council offices and public libraries.

Please note that the data you provide in your response will be treated as commercially confidential to your organisation. However, it may be necessary to share/some all of your response data with our professional advisers and/or DCMS/BDUK, Ofcom, the National Competence Centre and the European Commission in the course of seeking State aid approval.

It should also be noted that it is a State aid requirement to use this information to produce State aid maps to define white, grey and black areas for basic and NGA broadband. However, the published maps will show the aggregated White/Grey/Black NGA and Basic Broadband areas, not the data provided on a per-operator basis. The final maps that will be used for procurement purposes will be published shortly after the conclusion of this State aid public consultation and once approved by the National Competence Centre.

If you have any questions about any of the above, please contact the Department for the Economy by email as above.

Annex A
Geographic area



Annex B Basic Broadband Map



Figure 1 - Basic Broadband Coverage

NGA Broadband Map

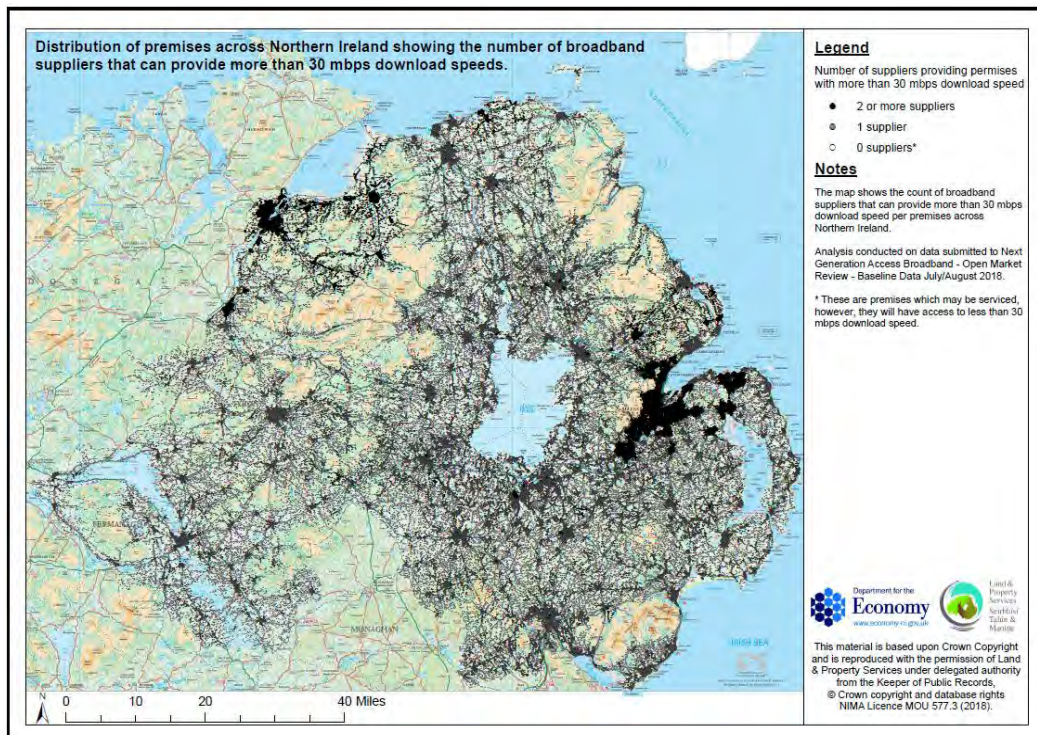


Figure 2 - OMR Broadband Map

A higher resolution version of this map is available on the consultation page at: [Broadband suppliers map](#)

Annex C Postcode Classification

Documents are on the website consultation page as follows:

- [White Postcodes – no qualifying broadband infrastructure](#)
- [Grey Postcodes – only one infrastructure in place](#)
- [Black Postcodes – more than one infrastructure in place](#)
- [Postcodes Under Review](#)