

Broadband, Mobile and the Digital Divide

Purpose

For discussion and direction.

Summary

This paper provides an update on recent national policy developments related to digital connectivity and seeks to confirm with members our proposed focus for lobbying over the next 12 months. A briefing for the visit of Sharon White, Ofcom Chief Executive, to the Board is provided separately.

Recommendation:

That the People and Places board consider and confirm our lobbying positions within the context of national policy and following discussions with Ofcom, as outlined in paragraphs **7, 14 and 27**.

Action:

Officers to take forward as directed by members.

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Broadband, Mobile and the Digital Divide

Background

1. The focus of the next People and Places Board will be on a discussion with Sharon White, Chief Executive of Ofcom. To support members in getting the most from this conversation and to steer our work for the year ahead this paper provides an update on recent digital connectivity policy developments and sets out our proposed lobbying position for consideration by members.
2. A briefing paper for Ofcom's visit, outlining the regulator's remit, future planned activity and potential discussion points for Board discussions, is provided separately.

National policy context

3. The next 12 months will see a range of developments relating to digital connectivity in non-metropolitan areas:
 - 3.1. The council-led Superfast Broadband Programme will approach its last major milestone of reaching 95 per cent of premises passed by the end of 2017 (with a projected final reach of 97 per cent of premises passed by 2020.)
 - 3.2. The Government will formally decide on the design of the broadband USO and potentially commence its roll out before the year is out;
 - 3.3. The deadline for mobile operators to meet Government-imposed voice services and 4G obligations will pass at the end of the year, with potential fines being imposed by Ofcom if they are not met.¹

Broadband

Superfast Broadband Programme

4. Councils have played a significant role in the extension of digital connectivity to households through the Superfast Broadband Programme. Around £740 million of the £1.7 billion invested in the programme has come from local government. Latest Government figures show that over 90 per cent of UK premises were covered by these speeds or faster with the programme passing over 4.1 million premises. Despite this positive national picture, there are still underlying and profound inequalities in coverage and speeds between different areas with only 59 per cent of premises in rural areas receiving superfast speeds, according to Ofcom's latest figures.²

¹ The Government secured coverage obligations from MNOs to guarantee voice and SMS text coverage for 90 per cent of the UK landmass from each provider by 2017. Separately, O2 has a legal obligation to roll out 4G to cover at least 98 per cent of the UK population (when indoors) by 2017 at the latest.

² Ofcom defines superfast speed as 30Mbit/s+ compared to the Government's 24Mbit/s+ definition, meaning rural coverage is slightly higher according to the Government's definition.

5. Many councils are projecting to reach more than the Government's initial national target of 95 per cent coverage of premises passed by December 2017³ some of which will be delivered using extra funding “clawed back” from the original contracts.⁴ The increase in “alt nets” in the market has also given local authorities a wider choice when procuring extensions to contracts provision to the hardest to reach residents.
6. The LGA has worked with member councils to improve the sector’s knowledge of the range of digital infrastructure suppliers now available in the marketplace and maintains a close relationship with a variety of alt-net stakeholders.
7. **In light of the continued poor provision of superfast speeds for rural areas it is proposed that the LGA will continue to push for high quality, high speed connections for rural and non-metropolitan communities.**

Broadband Universal Service Obligation

8. Despite the progress of the Superfast Broadband Programme, there are still 1.4 million premises that currently cannot receive a download speed of 10Mbps with 70 per cent of them in rural areas. This increases to 2.6 million if you include those premises that cannot achieve upload speeds of 1Mbps. It is not yet clear the extent to which new roll-out of superfast broadband will provide the remaining sub-10Mbps premises with faster broadband. Inevitably, a portion will be covered by further commercial and publicly-funded roll-out but some, particularly the most geographically isolated, will not. Ofcom estimates that even taking account of existing public intervention and future commercial roll out plans combined, 600,000 premises will not be able to access speeds of 10Mbps or higher by 2020.
9. After announcing proposals for a broadband Universal Service Obligation and launching its own consultation, Government also commissioned Ofcom to undertake a detailed technical analysis to inform and support the design of the USO. The LGA [submitted evidence](#) to the regulator’s Call for Evidence in June 2016. Ofcom’s [final report](#), presented to Government last month, provided Government with three potential design specifications to implement:
 - 9.1. Scenario 1: a **standard broadband** service, characterised only by a 10Mbps download speed. This is the most basic scenario, only setting a minimum requirement of 10Mbps for download speed and would currently apply to 1.4 million premises in the country. **Members would not see this as acceptable as it fails to guarantee minimum standards for a range of other factors of importance to a good connection, like upload speed.**
 - 9.2. Scenario 2: a **more highly specified standard broadband** service, adding upload speed of 1Mbps as well as a range of other performance indicators.) This would currently apply to 2.6 million premises in the country. **This is the minimum standard the LGA has been lobbying for, although we suggested uploads speeds of 2Mbps would be more suitable for rural businesses.**

³ A few examples: [Surrey County Council](#), [Hampshire County Council](#), [Shropshire County Council](#), [Essex County Council](#)

⁴ Government Press Release: [£440 million broadband boost to benefit more than half a million premises](#)
December 2016

- 9.3. Scenario 3: a **superfast broadband** service, with download speeds of 30Mbps, upload of 6Mbps. This would currently apply to 3.5 million premises across the country. **Whilst this is an ideal scenario and one to be aimed for in the future through a rising minimum USO download speed, it is unlikely to be the Government's preferred option.**

Figure 3.2: The three scenarios for technical specification

	Scenario 1	Scenario 2	Scenario 3
Download speed ³⁸	10Mbit/s	10Mbit/s	30Mbit/s
Upload speed	None defined	1Mbit/s	6Mbit/s
Latency ³⁹	None defined	Medium response time	Fast response time
Contention ratio/ Committed Information Rate ⁴⁰	None defined	50:1	CIR: 10Mbit/s
Data usage cap (monthly) ⁴¹	None defined	100GB	Unlimited

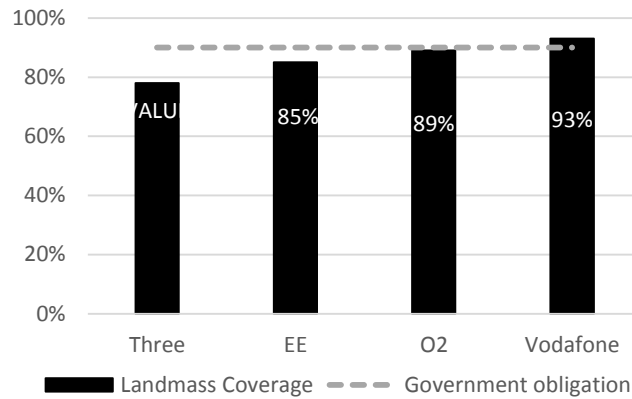
10. Ofcom also revealed in the report that only BT (and KCOM in the City of Hull), have so far expressed interest in the delivering the USO. This is potentially concerning as a nationally delivered programme might not be able to provide bespoke technological solutions to local topography and sparsity of premises issues. The LGA has pushed for the providers of the USO to be locally procured rather than rolled out by a national provider to ensure value for money. However, if smaller providers show little interest, this preference may prove unviable.
11. The LGA has consistently made clear that the USO will only tackle the country's digital divide by providing a minimum download speed, rising in line with national averages, and guaranteeing a consistent performance of other elements which make for a good quality internet connection, such as upload speed.⁵
12. As a minimum, the LGA has made clear its support for a highly specified USO, as highlighted in Ofcom's scenario 2, which would obligate suppliers to provide the consistent performance of a range of indicators that make for a good connection.
13. The LGA has also continued to lobby for the Government to implement a social tariff as part of the USO for those that would face undue hardship paying for installation and monthly contract cost. Encouragingly, Ofcom has now also recommended that Government implements the measure. Future LGA lobbying will now focus on encouraging Government to follow Ofcom's recommendation and implement the social tariff in secondary legislation.
14. **It is proposed that the LGA will continue to lobby Government to implement a highly specified USO (scenario 2) as a minimum, and make clear the sector's aspiration for a USO that will eventually deliver superfast broadband, as outlined in scenario 3.**

Mobile connectivity

⁵ [LGA submission to Ofcom's Call for inputs on the design of the broadband Universal Service Obligation, June 2016](#)

15. Members have made clear that reliable mobile connectivity is increasingly important for residents in non-metropolitan areas. Many face challenges both in terms of the quality of coverage they receive, the lack of choice of mobile network operator (MNO) locally, and the prevalence of not spots.
16. Government and Ofcom expect significant improvements to the mobile coverage in the country by the end of 2017. This will coincide with the deadline of Government-imposed obligations on mobile network providers to guarantee voice and SMS text coverage for 90 per cent of the UK landmass.⁶ The current level of geographic mobile voice call coverage so far achieved by the different operators for the purposes of their agreements is highlighted in Figure 1

Fig 1: Voice coverage (landmass) by mobile network



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Connected Nations Report 2016

17. Separately, after winning an auction of 4G spectrum in 2013, the operator O2 has a legal obligation to roll out 4G to cover at least 98 per cent of the UK population (when indoors) by the end of the year at the latest. Ofcom expects other providers to match this aim.
18. Whilst Ofcom reports that national mobile connectivity is improving, country-wide coverage figures have a tendency to mask the deep disparity between coverage in urban and rural areas. This is highlighted in the figures 2 and 3 below.

⁶ Ofcom uses a lower minimum mobile signal level requirements to judge whether MNOs have met their obligations so 90 per cent coverage obligations would actually equate to 80-85 per cent in today's standards of measuring coverage.

Fig 2: 3G coverage (premises) - urban vs rural

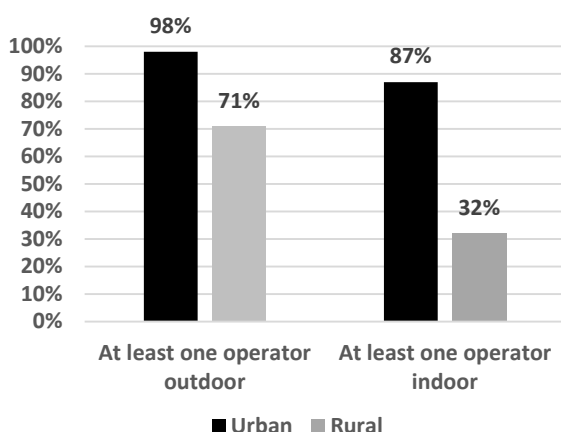
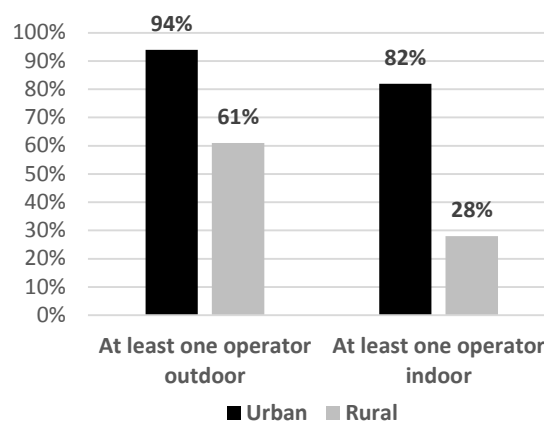


Fig 3: 4G coverage (premises) - urban vs rural



Connected Nations Report 2016 – Interactive Data Dashboard

19. For residents to feel a noticeable difference in the quality of signal, there will need to be significant coverage improvements across all operators in rural areas.
20. Officers have previously outlined member councils' concerns at the representative nature of Ofcom's mobile coverage data. In some instances, councils believe it is not reflective of the realities on the ground in rural areas. This is concerning considering it is this data that will be used to hold MNOs to account on their aforementioned coverage obligations.
21. Councils have also made clear the disparity in resources Ofcom dedicates to verifying rural compared to urban coverage. Over the last year, Ofcom has released [four detailed analyses of city mobile coverage](#). In comparison, they have released [a crowd-sourced app \(android phones only\) to judge how well coverage is provided in rural areas](#). Whilst the latter is welcome, it is highly unlikely it will provide sufficient enough information to hold operators to account.
22. LGA officers recently fed these concerns to the National Infrastructure Commission (NIC) to inform its [Connected Future report](#) on mobile coverage. Subsequently, the NIC echoed our calls on mobile connectivity data recommending that:
 - 22.1. *"...Ofcom, government and mobile operators should report their coverage so that they are genuine and meaningful reflections of the services enjoyed by customers. Metrics should be measurable and based on the reality of service and coverage provided to customers, not based on simulated or predicted performance."*
National Infrastructure Commission – Connected Future, December 2016
23. Members have previously discussed the potential role councils can play in helping catalyse improvements to mobile provision and holding mobile network operators to account on the services they provide to residents. It is clear that there is an increasing recognition of the

importance of local authorities in helping facilitate the role of mobile infrastructure. In its report to Government, the NIC also recommended that councils:

- 23.1. Coordinate local mobile connectivity delivery plans in discussion with mobile network operators and infrastructure owners which would consider the role of local government assets and infrastructure,
 - 23.2. Consider how the deployment of digital infrastructure can be established as a priority in local planning policy.
 - 23.3. Identify a designated individual with lead responsibility for engaging with mobile telecoms infrastructure providers.
 - 23.4. Report annually to the government department with responsibility for digital infrastructure on their progress delivering against these plans.
24. Many councils actively facilitate the deployment of digital infrastructure working with communities to find the best locations for new mobile infrastructure masts. However, there is further work to be done ensuring councils across the country are better placed to have more strategic level conversations with MNOs to fully understand their roll out plans and, where appropriate, help the extension of provision through the use of public infrastructure.
25. The NIC's proposals helpfully highlight the role of councils in this area and, more importantly, would help them to hold mobile operators feet to the fire and focus them on meeting local needs.
26. Disappointingly, the proposals recommend councils must submit a yearly progress update to Government are outdated and inefficient, and LGA officers have made clear to civil servants that this would create a needless burden on already overworked and under-resourced local authorities.
- 27. It is proposed that officers pursue a stronger focus on mobile connectivity, through the Up to Speed campaign, with the aim of supporting local government to play an impactful role in catalysing improvements to mobile provision in rural areas.**

Autumn Statement announcement

28. At 2016 Autumn Statement, the Government announced £1bn of new funding to boost the UK's digital infrastructure. This included:
- 28.1. £400 million in a new Digital Infrastructure Investment Fund to boost commercial finance for emerging fibre broadband providers;
 - 28.2. Funding for further rollout of fibre broadband networks, which in partnership with local authorities across the UK who bid for fibre broadband connections, will prioritise faster connections for businesses and help build a better more productive economy;
 - 28.3. Funding a new programme of fibre and 5G trials.
29. Further details on these programmes will be announced at Budget 2017, alongside the Government's 5G strategy.

30. Whilst the LGA has welcomed the new funding, we have made clear to Government that focussing on rolling out fibre to the premise in mainly urban areas will not serve to tackle the disparity that some rural residents face not being able to receive close to superfast broadband speeds.
31. The LGA have also publicly stated that, although the announcement of significant new investment in 5G technology is welcome, 5G will be no panacea for rural mobile connectivity issues. LGA officers have already met with civil servants to press home the importance that Government maintains focus on challenging mobile providers to extend 4G or even 3G technology across rural areas with the aim of coverage ubiquity across the country.

Next Steps

32. Members to consider and confirm our lobbying positions within the context of national policy and following discussions with Ofcom, as outlined in paragraphs **7, 14 and 27**:
- 32.1. **We will continue to push for high quality, high speed connections for rural and non-metropolitan communities.**
 - 32.2. **We will continue to lobby Government to implement a highly specified USO and make clear the sector's aspiration for a USO that will eventually deliver superfast broadband.**
 - 32.3. **We will pursue a stronger focus on mobile connectivity, through the Up to Speed campaign, with the aim of supporting local government to play an impactful role in catalysing improvements to mobile provision in rural areas.**