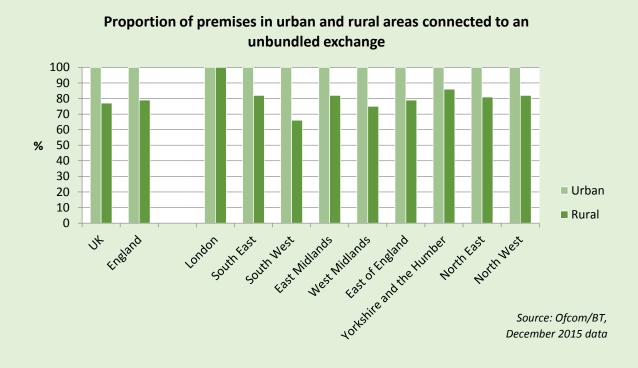
## **Rural Broadband**

In England, 100% of premises are connected to an ADSL-enabled BT exchange (Source: Ofcom/BT, December 2015 data). This is a data communications technology that enables faster data transmission over copper telephone lines over and above that which a conventional voice band modem can provide.

The proportion of premises that are connected to an unbundled local exchange for UK Rural increased from 56% in 2010 to 77% in 2015 (Source: Ofcom/BT, December of each year). These are relatively low proportions of premises in comparison to UK Urban that saw its' proportion of premises connected to unbundled local exchanges rise from 97% to 100% (Source: Ofcom/BT, December of each year). BT own all telephone exchanges and allow other broadband providers to put their technical equipment into unbundled exchanges. The proportion of unbundled exchanges in rural areas is therefore important in allowing competition among providers to improve speeds and bring down costs.

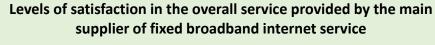


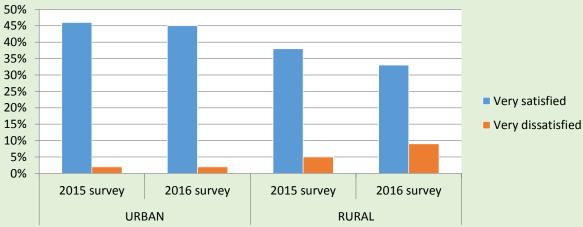
The proportion of premises able to receive broadband services with over 10Mbit/s speeds for UK rural areas lag behind UK urban at 76% in comparison to 98% respectively. The disparity is larger still when comparing the proportion of premises able to receive superfast broadband services with proportions of 93% for UK urban areas and 58% for UK rural areas. This is data sourced from Ofcom/operators as at June 2016.

Using data taken from the Ofcom Technology Tracker survey 2015, 4% of rural respondents found that their households fixed broadband internet was a lot faster than they had expected it to be when they first got it. This was behind that for urban households which stood at 6%. It had increased and equalled the result for urban in the 2016 Ofcom Technology Tracker survey, standing at 5%.

Conversely, the Ofcom Technology Tracker survey 2015 found that 13% of rural households found their fixed broadband internet to be a lot slower than they had expected it to be when they first got it. This was significantly greater than that for urban households which stood at 5%. The position had deteriorated further within the 2016 survey where 16% of rural households found their fixed broadband internet to be a lot slower than they had expected it to be when they first got it, with urban standing at 6%.

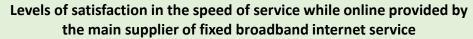
The Ofcom Technology Tracker survey showed poor rural satisfaction levels in comparison to urban when considering the households main supplier of fixed broadband internet service, with levels of dissatisfaction increasing and satisfaction decreasing:

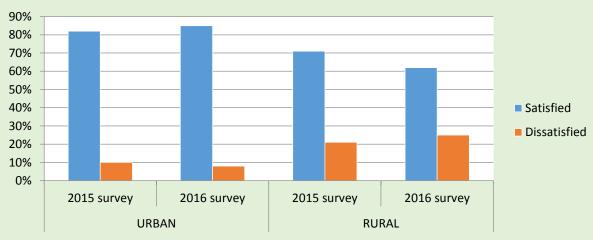




The Ofcom Technology Tracker survey for Half 1 2016 showed that 90% of urban England respondents were either fairly or very satisfied with the overall service and speed of fixed broadband connection. This compared to 69% for respondents from areas of rural England, which itself was a reduction from the previous year's survey result of 12%.

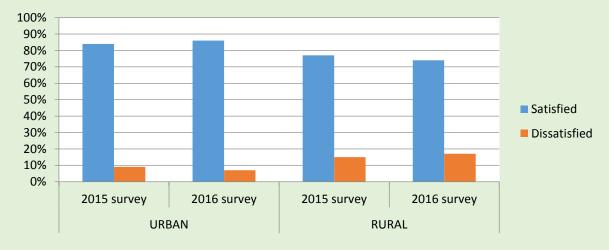
Looking at the speed of service of the fixed broadband internet service (not just the connection) from the main household supplier again shows a stark contrast between rural and urban levels of service:





The same picture emerges when looking at the result from the 2015 and 2016 Ofcom Technology Tracker surveys for the reliability of the fixed broadband service from the main supplier:

## Levels of satisfaction in the reliability of service provided by the main supplier of fixed broadband internet service



The Ofcom Technology Tracker survey for Half 1 2016 showed that 44% of respondents in rural areas of England use the internet to access local council/government websites. This is greater than urban respondents of whom 35% use the internet for this purpose. This is a natural outcome where distance to travel to services is a barrier to access. Likewise, a

greater proportion of rural respondents to the survey than urban respondents use the internet to purchase goods, services and tickets, with 76% doing so compared to 65% respectively. Where distance to access services is a significant barrier as it is in rural areas, it becomes doubly important for broadband access and quality of service to be on a level footing with urban England.