Your response

Question	Your response
Question 1: Please provide a description of your current use of fixed links (or indicate which of the use types in Table 3.1 best describe your use type)	Confidential? – N Transport – Provision of communications links for trams
Question 2: What are the factors driving your choice of fixed links over alternative connectivity solutions, and which factors have the biggest impact on your decisions? Is this likely to change in the next 5 years? If so, what do you expect will change?	Confidential? – N Geographic obstructions causing communications black spots and hence requiring robust and redundant connection Not likely to change in next 5 years
Question 3: Is the current spectrum available for fixed links in the UK suitable and sufficient for your needs? If not, what would you change and why? If you believe changes are required, please give specific examples and reasons along with supporting evidence if available.	Confidential? – N Yes it is suitable & sufficient
Question 4: Is there anything about Ofcom's current framework for authorising fixed links which you consider could be improved?	Confidential? – N I am satisfied with the current framework
 Question 5: How has your use of fixed links changed between 2016 and now? Please provide information on: Reasons for increase or decrease in the number of your links since 2016; Changes in the capacity of your links since 2016, including how you have; delivered this capacity change, e.g., different channel bandwidths, different link technology (please specify), etc. 	Confidential? – N Fixed link frequency has recently been forced to migrate from 1.4GHz to 23GHz due to recasting of the spectrum for 5G purposes
Question 6: How do you expect your usage to change over the next 5-10 years? Please provide information on:	Confidential? – N No change in our use is expected in the next 5 years.

any increase/decrease in the number of links (by band) and bandwidth expected; likely changes in geographic distribution of links; likely changes in distribution of links by frequency band; likely changes in capacity of links and how you expect to deliver this capacity; other changes not covered above Question 7: Which of the developments listed Confidential? - N above are expected to have the biggest Our current design for fixed links has already impact on your use of fixed links? Are there factored in any developments in the next 5 years other developments to be aware of that have not been listed? Please explain the reasons for your answer. Confidential? - N Question 7a: Are you considering using NGSO satellites to provide backhaul for your No network? If so, please provides details of the capacity requirements/expectations and the locations where delivery of this type of backhaul would be likely. Confidential? - N Question 8: If you already use alternative transport options for delivering your services, Not Applicable please: Provide an indication of the proportion of your services delivered over fixed links vs each alternative that you currently use. Is this proportion likely to change over the next 5-10 years? Is so please provide details; Explain how your business rationale for use of fixed links vs alternative connectivity solutions is changing over

If possible, provide examples of your decision-making process for recently

deployed connections

Question 9: Which of the listed technologies are you already using or do you plan to use in the future? For each that you are using/plan to use, please explain:	Confidential? – N Not applicable
 the current extent of your use, whether you expect to expand or shrink your use over the next 5-10 years, and how availability of these capabilities might impact your choice to deploy fixed links vs an alternative. 	
Estimates of numbers or percentage of links deployed with each capability now and in the future would be valuable. We are particularly interested in feedback on future use of BCA.	
Question 9a: If you plan to use BCA would you	Confidential? – N
plan to use this primarily for new links, upgrades to existing links or a mix? What factors affect your decision to deploy (or not deploy) BCA today?	Not Applicable
Please provide whatever detail you can	
Question 10: Do you have a need for W and D bands for fixed links use (or alternative uses)? If so, in what timescale? Please provide further details, including any evidence you have to support your response.	Confidential? – N No
Question 11: Do you expect to apply for new fixed links in the upper 6 GHz band in the future, and if so, in which geographical areas? What are the reasons for choosing this band over other available bands or alternative technologies? Is there a technical reason why you would choose the upper 6 GHz band?	Confidential? – N No
Question 12: Are there other international developments that you are aware of that could affect availability and utility of fixed links in the next 5-10 years?	Confidential? – N No