

**RIIO 2 User Group for National
Grid Electricity Transmission
Challenge Log**

December 2019

Note

This challenge log was established, and began to be populated, at the first meeting of the User Group in July 2018. It contains a list of challenges posed to NGET, together with a record of NGET's responses. It is a detailed log which contains the User Group's ongoing challenge audit trail and is an important, but one, part of the evidence base of the group's work. It was complemented by the intensive, and iterative, process of scrutiny and challenge which took place between July 2018 and December 2019. Previous draft versions of the NGET business plan were submitted to the User Group, Ofgem and the Ofgem Consumer Challenge Group in July and October 2019. The User Group provided particular, and detailed, challenge, and written feedback to NGET on each occasion. As the work of the User Group reached its peak between October and December 2019, the key challenges arose in response to the written feedback provided to NGET in October and these challenges and the NGET response form the basis of the conclusions in the User Group's final report.

Stakeholder engagement

Challenge reference	User Group challenge	NGET Response	Status
1	What is the overall NGET approach to stakeholder engagement.	There was a session at SG1 on 30 th /31 st July to go through NGET approach to stakeholder engagement and the pre-read from this meeting also provided details of our approach including information presented in the SEIS (Stakeholder Engagement Incentive Submission) document. Our approach to stakeholder engagement will also be presented in the Stakeholder Engagement chapter of our Business Plan, including our Stakeholder Engagement Strategy for RIIO-2.	Closed
2 and 3	<p>How has NGET accounted for the perspective of future consumers in its stakeholder engagement approach? I'm especially interested in how climate risk is considered (from the perspective of mitigation, adaptation, avoided future costs, and stranded assets).</p> <p>and</p> <p>How has NGET's approach to (present) stakeholder engagement taken up the latest psychological research into people's values about the energy transition? (the canonical report on this is available from UKERC at (http://www.ukerc.ac.uk/publications/paying-for-energy-transitions.html))</p>	<p>At the SG5 session we presented our consumer strategy including current and future. The User Group members had a discussion about what good would look like in this area and there were no specific examples of good engagement with future consumers that members could advise. Likewise, there have been no specific examples shared by Citizens' Advice. However, we are seeking to use trend and public attitude research e.g. involving underlying public attitudes versus attitudes likely to change; identification of trends, how are consumers going to use what we are offering differently in the future. There are a number of work streams ongoing in this area:</p> <p>Deliberative research - An ongoing work stream to work with consumer research experts, using deliberative research techniques, focus groups and consumer workshops as appropriate. These sessions will explore important and relevant topics in more detail, to provide more in-depth views than the quantitative channels. Specifically, on the topic of 'pay now, pay later' we are scoping a deliberative consumer session to explore pay now versus pay later which picks up who should pay for future costs of the network and takes into consideration impacts on future consumers.</p> <p>Cultural Analysis – We have also undertaken an innovative approach to understanding culture without direct engagement with consumers. This work is being undertaken with Canopy, a cultural insight and innovation consultancy, and seeks to understand broader consumer attitudes and trends, which are particularly useful when looking at the needs of future consumers. This work is assessing two areas - reliability and responsible and sustainable business. In each case the objective is to</p> <ul style="list-style-type: none"> • Identify dominant (current) and emergent (future) codes and narratives in the UK • Map opportunity spaces for National Grid around the most salient and most emergent codes and narratives identified <p>The output from this will form the basis of our update at SG9 in August 2019.</p>	Closed
4	How does NGET set its approach in the context of relevant legal requirements, for example meeting the 4th and 5th carbon budgets?	We welcome the publication of the Committee on Climate Change (CCC) Net Zero Report and the ambitious goals and direction within. We want to play our part in the decarbonisation of Great Britain's energy system and to make sure the transition to a clean energy system is fair and leaves no-one behind. And we want to achieve it all at the lowest possible costs for bill payers. Natural gas has an important role to play in supporting	Closed

Stakeholder engagement

5	Given Nicola Shaw's very helpful comments about needing to move beyond a 'least worst regrets' approach toward something which takes strategic decisions, how does NGET see its business plan supporting the big strategic decisions of the 3Ds?	the transition to low-carbon power, heat, industry and transport. It provides the reliability and flexibility to support growth in renewable generation and it gives Great Britain options to decarbonise commercial vehicles and industry. Perhaps most importantly, gas can also help to decarbonise heat, the biggest source of UK carbon emissions, at the lowest cost and with least disruption to consumers. As per the Committee on Climate Change (CCC) report, we need to see much greater progress in making areas like heat and transport cleaner, with both government and industry stepping up action. Gas can support a fair transition to low-carbon power, heat, industry and transport and play a key role in meeting the GB environmental targets. Further development of this challenge will be linked to emissions compliance challenges (#116-121).	
6	Business plans need to clearly focus on consumer outcomes.	We have worked to ensure consumer focussed outcomes are at the heart of our RIIO 2 business plan. The way in which consumers have been considered in setting the priorities was presented in SG1. The engagement log template has also been updated to include consumer outcomes, consumer value is a core part of our 'golden thread' approach and will also be presented in the draft business plan. Each chapter in the draft business plan lists the three consumer priorities and how they are supported by proposals in our plan.	Close
7	Demonstrate how customer/stakeholder priorities (and how they are delivered) has changed over time.	Similar to challenge 5, this will be described within the external context chapter of the business plan. Over recent years we have seen a step change in how we engage with our stakeholders. This is reflected in the comprehensive programme of engagement to build our RIIO-2 business plan, and us being confident that we have a better understanding than ever before of the priorities of our stakeholders. Please see the stakeholder chapter of our RIIO-1 submission which articulates the key messages from stakeholders at the time of building our RIIO-1 plan (specifically from page 12 "How stakeholders have influenced our March 2012 business plan".	Open
8	NG must evidence stakeholder engagement in line with best principles.	The challenges raised in this log and the actions delivered have driven alignment with the best principles. The list of best principles was included within the engagement log and used to test each topic as presented to the stakeholder group.	Open
9	NGET to articulate overall aims of their overarching stakeholder engagement approach (including benefits and value, timeline for decision making, making better decisions).	This is presented in chapter 6 of our business plan. We also outline our stakeholder engagement strategy for RIIO-2.	Closed
10	Stakeholder engagement is carried out business wide, not just within stakeholder engagement teams.	Our AA1000 reports that we undertake stakeholder engagement in pockets within the organisation. Our customer team have a map to build capability in this area which is a longer-term action. The RIIO-2 engagement is coordinated by a central team with business experts brought in as required. We acknowledge that we continue to be on a journey with regards to fully embedding stakeholder in our business, we expect to continue to make positive improvements in this throughout the remainder of RIIO-1 and into RIIO-2 as we strive to meet our stakeholder ambition.	Closed
15	To demonstrate a golden thread of stakeholder input tracked through the business plan.	We have developed a template which describes how our business plan costs and proposals can be linked back to our engagement activities and insight. Each chapter in the business plan now has an associated 'golden thread'.	Closed

Stakeholder engagement

16	Watch language. NGET's engagement needs to be more open. Start with a blank sheet and based on output, tailor engagement to different stakeholder groups.	We noted the comments at one of the early User Group meetings that we needed to be more open, not make any assumptions in our engagement, and make sure we weren't being biased, leading or over-technical in the language we used. To make sure we were following this, we reviewed our process, but also used Truth and Frontier Economics to provide an expert, external view. Any recommendations from them were then fed in to our engagement process and materials on a topic-by-topic basis.	Closed
17	How is NGET engaging staff and shareholders.	Shareholder engagement is included in chapter 15 of our December plan. Details of employee engagement are included in the appropriate places in chapter 6 and employees are one of our 9 key stakeholder segments. In addition to mentions of employee engagement within the plan, we have used internal webinars, gallery walks and a range of communication channels to inform and consult employees as we've built our plans.	Closed
18	Provide a business plan with a clear focus on end consumer outcomes.	The way in which consumers have been considered in setting the priorities was presented in SG1. All engagement logs and the business plan have been updated to include consumer outcomes.	Closed
128	NGET to engage on the detail of the ODIs with expert stakeholders.	Engagement took taking place in October 2019 and outputs have been included in our December plan update.	Closed
129	NGET to demonstrate their approach to triangulation – including being clear in each outcome area the key tensions, and how trade-offs have been made.	Trade-offs have now been included in the engagement table of each chapter. Details of our decision-making framework (triangulation) are included the December plan, along with examples of key trade-offs from the other chapters.	Closed
130	NGET to demonstrate leadership commitment to engagement.	Details can be found in Chapter 6 of our December plan. There is also a Stakeholder Engagement Charter signed by the board included in the Stakeholder Engagement Strategy	Closed
131	NGET to provide better segmentation of customer and businesses, including demonstrating how their views vary on key issues vary and how going to address.	High level results from our acceptability testing are included in chapter 6 of the December plan, with a full report in annex A6.06. This includes results from business consumers. We have also carried out further research with businesses, including direct customers, and the final reports have been shared with the User Group.	Closed
132	NGET to provide feedback to stakeholders engaged with on how their views have influenced the plan.	A summary communication was emailed to all stakeholders on our distribution list (c.2,000) in mid-October, explaining what changed between our July and October plans. We explained how stakeholder input shaped all of our plans and published the July (draft) and December (final) versions on our website, signposting these to all of our stakeholders via an email newsletter and webinar in mid-December.	Closed
133	NGET to more clearly articulate their approach to considering the needs, and wants of future consumers.	Covered in chapter 6 of the December plan	Closed
134	NGET to develop a RIIO-2 engagement plan - in particular that demonstrates how engagement will help deliver the commitments in the business plan.	Details are included in chapter 6 of the December plan and further detailed in our Stakeholder Engagement Strategy Annex A6.01	Closed
135	NGET to demonstrate how they will deliver on their vision to 'exceed customer expectations'	This requires a definition of expectations (which will vary from customer to customer) and further work with the enduring User Group to establish challenging, measurable targets against which our progress against this vision can be assessed	Closed

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136	NGET to ensure that the 'Golden Threads' are included in the main narrative.	The Golden threads have been brought out more across the December business plan. There is also now a Golden thread summaries Annex NGET ET.01	Closed
112	NGET to develop a stakeholder engagement strategy and demonstrate NGET's plan to exceed customer expectations.	Covered in chapter "Giving Stakeholders and Consumers a voice".	Closed
117	NGET to set out the aspirations of what enduring the Stakeholder Group's role could be and discuss with the Group.	Covered in chapter. This has been referred to in the Chapter "Giving Stakeholders and Consumers a voice".	Closed
120	The Group raised concerns about whether the aspirations around transparency would be delivered in practice.	Covered in chapter. This has been referred to in the Chapter "Giving Stakeholders and Consumers a voice".	Closed

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Challenge Reference	User Group challenge	NGET Response	Status
13	Style, methods and accessibility of the stakeholder engagement activities to be clearly evidenced.	This has now been clearly articulated and detailed in the engagement logs. References have also been included in the December plan where applicable.	Closed
14	The carbon gap between the non climate change act scenarios (steady progression and consumer evolution) isn't quantified- but we should anticipate that government will intervene to ensure the CC act is met. If the TO wishes to invest to meet a non CC Act scenario, it may be expensive to change course to meet the CC Act. NG should quantify this cost so we can assess how this may affect future customers	<p>With the right regulatory framework we will be ready to facilitate the governments climate ambitions. However, we have a licence obligation to facilitate all changes to the energy market (those compliant and non-compliant with the climate change act).</p> <p>The Common Energy Scenario, against which Ofgem has required us to build our baseline plans for the T2 period is not compliant with 2050 net-zero targets. Automatic uncertainty mechanisms, building on the experience in T1, are therefore a critical aspect of our T2 plan to ensure we can facilitate net-zero targets. Provided these mechanisms are put in place for T2, our plan is capable of meeting targets. As a result, we do not currently have plans to calculate the cost / impact of not meeting them.</p>	Closed
19	Ensure each chapter and outcome considers energy scenario / future	<p>The reports submitted to the Stakeholder Group on the 3 priorities to covered in the 16th April 2019 meeting do include this consideration (see accompanying material).</p> <p>More information on how we use energy scenarios and plan to manage uncertainty in RIIO-T2 is available in our consultation document available HERE.</p>	Closed

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20	Need a systematic way to identify key trends/scenarios to test our BPs against	<p>Our business planning team have undertaken analysis that led to our input into the work undertaken through the ENA across all energy networks to consider key trends and produce a “common view of the future”. Ofgem’s Challenge Group have been clear that they wish to see business plan submissions based on this common view.</p> <p>Our ongoing work to calculate Unit Cost Allowances for uncertainty mechanisms will utilise Monte Carlo analysis to test these allowances against thousands of possible future energy outcomes to ensure they are robust. (more information about how these mechanisms work and how Unit Cost Allowances are calculated is available from the briefing note put on huddle and from page 28 and 29 of the accompanying report on our plans for “enabling the transition”)</p>	Closed
21	Plug Stakeholder Engagement Process into NOA process.	<p>Network Options Assessment is a process owned and run by the Electricity System Operator. We have provided this feedback to them.</p> <p>The role of the Network Options Assessment (NOA) process is to assess which network solutions are the most economical and in considering what that process should be, considerable engagement does take place by the NOA committee. For specific projects the Network Owner does the engagement, examples of which we took the User Group through during the webinar on Investment Planning in November 2018. For further information please refer to this link https://www.nationalgrideso.com/insights/network-options-assessment-noa.</p>	Closed
22	More detail on what existing insights have been used (especially on consumer views).	The engagement log has been updated to provide even more details in this area. Whilst consumers generally do not have explicitly formed views on the future role of electricity transmission, their priorities and values can be ascertained and this insight does inform our thinking and direction. There were also a very small number of informed consumers who responded to our online consultation.	Closed
23	Need to identify why we have chosen a certain part of the engagement spectrum when mapping - approach to engagement.	This has been explained to User Group and the engagement Log has been updated	Closed
29	How do we map when engagement / outcome of our engagement translates into an output or bespoke incentive? (e.g. would we say output would have been set at output or target ‘x’ but as a result of feedback received it will now be set at ‘y’?).	During the meeting the User Group were taken through the Spider Diagram Concept depicting the golden thread from the output from stakeholder engagement through to resulting outcomes, costs and impact on consumer bill. The Concept was agreed to in principle subject to application/demonstration to Business plan priorities. This has now been done in the December plan.	Closed
32	Innovation: We talk about innovation to maximise capacity. How do we measure success on that?	The innovations we’ve delivered in the T1 period (e.g. power flow controllers) are included in our T2 baseline plans and unit cost allowance calculations. The TOTEX incentive mechanism, part of the RIIO-T2 framework, will continue to incentive ‘business as usual’ innovation, which will result in lower costs to consumers.	Closed

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33	There is a lot of talk about collaboration. How is this measured? What is the value of this collaboration/ how do you make sense of all the output received from this level of engagement. What is NG's role in this?	<p>Achieving net-zero targets at lowest cost to consumers will require much more extensive collaboration across organisations, both within the electricity sector and beyond (e.g. transport and heat). We have engaged extensively in the building of our plans and have made commitments to continue to do so in the T2 period. There will always be room to go further in this space.</p> <p>More detail on how we have engaged in building our plans is provided in the Chapter, "Giving stakeholders and consumers a stronger voice" and Section 3 of each Chapter in the main business plan narrative as well is in the Engagement Logs for each topic. For energy system of the future specifically these are, A7.01 – Engagement Log (Whole System – non-network companies) and A7-8.01 – Engagement Log (Whole System – DNO& ESO).</p>	Closed
88	October Business Plan Draft - Page 16 in the ongoing transition paper talks about £140m comprising £90m on wayleaves. At £18m per annum, there should be some assessment available of the areas of claim on injurious affection which this money was purported to be. The number of claims is likely to be low but individual claims of high value due to the cost of diverting 400kV assets. It would be helpful to know how much of the NGET network is secured on wayleaves/easements to understand whether the £90m is proportionate to the outstanding risk.	<p>Discussed 24/5/19 The £90m included in the April draft of our business plan is for easements (i.e. not wayleaves).</p> <p>Our overhead line network is largely held on terminable wayleaves (just over 60%) posing a litigation risk which can be avoided by securing the assets voluntarily through the negotiation and acquisition of easements (permanent rights) with landowners for capital payments. The costs allocated in our plan are for the acquisition of easements over the RIIO-2 period and are consistent with the historic cost trend in RIIO-1.</p> <p>More specific data / information is available if required.</p> <p>16/9/19 Pre-read for 17/9/19 meeting Draft Chapters for Connections and Energy System of the Future, ESO Letter(to support discussions on Connections), Uncertainty Mechanisms Annex, Uncertainty Mechanism Webex Slides, Challenge Log, Justification Report on Easements (to support discussion on Connections). All updates in December plan.</p>	Closed
121	NG to demonstrate how stakeholders will be involved to further elaborate on the strategy for anticipatory investment.	<p>We have drawn on existing stakeholder insights in pulling together our proposal for an Anticipatory Investment process in the RIIO-2 period (as opposed to requesting an allowance for specific investments).</p> <p>As well as the challenge and review from the independent Stakeholder Group, we have been undertaken further bilateral engagement with some key stakeholders to evolve our proposals for the final submission of our business plan in December. Session have been held with Citizens Advice, Ofgem and policy makers.</p> <p>We envisage further stakeholder involvement, potentially coordinated by Ofgem, across the transmission and distribution sectors post the submission of our business plan in December to get this important area of policy for meeting net-zero at minimum cost to consumers right.</p>	Closed
122	NG to clearly articulate what they envisage their preparatory/ engineering and RIIO-2 costs may be and explain why	<p>Update provided 21/10/19 We are not requesting any baseline funding for these activities in our RIIO-2 submission. We propose that the Anticipatory Investment process would assess the need, efficient cost and allow funding when required.</p>	Closed

	network consumers should be paying for this.	Network consumers should fund these costs when they arise as part of the assessment process will require companies to demonstrate how consumers benefit from any investment (i.e. the net present value for network consumers of any investment would be positive).	
123	In practice, due to the pace of cost reduction in electric vehicles and offshore wind, anticipatory investment may well be necessary during the RIIO-2 period. NGET to demonstrate how its framework will respond to an earlier need for investment, reflecting the changing needs of consumers.	<p>Update provided 21/10/19 The juxtaposition of the strong incentive Ofgem has put in place for network companies to only put the most certain costs in their baseline submissions (i.e. the business plan incentive that exposes companies to a 10% additional penalty for any costs Ofgem deem as uncertain) and the challenge of meeting net-zero targets require that the regulatory framework is flexible enough to provide funding within the RIIO-2 period when investments that benefit consumers are required.</p> <p>In response to this challenge we have created our vision of a roadmap to net-zero that maps out what is required in this space.</p> <p>The onus is on all stakeholders to come together and ensure the Anticipatory Investment process can deliver the best whole system solutions to net-zero challenges in an agile manner.</p>	Closed
124	In the framework for Anticipatory Investment, NGET to highlight how strategy, purpose, the framework for delivery and timing will be addressed.	<p>Update provided 21/10/19 In response to this challenge we have created our vision of a roadmap to net-zero for our final business plan submission. This comprises of an overarching road-map in the executive summary, supported by greater detail within each of the relevant chapters (including Chapter 7 - Enable the transition).</p>	Closed
125	NG to ensure that proposals reflect what has been requested in Ofgem as per their August '19 letter.	<p>Update provided 21/10/19 This is reflected more explicitly in our December plan -- i.e. within our proposed process. However, we will not be providing the full suite of evidence requested by Ofgem because we are not asking for any funding at this point.</p>	Closed
126	NG to be clear about their leadership role in whole systems	<p>Update provided 21/10/19 This has been reflected in our December plan; see Challenge 124</p>	Closed
127	NG to demonstrate the contestability options with major projects.	<p>Update provided 21/10/19 This is set out in the December business plan.</p>	Closed

Load Related - Connections

Challenge reference	User Group challenge	NGET Response	Status
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34	Customer satisfaction – what’s the reward / penalty and performance to date?	<p>The maximum and minimum financial values are +/-1% of our allowed annual revenue. Ofgem sets cap, baseline and collar scores which translate to our maximum incentive, neutral point and maximum penalty respectively. For 17/18 – CAP 8.6, Baseline 6.9 and collar 5.3.</p> <p>Table 11.3 - Our customer satisfaction scores in the T1 period up to 2018/19</p> <table border="1" data-bbox="721 300 1435 347"> <thead> <tr> <th>Year</th> <th>2013/14</th> <th>2014/15</th> <th>2015/16</th> <th>2016/17</th> <th>2017/18</th> <th>2018/19</th> </tr> </thead> <tbody> <tr> <td>Score</td> <td>7.4</td> <td>7.4</td> <td>7.5</td> <td>7.4</td> <td>7.7</td> <td>7.9</td> </tr> </tbody> </table>	Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	Score	7.4	7.4	7.5	7.4	7.7	7.9	Closed
Year	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19											
Score	7.4	7.4	7.5	7.4	7.7	7.9											
35	Where and if there are any tensions between sources? Too coherent? Subsequent Challenge was raised on Triangulation process. How do you address the risk appreciate?	<p>Updated Group that team ensured they worked collaboratively with customers at the start to define what their requirements. As a result, haven’t yet had an issue with conflicting requirements to change a process.</p> <p>We also provided an update to the Group on triangulation process and how tensions will be dealt with. Section 4 in all the chapters now include a section of tensions exist and what trade-offs were made.</p>	Closed														
91.1	The business plan should set out clear explanations of the uncertainty mechanisms that are proposed with respect to connection uncertainty.	<p>We are protecting consumers by only including the most certain costs in our baseline plan and proposing a suite of uncertainty mechanisms that allocate risk to whomever is best placed to manage it.</p> <p>Our plan is consistent with the minimum values in the Energy Networks Association (ENA)’s Common Energy Scenario and therefore relies on uncertainty mechanisms to deliver for customers and enable net-zero by 2050. Consumers can best manage uncertainty about the route to net zero emissions because the route will reflect changes in their behaviour. We are best placed to manage uncertainty over the costs of achieving the outputs consumers want because we can efficiently control our costs.</p> <p>With the market continuing to rapidly evolve, the ongoing development of whole system solutions, growing system operability requirements and network competition, a more complex uncertainty landscape exists in the RIIO-2 period, requiring an evolution of the RIIO-1 approach. In developing our proposals, we have ensured mechanisms:</p> <ol style="list-style-type: none"> i. change our allowances if customers’ needs change during the RIIO-2 period so that we can invest in the outputs they need, ii. allow whole system solutions to be identified and delivered during the RIIO-2 period, iii. retain the incentive for us to reduce our costs and share the cost savings with consumers. <p>We have worked with external experts to develop an enhanced suite of uncertainty mechanisms, building on the existing RIIO-1 approach of unit cost allowances and the experience of the operation of these mechanisms. To manage uncertainty for this priority, we propose:</p> <ul style="list-style-type: none"> • re-design the generation and demand volume driver to ensure they are in line with the observed changes in our customer base and make the unit cost allowances more cost-reflective; • develop a new volume driver for network investment driven by embedded generation; and • work with Ofgem to improve the uncertainty mechanisms so that they lead to smoother adjustments in our allowances and more stability in our charges to customers. 	Closed														

		<p>The detail of our analysis and proposals to manage energy supply and demand uncertainty is set out in ET.12 Uncertainty Mechanism Annex and accompanying workbooks showing the detail of our development and statistical analysis.</p>	
<p>91.2</p>	<p>What has NGET learnt in terms of speeding up design and procurement?</p>	<p>From a design perspective, we have sought to implement a process that facilitates a fit for purpose design - aligned to customer requirements - for each of our projects, in preference of a one size fits all approach. This includes:</p> <ul style="list-style-type: none"> o Engaging with the market on the basis of a functional specification where appropriate, in preference of a fully developed FEED; o Not only the extent of the design, but also the speed with which we progress our projects through the TP500 development process – fast-tracking projects where possible; o We have sought to complement our internal design capability with specialist contractor resource when required; and o More recently, we have sought to involve the main works contractors earlier in the design process to not only speed up the design process, but to identify opportunities for innovation and design optimisation which will drive programme efficiencies. Early Contractor Involvement is a key contract principle in the development of our contracting strategy for RIIO-2. <p>From a procurement perspective, we seek to ensure that we operate a robust (and OJEU compliant) tender process that is fit for purpose for each project or portfolio of projects. Whilst retaining these key principles, we have sought to simplify our procurement processes where practicable to both reduce the programme but also the cost burden for both our contractors and ourselves. Examples of this include:</p> <ul style="list-style-type: none"> o Establishing a suite of frameworks with pre-agreed terms and conditions to avoid the need for protracted negotiations on each project award; o The award of bundles or portfolios of works off the back of a single procurement event; o Streamlining of our procurement processes to focus questions on only key areas specific to a project – with a strict word limit for responses to reduce evaluation time where appropriate; and o Greater use of contractor interviews during the procurement process which are not only an effective way of obtaining information, but also time effective. <p>Streamlining our tender processes is a key contract principle in the development of our contracting strategy for RIIO-2.</p> <p>Can Grid give a clear commitment to reduce connection time? Can Grid commit to reaching a more aligned risk profile with connecting customers?</p> <p>In response to the follow up questions raised by the User Group- For connection time we are proposing a bespoke ODI for connection dates - The purpose of this ODI is to encourage us to deliver connection earlier to get new generation onto our network clearly bringing forward the benefits of low-carbon generation and more competition in the wholesale electricity market. This ODI help supports the drive towards achieving the UK's</p>	<p>Closed</p>

		<p>target of net zero greenhouse gas emissions by 2050. We are proposing two different ways of setting the target for new and existing customers:</p> <ul style="list-style-type: none"> - New customers: All network companies have built their business plans using the Energy Network Association’s common RIIO-2 scenario report, which we commonly call the common energy scenario. The common energy scenario includes an average delivery time for generation connections of approximately 64 months. We propose that this is the baseline for new customers for this ODI. - Existing customers: we propose that for customers with existing contracts the baseline for this ODI is the date in the contract. <p>For taking more risk with connection customer – In our December business plan we have proposed that we would like to be incentivised to reduce sole use connection costs. For our customers that would like certainty in their connection costs, they can choose the fixed option that currently exists. For those customers who would like reduced connection cost, we are proposing to be incentivised to reduce the connection costs and share the risk. In order to facilitate this proposal, we will need to make some changes to the existing frameworks and work with Ofgem to create a unit cost allowance for the sole enabling elements because this will ensure the incentives uses a fair baseline is set. The incentive will be to deliver the sole enabling works lower than the UCA. We will align the sharing factor based on Ofgem’s TIM as we believe this would be adequate for the risk that we will bear.</p> <p>We would like to move the connection cost element, which are currently part of the excluded services into the main price control and extend the totex incentive mechanism to accommodate this.</p>	
91.3	<p>What lessons have been learnt in project delivery.</p>	<p>The lessons we have learnt project delivery are: -</p> <p>The ability to deliver a project safely to time cost and quality is closely linked to the quality of the development work prior to starting works on site. To ensure that the upfront development work yields the most efficient buildable solution we are undertaking more early contractor involvement (ECI) to ensure that when projects start construction the design work has taken into consideration every aspect of the build. This will reduce any waiting time experienced while a small number of technical details are resolved.</p> <p>During RIIO-1 we have found that the ability to see emerging trends and ensure that potential issues are dealt with before they impact on a project is imperative. To do this we have two key mechanisms in place 1) we ensure that both NGET and its contractors administer the contract correctly and use the mechanisms of early warnings to help ensure that any issues that arise are quickly raised between both parties and resolved. This is done through using contract admin software that give complete transparency on all the contractual issues. 2) we set up a project controls function which looks at the project schedules, costs and risks to ensure that emerging trends are managed for the benefit of the project.</p> <p>Priority specific learnings in Section 2.3 ‘learnings from RIIO-1’ and 5.1 iv) making connections quicker in the RIIO-2 period (chapter 8) and Section 2.4 (chapter 7) ‘Learning from RIIO-1’ and business plan wide learning / initiatives</p>	Closed

		<p>are mention in section 2 learnings from RIIO-1’ of the remaining stakeholder chapters and in section 16 ‘We are ready and able to deliver’.</p>	
<p>91.4</p>	<p>What is NGET doing to drive efficiency?</p>	<p>From a capital expenditure perspective, however, it’s perhaps best to respond to this question in terms of the value levers that we have applied:</p>  <p>1. Forecast Driven Sourcing - brings a more strategic, forward-looking view to contracting, earlier in the investment development process. It seeks to extract best value for the end consumer from the supply market through:</p> <ul style="list-style-type: none"> • Early assessment of supplier market capacity and capability. • Bundling – where possible, we have bundled works by site, region, and/or year to provide larger packages of work in order to provide attractive propositions to our contractors. This has included annual bundles of work in the substation equipment asset category and in the case of Infrastructure Protection, we awarded a 5-year programme of works to two Strategic Partnerships facilitating contractor innovation and programme optimisation. • Effective programme management throughout the investment process. • Identification of the potential for supplier-led innovation through Early Contractor Involvement (ECI). For some of our more complex projects, we have sought to simplify the tender process by adopting a two-stage ECI model. This has involved partially funding the tender submissions of multiple shortlisted contractors in Stage 1 to encourage design innovation, whilst maintaining competition at this stage of the process. Stage 2 then incorporated the detailed design and build of the project following down-selection to a single, successful contractor. <p>2. Lean Asset Design – ensures a continuous challenge and review of our Transmission Processes and Standards to identify leaner approaches to delivering our projects, whilst maintaining safety and appropriate levels of quality. Through the implementation of technical deviations as policy change, we have been able to drive more efficient processes into our projects and extend the life of a selection of our assets to optimise network or system risk against the respective construction or maintenance costs. Building on this, for some of our more recent, complex projects, we have implemented a whole life cost assessment to drive improved availability, reliability and maintenance following project completion and handover to our Operations teams.</p> <p>3. Design to Value – drives value engineering through the optioneering and scheme development processes to ensure an efficient, fit-for-purpose approach on a project specific basis.</p> <ul style="list-style-type: none"> o For relevant projects, this might include a collaborative approach with the supply base to drive innovation. o We have developed and trialled a range of alternative approaches to delivering our projects with a view to reducing delivery programmes. These include time-lapse video trials that monitored and analysed ‘productive’ time on our circuit breaker replacement projects. Following these trials, we were able to reduce the delivery programmes of standard circuit breaker replacements from a typical 8-week delivery programme to 6 weeks. 	<p>Closed</p>

4. Market Supplier Development - we have developed a capable supplier pool at multiple tiers with direct access to all market disciplines to ensure a fit-for-purpose contracting approach by asset type in preference of a 'one size fits all' approach. We have disaggregated our supply base in favour of engaging smaller, agile installation contractors capable of delivering single asset replacement projects of relatively low value across a geographically dispersed footprint.

5. Intelligent Contracting – seeks to ensure a tailored, efficient delivery approach on a project by project basis by utilising our flexible frameworks designed to enable a blend of call-off options from full competitive tendering, 'best for task' and direct allocation to match the delivery and programme requirements of our projects. These frameworks comprise both equipment supply, install only and supply & install options facilitating a flexible approach to meet the requirements of each project drive commercial value.

- We are able to identify the most suitable contractor(s) to deliver specific projects based on prior performance.
- Our preferred contract form is the industry standard NEC3 (New Engineering Contract Option A (lump sum / fixed price) to promote the early resolution of issues on our projects and drive clarity in the accountabilities of both the contractor and client. The frameworks also provide the option of Option C (target cost with performance incentives) and Option E (Cost Reimbursable) contracts however, which may be more appropriate for a project dependent on the scope of works, risk to the project and delivery programme. For our Electricity Transmission business between 2013-18, the contract types applied by value were:
Option A: 34%, comprising 210 projects of typically low value, single asset replacement works.
Option C: 59%, comprising 90 projects of typically medium to high value, new build or refurbishment projects.
Option E: <0.1%, comprising 10 projects of typically low to medium value projects with constrained delivery timescales.

Our frameworks use industry standard Terms & Conditions of contract to remove unnecessary activity or risk premiums being priced into contractor's bids.

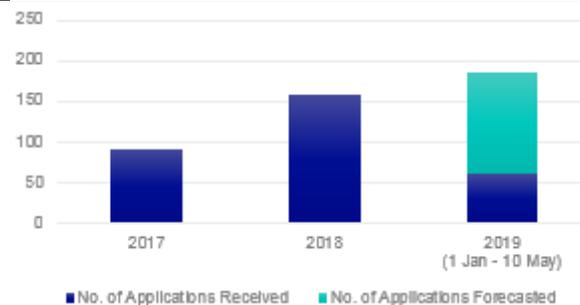
Benchmarking – we have developed our estimating and benchmarking capability to support the contract negotiation process.

Risk Management – we have developed our approach to managing risk by identifying them earlier in the process and allocating them to the party best placed to manage or mitigate each risk. This has enabled us to reduce the level of contingency across our portfolio of projects, whilst protecting ourselves from the potential cost of delay arising from contractor underperformance.

6. Contract Delivery – seeks to prevent value leakage post-contract by:

- Improving supplier performance management and communication through the introduction of comparable contractor scorecard to provide a standardised means of reviewing performance.
- Eliminating unnecessary contract administration.
- Leveraging lessons learned from projects in delivery and applying them to future projects.

		<p>Fundamental to realising value in our construction projects through effectively applying each of the 6 value levers identified above, has been the migration from our reliance on Project Services resource and contingent labour towards developing our own in-house capability in the following areas:</p> <ul style="list-style-type: none"> o Commercial – by developing our commercial and procurement capability, we are able to drive value into the contracting process by implementing fit for purpose award strategies with appropriate contract options. o Estimating – by developing our internal estimating capability, we are able to establish target costs based on historic and current rates improving our capability as an informed client, supporting the contract negotiation process in particular. o Contract Management – by developing our internal contract management capability, we are able to protect the value created in the procurement process throughout the delivery phase. We are able to capture the reasons for ‘value leakage’ and facilitate continuous improvement by implementing lessons learned. o Project Management – by continuing to develop our project management capability, we are better positioned to safely deliver our projects to time, cost and quality whilst meeting customer requirements. <p>More information is available in chapter 14 “Our total cost and how we provide value for money”.</p>	
91.5	How can NGET shorten connection delivery time from 4 years but also provide early certainty to customers that connections will be available at future points in time?	<p>The major driver of lead time to connection is the extent of the work that is required to accommodate the connection safety and economically.</p> <p>We have been developing some tools on the National Grid Electricity Transmission website to provide information to customers on the availability of capacity on the network. This allows generation developers to investigate different sites and understand the level of capacity that is available at each. If there is a site that works for them which has enough spare capacity, then it is likely that their connection can be accommodated in less than 4 years.</p> <p>The link to the generation capacity map is: https://www.nationalgridet.com/get-connected/network-capacity-map</p> <p>We are continually seeking feedback from developers on the tool and what changes we could make such that it becomes even more useful. If you have any comments, then we would be delighted to receive them. (See response to 91.2)</p>	Closed
95	NGET to demonstrate the efficiency of the IT investment in relation to customer base. How will the CRM improve customer culture? What will be the benefit to the customer?	<p>Our customer numbers, their requirements and their expectations are increasing. For example, we have seen a 40% increase in connection applications from 2017 to 2018. This trajectory is forecast to continue into 2019 (see graph).</p>	Closed



In 2017, following the rapid decentralisation and decarbonisation of the electricity network, the ESO/ET separation and resulting challenge of making it easy to connect customers to the network, NGET invested in a CRM platform for basic customer interaction management and in a standalone website and Portal.

In RIIO-2, our CRM system will underpin how we manage our entire customer connection process. We will need to invest to include more parts of the journey within the CRM system to make sure we can offer a simple and flexible end-to-end service to customers. The CRM system will allow us to more efficiently manage the approximately £487m we are forecasting to invest connecting customers to the network in the RIIO-2 period and to provide timely connections. Our research and recent experience has found the CRM system to be the most efficient and effective way to manage customer data and processes. The CRM system will also underpin our website and proposed Customer Portal investments.

Equally, there are areas of our business that interact with customers outside of the connection process, such as asset protection, the Transmission Network Control Centre (TNCC), outages and land management. Each type of customer expects a different service and experience from us. Our investment driver is to bring these interactions into the CRM system so that we can provide a more complete customer experience – this is a result of direct feedback from our customers. CRM is a fundamental enabler for our ambitious customer experience strategy.

Many of our customers are new to the energy industry (e.g. data centres) -- consequentially, they require more support and have higher expectations of service levels. A CRM system crucial to in order to capture and utilise customer data to deliver against their expectations. This is the norm in most industries. We used CRM infrastructure in other areas of National Grid to implement in our electricity transmission business in 2018/19 and have a planned roadmap of enhancements for 2019/20 and 202/21 that will further digitise the Customer connection process.

To fully ensure we can offer an end to end simple, tailored and flexible service to Customers we will need to invest throughout RIIO-2 to continue to iteratively include parts of the journeys within CRM. We have assumed a similar level of change in RIIO-2 to 2018-21 where we have firm project cost delivery information and our proposal has been benchmarked with Gartner.

		<p>Each investment made in RIIO-2 will directly be to either improve the Customer connection journey or the experience of NGET's other Stakeholders (e.g. DNOs, Landowners). These system changes underpin recent NGET organisation changes that provided Customers with dedicated account management and improve customer culture. Additionally, these investments will improve the speed of the application process and allow self-serve via a Portal for the entire Customer journey.</p>	
<p>106</p>	<p>The Stakeholder engagement process has clearly identified that predictability and transparency of charging is a priority for RIIO-2. It is recognised a number of factors contribute to the charging methodology, some of which are not within NGETs control. How are NGET proposing to establish a mechanism to bring more certainty and transparency to the charging methodology including working with OFGEM and others to do this? Any revised methodology for both Connection Charges and TNUoS should be clearly explained in the Business Plan.</p>	<p>Most of the volatility in network charges arises from the methodology used to calculate them, as set out in the Connection and Use of System Code (CUSC). As with other Transmission Owners, NGET is not a party to this code and therefore is unable to propose changes (customers are able to do so through code governance). Our Business Plan does however make proposals to improve stability (and therefore certainty) of charges and the transparency of these, for the elements that we are able to influence.</p> <p>There are two elements to charges for customers:</p> <ol style="list-style-type: none"> 1. Connection charges – these charges relate to assets installed solely for, and only capable of use by, an individual user and are treated as excluded services within the regulatory framework. 2. Transmission Network Use of System (TNUoS) charges – these charges recover the costs of installing and maintaining the electricity transmission system that serves all network users. <p>We recognise that changes to our charges can have an impact on customers. There are several reasons why charges can change, but most of the volatility in network charges arises from the methodology used to calculate them, as set out in the Connection and Use of System Code (CUSC). As with other Transmission Owners, NGET is not a party to this code and therefore is unable to propose changes. We have proposals to improve stability (and therefore certainty) of charges and the transparency of these, for the elements that we can influence.</p> <p>However, we do have ideas on how the price control framework can be improved to reduce the volatility of our revenue and therefore charges.</p> <p>i) <u>Improving how our charges reflect our costs</u> To improve the cost reflectivity of our charges we are looking to improve the design of the existing uncertainty mechanisms, in particular the unit cost allowances that adjust the amount of money we can recover from or must return to our customers to reflect the work we must carry out. We want to make these more reflective of our costs. To achieve this, we are carrying out a detailed review of the triggers of infrastructure costs and are using the results to inform alternative designs for both the generation and demand connection volume drivers. Our commitment to reducing cost for sole enabling connection costs will also support this.</p> <p>ii) <u>Improving the stability of our charges</u> To improve the stability of our charges we are looking at the scope for enhancing the general design and operation of uncertainty mechanisms. Some features of the current design have meant our allowance has been unnecessarily volatile, which has created volatility in our charges to you. We are currently considering whether the changes uncertainty mechanisms make to our allowances should reflect changes in our best forecast of</p>	<p>Closed</p>

		<p>output delivery, as opposed to when output is delivered. This should help smooth the effects of uncertainty mechanism on our charges to customers. We will work with Ofgem to take forward this approach. For further details refer to NGET_ET.12 Uncertainty Mechanisms Annex.</p> <p>iii) <u>Improving the transparency of our connection charges</u></p> <p>We will also be clearer about our connection charges in advance. If our charges are likely to change, we will discuss this with you in advance and explain the reasons behind this. We will enable you to view the latest information on your charges using the new customer portal.</p>	
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Reliability

Challenges Reference	Reliability: User Group challenge	NGET response	Status
38. 39.	<p>Further engagement / activity required to satisfy consumer engagement.</p> <p>A more formulated plan is required on how NGET engages with consumer (linked to challenge 102).</p>	<p>Nov '18 - This is one of NGET's biggest challenges, as it is difficult to articulate how increased reliability directly affects Energy Not Supplied (ENS). The incentive uses the value of lost load, and therefore should directly cover consumer impact in £s.</p> <p>NGET will explore this further during stakeholder engagement, about how they can bring transmission ENS to life for the consumer, when many will not have seen a Transmission related black out.</p> <p>We will continue to engage consumers / consumer groups on reliability. The low impact and interest mapped for consumers relates to transmission reliability specifically, as many will not have seen transmission related outages impacting them. The mapping here allows us to frame and plan for engagement, identifying whether the content should be detailed or simple, and whether we should expect deep or high level insight.</p> <p>Update: Apr '19. We have:</p> <ul style="list-style-type: none"> • Moved consumers as more impacted by reliability on the stakeholder engagement mapping matrix (Figure 6 in this log). • Revised our consumer engagement approach 	Closed
81	<p>NGET to provide a stronger narrative on the strategic context and on RIIO-1 performance and outcomes. What learning and efficiencies have been baked into RIIO-2 and what is the clear forward plan for the next 5 years into RIIO-3. Demonstrate that stakeholder feedback strongly indicates a reliance on electricity. Ensure deliverability is more strongly</p>	<p>We have included within the chapter how our NGET strategy aligns to stakeholder needs and provides the 'golden thread' through to our proposals for reliability.</p> <p>We have clearly indicated the benefits that consumers have received through our performance in RIIO-1, and how much lower the RIIO-2 plan is due to these efficiencies being baked into our RIIO-2 plans.</p> <p>Our stakeholder and consumer engagement indicates a clear reliance on a reliable electricity network. We focussed on this specific topic in our most recent workshop in May, the results of which are summarised in the appendix. We will reflect the changes required following this workshop in our formal business plan submission.</p>	Closed

	demonstrated in the business plan. Ensure the narrative clearly explains what the NARMs actually means for the network rather than a purely technical reflection of the methodology.	The initial plan we shared has changed, we have carried out work which proves that our proposed RIIO-2 plan is deliverable. We have updated the reliability chapter to make the language simpler on NARM, and what it means for consumers.	
82	NGET to provide a more detailed justification/needs/business case(s) the IT investment.	We are working hard to improve the narrative for our closely associated IT spend in Reliability. The chapter has been updated following feedback from the stakeholder group. We feel that this needs more work, and so will continue to improve the wording to better explain the benefits that this investment brings.	Closed
83	On Item 1 (page 25) justification is required for the spend in each category. What is it that these systems are providing that NGET does not already have with existing systems and that they need as an asset owner, and not a system operator, going forward.	We have commissioned Gartner (an IT consultant) to benchmark our IT costs. In the majority of areas our costs were below benchmark, where we were above benchmark, we have reduced our costs. We have now included the benefit associated with risk trading in our chapter	Closed
84	The £60m for separating out the energy management system from the network control system does not show what would be the split with the system operator IT spend. Is there duplication. Again, if NGET only need a network control system, and not the functionality of an energy management system, what is the basis of these costs?	£50m is for IEMS migration onto a TO only solution. ESO have separate funding for their solution and there is no double count. There is value in NGET and ESO having separate solutions that meet their specific needs, but costs are likely to be greater than upgrading a shared solution in the short-term. Options have been developed and costs benchmarked with Coeus. Given Ofgem and stakeholder desires for legal separation of NGET and ESO, we have put forward the option to separate systems. If we do not do this at the point where an asset replacement is due, we will be tied into a shared solution for c 7 years, and the future cost to separate is likely to be greater. The reference to '..... other control centres and recent deliveries' refers to non-IEMS migration costs (i.e. the other £10m), for which we have internal history and Gartner benchmarks.	Closed
85	£48m for an asset management system upgrade seems high given NGET has a system already.	This investment is not just our Ellipse EAM application, it covers a range of asset management applications including; asset registry, work management, work and resource scheduling and mobile devices. The Ellipse EAM cost is £30m, with the balance for field force scheduling and mobile, including devices etc. We have actual costs for the Ellipse upgrade, scheduling and mobile replacement in RIIO-1 and Gartner benchmarks. The justification for the replacement of Ellipse with another product is included in Justification Report NGET_A14.11 Ellipse Replacement.	Closed
86	£37m on a data platform and analytics is also a high figure. What is the basis for the £37m?	Investment of £15m is attributable to the integration and analytics of condition data, with £6m for non-condition data and analytics building on the NGET Data Lake. A further £10m is identified for the development of I solutions for asset management. We have RIIO-1 costs for SAM, together with AMPD experience and costs for our Data-	Closed

		Lake. This investment is one of the key enablers for our Digitalisation Strategy referenced in the updated Ofgem BP Guidance and helps us to deliver on the recommendations from the Energy Data Taskforce.	
87	£13m on an investment risk optimisation tool is also a very high figure given the scale of the asset base. Water companies that used such an approach did not appear to fare too well in the recent assessments. How are NGET satisfying themselves that this an efficient investment both in procurement costs and expected benefit? Risk trading is mentioned on p.13 but no benefit assigned yet	We have selected an 'out of the box' product (Copperleaf C55) through a competitive procurement process to provide our optimisation platform, resulting in the 'product' cost being a small proportion of the overall cost. The most significant costs are associated with the integration and consolidation of other portfolio management tools in the C55 environment and the development of new models, which will deliver further benefits and reduce overall opex costs over the longer-term. We have tested the benefits through two 'proof of concept' initiatives focussing on asset investment optimisation and maintenance optimisation. As part of our requirements development activities prior to procurement, we engaged with a number of external organisations, including water companies, to help us to develop our solution options and to learn from their experience. We have Gas Transmission RIIO-1 and US Gas Distribution cost comparators for Copperleaf C55, together with NGET experience of PPM integration and Gartner benchmarks.	Closed
89	How has NGET have tested the deliverability of the proposed scope of works relating to the £96m of proposed protection systems investment (This is a general question on the totality of the work programme as well as this particular asset group).	<p>We have undertaken significant work to further assess the deliverability of our plans, and can assure the group that our plan is deliverable.</p> <p>We will have a whole section of our business plan submission dedicated to 'our plan is deliverable' which gives assurance that we have the right people, delivery models, supply chain strategy and system access (from the ESO).</p> <p>Our stakeholders have informed us that we shouldn't take any more risk on our protection assets, due to the critical role they play on the reliability of our network. We have therefore had to be innovative in our approach. For P&C, we will further embed the innovative delivery methods used in RIIO-1 across new protection types in RIIO-2. This allows us to deliver the same risk level with less resource and hence lower cost.</p>	Closed
90	Provide further justification for the proposed ENS target and defend the level of stretch and ambition. The discussion on ENS targets suggests that there is a minimum loss position i.e. if an event occurred and it was the minimum scenario, then that should be the target. It brings into question whether this is a suitable target if it is a not possible to go lower.	<p>ENS is an incentive to reduce the likelihood of an energy not supplied event, by rewarding network companies for good performance, and penalising for poor performance. It is a way of ensuring delivery of reliability at levels requested by stakeholders in an efficient manner.</p> <p>The incentive values the loss of demand for consumers and calculates a reward (max of £3.7m) or penalty (max of £48m).</p> <p>Performance in RIIO-1 has been good so far, however a single incident could move the reward into penalty. The target for ENS is based on a long-term average, to ensure the incentive captures rare high impact low probability events. For this reason we intend to keep the methodology for RIIO-2, with the target being tougher due to our recent performance.</p> <p>The ENS drives a variety of processes within NGET:</p> <ul style="list-style-type: none"> • There is a cross business weekly demand at risk web conference to identify actions to reduce ENS. • The ERTS (Early Return To Service) is the earliest the circuit can be returned from outage in an emergency, a 	Closed

External Threats

		<p>quicker ERTS can often be realised to minimise ENS, but this often incurs additional cost.</p> <ul style="list-style-type: none"> • Daily weather reviews. Circuits are recalled to provide additional security if inclement weather is expected. • Weekend/ Bank Holiday working. Work can be moved to lower demand times where ENS is a consideration. • A more expensive off-line build is sometimes delivered to minimise the risk of ENS. 	
140	NGET to clearly demonstrate where there have been any trade-offs.	The stakeholder log and stakeholder section of the chapter (section 3) has been changed to include 'key trade-offs and how engagement influenced our plans' (p86). Our golden threads have also been updated to include key trade-offs	Closed
141	NGET to pull out the key material changes that have been made to the business plan as a result of stakeholder feedback.		
142	NGET to articulate where they are in their Stakeholder Engagement journey.	Subsequent to the September meeting with the User Group a webinar was delivered on the 23rd October to obtain feedback on options for PCDs, scenarios and ENS. Output was shared with the User Group Sponsor.	Closed
143	NGET to better articulate the context from RIIO-1 to RIIO-2 and how asset management approach has changed.	We have included a new 'RIIO-1/RIIO-2 interactions' Annex to articulate the context of what has changed between RIIO-1 and RIIO-2. The plan build annex explains our asset management approach and how this has differed with RIIO-1	Closed
144	NGET to provide better case studies to support granularity and consistency especially in relation to the RDPs.	We will explore this further with the User Group at the next meeting.	Closed
145	NGET to articulate the £80m reduction and clearly demonstrate in the plan how this was achieved taking into consideration benchmarks and savings.	In the 'key trade-offs' section we have included how the 2% reduction (£80m) has been led by stakeholders' challenge on efficient costs, and how our internal challenge on justification and CBA has resulted in some changes being made to our plan. We will share greater granularity at the next meeting.	Closed

External Threats

Challenge reference	User Group challenge	NGET response	Status
27	Differentiate between consumers, communities and citizens.	Have updated engagement log only to use the term 'consumers' to avoid confusion.	Closed
28	Provide clarity on our role in resilience vs that of others /key players.	Detail has now been provided within the engagement log, chapter and Justification Reports to provide key messaging around this.	Closed

Environment and Communities

Challenge Reference	User Group challenges	NGET response	Status
24	Evidence of how we are using existing forums to engage (where consumers are comfortable) plus more evidence of Business as Usual to be captured in Engagement log.	Business as usual engagement for VIP is listed in items 11.4-11.8 in the engagement log. Examples of existing construction engagement are also included in the "existing insight" section of the engagement log. We currently don't record these (for stakeholders) on our internal systems on a consistent basis. This is primarily done through external planning consultations. We expect that as our stakeholder strategy, policies, processes and culture mature - this will become more effective and easier to report on.	Closed
25	Seek to be as quantitative as we can.	All targets (quantitative and non-quantitative) have been listed in table 11.7 of the business plan. As per our environmental methodology, quantitative targets have been focussed on areas we materially impact or areas where stakeholders have specifically asked us to focus.	Closed
26	More clarity on engagement strategy and how we will segment topics and tailor engagement.	Engagement for this part of the plan is complete and clarity has been provided in both the engagement log and the December plan.	Closed
102	National Grid to articulate what it sees as its role, as opposed to other organisations in this space and the rationale for this. To provide evidence as to where and how you will genuinely be a leader. In particular, to consider its role in relation to different environmental and social initiatives.	The strategy has now been articulated in the December plan and outlines a story consistent with the slides presented. Specifically, on leadership we are working on how we can get to a stronger position on SF6 and strengthening our skills and social mobility commitments. In other environmental elements, we will lead in natural capital and capital carbon. We have developed methodologies ahead of other TOs and supported their knowledge ahead of EAP creation. We will continue to be transparent and share tools and data to progress these elements forwards as these are the areas that we know we lead. We are unable to be more explicit about this in our plans due to wanting a continued collaborative relationship with the other TOs. With respect to procurement we believe that we are leading in the area of the real living wage and remain in the minority of FTSE100 companies to champion the behaviours.	Open

<p>103</p>	<p>National Grid to demonstrate how they are delivering value for money on the environment and communities approach – in particular on the visual impact proposals. We’d expect this narrative to include when doing the right thing for the environment saves you money i.e. EVs and low carbon construction should be most cost effective. Also, articulate what you see as the wider benefits to the business of being more environmentally and socially focussed. E.g. in terms of recruitment and retention of staff for example.</p>	<p>We have undertaken a cost benefit analysis for fleet vehicles to see how this activity will benefit consumers and the company through lower costs. Additional detail for low carbon construction and the benefits and specifications within it have been outlined this plan following stakeholder feedback that this is unclear. Benefits for consumers have been included in the plan and we have also undertaken an internal audit on our responsible business activities.</p> <p>For VIP – "The VIP provision (£500m in 2009/10 prices for all three TOs) is large and was set by Ofgem as part of RIIO-1 discussions based on a Willingness-to-Pay study undertaken in 2012. In order for TOs to access this provision, we need to make separate funding submissions to Ofgem. This process is described on page 5 of the approved VIP Policy: https://www.nationalgridet.com/document/120581/download To get the best value for money on these projects, we will continue to run market tenders for the delivery and build. This is in line with our strategy under the RIIO-1 VIP projects. For Dorset, Ofgem agreed that our procurement process was robust and that it allowed for a competitive outcome. Ofgem approved funding of £116m for the Dorset VIP project, which equates to £14.5m per route km (or £7.3m per circuit km). We provide a variety of evidence to support our funding submissions, for example: Benchmarking - We assess our costs using a combination of historical data gained from previous undergrounding projects and independent figures compiled by the IET (Institution of Engineering and Technology). The IET compiled a report in 2012 which found the build costs for undergrounding a 400kV double-circuit route ranged between £9.2m and £22m per km depending on the terrain, length of cable and the rating of the circuits (i.e. size and number of cable cores per phase). The report can be found below: http://www.theiet.org/factfiles/transmission.cfm Historical data -</p> <p>The figures above are representative for double-circuit, high-voltage transmission cables (400kV). For lower voltages, we would expect the ‘per km’ costs to be lower. A recent example is from SHE-T who was recently given approval from Ofgem to underground 14.1km of primarily 132kV overhead line. The approved cost was £31.9m, which equates to £2.26m per route km (this is a mix of single and double circuit). The User Group suggests that our costs are “very high relative to those we are aware of”. We would expect Distribution Network Operators (DNOs) - who also have equivalent visual impact provisions in their regulatory frameworks - to have even lower costs per km as their voltages and ratings are lower again. “High Voltage” for a DNO is defined by Ofgem as being less than 22kV. According to Ofgem, in 2017/18 the DNOs installed 41km of underground cables costing £6.5m. This equals £0.16m per km and, although there is probably a mixture of voltages, a proportion will be removing circuits previously carried on 11kV wood poles. https://www.ofgem.gov.uk/data-portal/undergrounding-overhead-lines-electricity-distribution-riio-ed1 "</p>	<p>Closed</p>
<p>104</p>	<p>NG to provide more detail on its optioneering and decision making – in particular to articulate what options were considered, which were discounted and the rationale for this. We would expect this to be supported in part by customer</p>	<p>We have undertaken a benchmarking exercise for our environmental activities and are currently undertaking this for procurement as well. The options we have pursued are based on our core expertise and where we can have the most material impact. Innovation is referenced in the December plan. Options have been articulated within environmental methodology - annex A11.05. Fleet options have been articulated in annex A11.10. SF6 options articulated in annex A11.09</p>	<p>Closed</p>

	and stakeholder insight, for you to clearly articulate what benchmarks you've used and also what innovation was considered from both RIIO-1 and beyond		
105	Much stronger evidence base is needed around performance commitments, any proposed incentives and uncertainty mechanisms. Please link this to the outputs of the Common Scenario work. In addition, and as part of this, NGET to carry out further engagement with its customers and stakeholders on its proposed environmental and community performance commitments – in particular to get views on whether they are the right areas, suitably ambitious, justified. Also to ensure you understand what customers and stakeholders think you exceeding their expectations looks like.	Expert evidence for environmental elements have been included in the environmental engagement log. We have been able to speak to one key expert per commitment topic. E.g. MIROG for waste and resources, SBTI for carbon targets.	Closed
107	Consult with expert stakeholders and individuals on the proposed measures for the outputs selected, targets and incentives. In particular, to understand their expert views on whether it is the right measure to deliver the outcome, and how stretching or ambitious they think the proposed target is. In addition to, where applicable benchmark against key stated goals e.g. how do NG's targets relate to CCC and	Engagement with expert stakeholders and individuals on the proposed measures for the outputs selected, targets and incentives has been done and fully detailed in the engagement log. References where applicable have also been made in Chapter 11 of the December plan.	Closed

	Environment Agency targets among others.		
109	Provide more detail on how you will ensure appropriate governance and leadership accountability in this area. In particular linking pay directly to performance/bonuses.	Our performance reward structure changes according to the annual priorities. Given our corporate focus on the environment and fairness, this will be reflected in the performance structure. We will continue to work so that this evolves and becomes stronger and more effective every year. The text in the transparency chapter has been updated to reflect this in the December submission.	
43	Consumer engagement – need to do deliberative engagement, broad enough scope (location, etc.).	Our cultural analysis research approached the topic of responsible and sustainable business with an open scope and therefore we were able to see what the latest thinking was for responsible business (see 'RESEARCH DATA SOURCES TABLE' in the engagement log). We have also undertaken deliberative engagement on the communities topic specifically exploring supporting disadvantaged urban communities (engagement ref# 11.18 in the log). Also our first two environmental workshops asked questions about what topics we should focus on. Finally, the total societal impact work polled a nationally representative sample of consumers (3000) on the topic of our 'what our societal focus should be'. This is detailed in the engagement log reference # 11.14.	Open
44	Hard to reach stakeholders – how are they represented? <i>See link</i>	<p>https://www.nationalgridet.com/sites/et/files/documents/Acceptability%20Testing%20report.pdf</p> <p>Our recent acceptability testing report for the RIIO-1 projects describes how we approached getting a response from hard-to-reach billpayers.</p> <p>https://www.nationalgridet.com/sites/et/files/documents/Acceptability%20Testing%20report.pdf</p> <p>In summary, discussion groups were supplemented with nine in-depth interviews with vulnerable or hard-to-reach bill-payers. All participants were incentivised £40 for the involvement, with each interview taking up to an hour. The participants were recruited to meet one of the following criteria: be on a low income (social grade E); be 'power reliant' (have a medical condition or disability that means they rely on energy); have English as a second language.</p> <p>The majority of people participated in the quantitative survey on-line, but this was supplemented with an in-home survey to ensure coverage within the sample of vulnerable or hard-to-reach bill-payers. The in-home survey therefore targeted individuals who were older, lower SEG, or without access to the internet at home.</p> <p>The results showed is a clear correlation with acceptance of the VIP project and participants' annual income as well as how affordable they think their electricity bill is. Unsurprisingly, participants at the lowest end of the income and affordability spectrums, (namely those who earn under £5,200 per year and who said their bills are not at all affordable), are the most likely to find the VIP project unacceptable. Apart from this most vulnerable group, the majority of participants in all other income brackets and affordability classifications found the VIP project to be acceptable or very acceptable. Even in the lowest income band, a higher proportion find the project acceptable (33%) than unacceptable (26%).</p>	Open

		<p>Figure 15. Acceptability of VIP project by annual income and perceived affordability of electricity bill</p> <p>Annual income</p> <table border="1"> <thead> <tr> <th>Annual income</th> <th>Acceptable (%)</th> <th>Unacceptable (%)</th> </tr> </thead> <tbody> <tr> <td>Under £5,200</td> <td>33</td> <td>26</td> </tr> <tr> <td>£5,201-£15,600</td> <td>61</td> <td>16</td> </tr> <tr> <td>£15,601-£26,000</td> <td>70</td> <td>15</td> </tr> <tr> <td>£26,001-£41,600</td> <td>74</td> <td>10</td> </tr> <tr> <td>£41,601-£62,400</td> <td>74</td> <td>12</td> </tr> <tr> <td>£62,401-£83,200</td> <td>83</td> <td>13</td> </tr> <tr> <td>£83,201+</td> <td>69</td> <td>21</td> </tr> </tbody> </table> <p>My electricity bill is...</p> <table border="1"> <thead> <tr> <th>My electricity bill is...</th> <th>Acceptable (%)</th> <th>Unacceptable (%)</th> </tr> </thead> <tbody> <tr> <td>Not at all affordable</td> <td>42</td> <td>31</td> </tr> <tr> <td>Not very affordable</td> <td>57</td> <td>20</td> </tr> <tr> <td>Affordable</td> <td>67</td> <td>14</td> </tr> <tr> <td>Easily affordable</td> <td>82</td> <td>9</td> </tr> </tbody> </table> <p>Legend: ■ Acceptable ■ Unacceptable</p> <p>The report also found that National Parks and AONBs are widely used, with 26% of total respondents saying that they visited either once a month or more frequently. A further 43% visited at least once a year, while 27% hardly ever or 7% never visit these places. 67% of those who earn £5,200 a year or less have visited AONBs or National Parks (rising to 96% of people earning more than £15,600).</p> <p>This reflects recent Government statistics on the use of National Parks, with the Peak District recording 13.2 million visitors a year and Snowdonia 4.7 million a year (compared to residential populations of 38,000 and 26,000 respectively). The estimated annual economic impact of visitors eating, shopping and sometimes staying in these two Parks alone was over £1bn. For comparison, the most visited tourist attraction in the UK is the Tate Modern, with just under 5.9 million visitors in 2018.</p>	Annual income	Acceptable (%)	Unacceptable (%)	Under £5,200	33	26	£5,201-£15,600	61	16	£15,601-£26,000	70	15	£26,001-£41,600	74	10	£41,601-£62,400	74	12	£62,401-£83,200	83	13	£83,201+	69	21	My electricity bill is...	Acceptable (%)	Unacceptable (%)	Not at all affordable	42	31	Not very affordable	57	20	Affordable	67	14	Easily affordable	82	9	
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45	<p>Measuring impact – how do we do it (including where other assets nearby) - <i>See link - First link is a summary of the full document (2nd link)</i></p>	<p>https://www.nationalgridet.com/sites/et/files/documents/37294-Landscape%20and%20Visual%20Assessment%20Methodology.pdf</p> <p>https://www.nationalgridet.com/sites/et/files/documents/37291-Visual%20Impact%20Provision%20Technical%20Report.pdf</p>	Closed																																							
108	<p>Regarding delivering value for money on the Visual Impact Proposals, to articulate how innovation is going to deliver cost savings in this area including undergrounding - both learning</p>	<p>A summary of the innovations below has been added to the narrative, the majority of which offer future opportunity for cost reductions.</p> <p>Gas Insulated Line: We have been working to reduce undergrounding costs through a joint innovation project with Siemens. This is defined under the Public Procurement Directive to research and trial Gas Insulated Line innovative technology. The goal is to reduce the whole-life cost and environmental impact of underground transmission for</p>	Closed																																							

	<p>from historic innovation and innovation going forward.</p>	<p>consumers. The ultimate aim is for this technology to be a cheaper alternative to underground cables, which will help to reduce costs through increased market competition.</p> <p>The option to use GIL has been explored on several VIP projects, with the most recent being at Peak East. This is currently out for a market tender and so the technology has not yet been chosen.</p> <p>Development of GIL will continue until the end of RIIO-1 with the ambition to continue to drive the cost of high-capacity underground transmission down and develop new low global-warming potential gases, with a GWP of less than 10, to replace SF6.</p> <p>Liquid soil When undergrounding, the soil must be excavated to lay the cable and then reinstated (backfill). Liquid soil is an innovative backfill, which has low thermal resistivity properties, meaning it can conduct heat away from a cable better than standard backfill. By removing heat more effectively, you can run higher ratings on a cable.</p> <p>This is currently undergoing tests at Cardiff University, with the expectation that we can use this in a variety of environments in the future.</p>	
<p>111</p>	<p>NG to justify its proposed allowance for electric vehicles. Last time we looked at environment, you agreed you were unlikely to need extra money for EVs, but now you need £18m for a 3-4 year payback period. We'd like to understand why you suggest you get an allowance for this but not for petrol/diesel, if you keep EVs beyond 3-4 years and therefore see lower costs in future periods. This may be symptomatic of a bigger story you might want to tell about how consumers support your investment, and then see lower costs in subsequent price control periods - or it may be that you don't need the £18m</p>	<p>Justification on Fleet provided in Annex A11.10 EV Fleet</p>	<p>Closed</p>

	<p>allowance. We hope this will be answered by your future CBA in this area.</p>		
<p>40</p>	<p>What is Electricity Transmission’s overall strategy for communities and engaging with communities? What is the Board’s view? How does Electricity Transmission decide on the particular community activities it carries out rather than other ones?</p>	<p>Our approach to communities fits with our corporate vision of: “we will exceed the expectations of our customers, shareholders and communities today and make possible the energy systems of tomorrow.”</p> <p>We are part way through a 12-month review of our approach to Corporate Social Responsibility (CSR). Our review is looking at the concept of Total Societal Impact (TSI) and rethinking the role of our business in society. For our CSR work we are currently focussing on three priority areas, these are:</p> <ul style="list-style-type: none"> • social mobility – youth transition to work; • promoting environmental sustainability; and • economic development. <p>These three areas are guiding our approach to communities ahead of our detailed review that will conclude later this year.</p> <p>Our review is also looking at how we can bring together all the activities we carry out for society and articulate them better to the public. Our key project areas are:</p> <ul style="list-style-type: none"> • Campaigning, including storytelling, use of film and other technology; • External digital and social channels; • External stakeholder management; and • Crisis management. <p>We launched a pilot of Grid for Good in the USA in December 2018 and are launching it in the UK in January 2019 for six weeks. ‘Grid for Good’ will focus on social mobility in our local communities by creating a network that connect disadvantaged people to the services they need to encourage, motivate and ultimately improve the quality of their lives. We want to learn from the pilot as part of our 12-month review. The outcome of the review will help us shape our CSR activities in terms of employee volunteering and charitable giving.</p> <p>The 12-month review period matches the period we have left to finalise our business plan for Ofgem in December 2019. Our review of our approach to CSR and TSI will involve extensive engagement with our stakeholders. For further detail on how this work has developed please see the environment engagement log.</p> <p>Funding</p> <p>All expenditure originates either from consumers or shareholders’ funds. In 2017-18, of the £66m of expenditure on communities, the large majority was from the Warm Homes Fund. This was funded by shareholders from the sale of our former gas distribution business Cadent. Our volunteering work is carried out by our staff who are paid for by consumers. However, some of the volunteering represents extra hours our staff would not otherwise have worked and that proportion will not result in more cost to consumers. Our work to engage with communities around our large construction projects is funded from the project budgets. We anticipate that this will reduce costs due to the reduced time to obtain planning permission when community funding is agreed upfront.</p> <p>Deliverables, reporting and incentives for the RIIO-2 period</p>	<p>Closed</p>

		<p>As mentioned in our response to question 1 above, we have started a 12-month review of our approach to CSR. We will be involving our stakeholders in this review. This engagement will help define our approach and deliverables for the RIIO-2 period. We will define some outputs in relation to communities. In our January consultation, we are asking stakeholders for their views on our ideas to make our reporting more transparent in the RIIO-2 period and to keep our User Group going to challenge us on our performance and our reporting. This will give us a strong reputational incentive to deliver on our outputs. We are also considering whether we should be incentivised through penalties, and in some cases rewards, for under or out-performance of our outputs. We are currently consulting on potential social and environmental outputs for the RIIO-2 period.</p> <p>As mentioned in our response to question 1 above, we have started a 12-month review of our approach to CSR, involving extensive engagement with our stakeholders. We have completed several benchmarking activities and our CSR activity scores highly against other FTSE100 companies in most areas. Our plan will seek to push the organisation to the next level to ensure that we remain best in class for the next regulatory period. Some detailed commitments will remain internal rather than external.</p>	
41	<p>How are Electricity Transmission's community activities funded? What price control deliverables will Electricity Transmission commit to on communities in the RIIO-2 period? How will Electricity Transmission report on delivery? How will Electricity Transmission be incentivised to deliver on its price control deliverables?</p>	<p><u>Funding</u></p> <p>All expenditure originates either from consumers or shareholders' funds. In 2017-18, of the £66m of expenditure on communities, the large majority was from the Warm Homes Fund. This was funded by shareholders from the sale of our former gas distribution business Cadent. Our volunteering work is carried out by our staff who are paid for by consumers. However, some of the volunteering represents extra hours our staff would not otherwise have worked and that proportion will not result in more cost to consumers. Our work to engage with communities around our large construction projects is funded from the project budgets. We anticipate that this will reduce costs due to the reduced time to obtain planning permission when community funding is agreed upfront.</p> <p><u>Deliverables, reporting and incentives for the RIIO-2 period</u></p> <p>As mentioned in our response to question 1 above, we have started a 12-month review of our approach to CSR. We will be involving our stakeholders in this review. This engagement will help define our approach and deliverables for the RIIO-2 period. We will define some outputs in relation to communities. In our January consultation, we are asking stakeholders for their views on our ideas to make our reporting more transparent in the RIIO-2 period and to keep our User Group going to challenge us on our performance and our reporting. This will give us a strong reputational incentive to deliver on our outputs. We are also considering whether we should be incentivised through penalties, and in some cases rewards, for under or out-performance of our outputs. We are currently consulting on potential social and environmental outputs for the RIIO-2 period.</p>	Closed
42	<p>How do Electricity Transmission's community activities compare with other large organisations, such as FTSE 100 companies? How could Electricity Transmission be an exemplar in community activities and community</p>	<p>We have started a 12-month review of our approach to CSR, involving extensive engagement with our stakeholders. We have completed several benchmarking activities and our CSR activity scores highly against other FTSE100 companies in most areas. Our plan will seek to push the organisation to the next level to ensure that we remain best in class for the next regulatory period. Some detailed commitments will remain internal rather than external.</p>	Open

	engagement? What would Electricity Transmission hope to achieve by the end of the RIIO-2 regulatory period?	We have a significant package of commitments on the social side and in the environmental space. We have worked hard this year to understand what our stakeholders (consumers, investors, customers and employees) want from our business with respect to CSR.	
101	NG to more clearly articulate its overarching vision and strategy on the Environment and Communities and how this fits with NGET overarching aims alongside the wider context. In particular, how will you exceed customer and stakeholder expectations and embed sustainability and community within NG?	The community strategy has been articulated in chapter 11 which links to our stakeholder, community and amenity policy. We are working towards having a dedicated community policy in place before 2021 which will sit alongside our environmental policy and underneath our stakeholder, community and amenity policy.	Open

Innovation

Challenges Reference	User Group challenge	NGET response	Status
36	ET to provide plan for the next phase of engagement.	Information on next phase of engagement was provided in SG6.	Closed
37	The nature of the engagement should inform how the business plan is developed	Section 3 (What our stakeholders are telling us) describes how we have used stakeholder engagement to inform our business plans, including trade-offs and how the User Group has influenced our plans.	Closed
77	How do NGET intend to reach stakeholders beyond their natural borders?	In our Business as Usual Commitments (p139) we have included commitments of how we will improve collaboration and attract 3rd parties.	Closed
78	Out of the Box appear to be a seem to have developed a PR and Communications plan not an engagement plan. Can NGET clarify how their role fits with the wider engagement plan?	Out of the box is not being used in our plans.	Closed
79	It appears that the Innovation Team are undertaking consumer engagement. The Panel would welcome clarity as to its purpose.	Clarity has been provided through feedback on the 10th May. Consumer engagement is carried out in a coordinated manner through the NGET Stakeholder Team, and not by the Innovation Team.	Closed

52	How does innovation within the regulated business fit with the wider vision and innovation activity of the National Grid Group?	We have strengthened our chapter (p135) to explain the role of NGET Partners, and how this fits into the wider group. P133 includes how the NGET Strategy feeds into our innovation proposals. Further work is being carried out for December to articulate the Innovation Strategy and how this links to the vision and detailed innovation proposals.	Closed
56	How does the innovation vision fit with NG Group’s wider vision and ultimately to the ambition of the business in the light of the Energy Systems Transition?		
146	NGET board to articulate their ambition and road map on both innovation and engagement.	This has been done and the Board have signed an innovation charter (Annex A12.04) which articulates their ambition.	Closed
147	NGET to be clear on how the change in culture in RIIO-2 will be measured. NGET to demonstrate how culture change would be made tangible and how it would filter through to middle management and below.	We have committed to measuring culture change using the IDEO cultural survey in our December plan.	Closed
148	NGET to articulate and provide clarity on what they are aiming to achieve, in each of the 3 areas (i.e. delivering cheaper energy, delivering cleaner energy and delivering future energy), with whom and how it would deliver what it set out to achieve.	This has been made clear in our December plan under 'NIA Proposals'.	Closed
58	How successful are National Grid at moving innovation into business as usual across the portfolio? And what have been the timescale for achieving this across the different projects?	We created a RIIO-1 Performance Annex, which broke down our RIIO-1 innovation spend into categories, and explains how we have turned this into consumer value within the RIIO-1 period.	Closed
63	How are NGET planning to embed innovation into the fabric of the business through RIIO-2?	We have made changes to our entire business plan, explaining Innovation clearly in each chapter. Feedback from the User Group is that this is now much more apparent.	Closed
53	How does the regulated business and ultimately energy customers and consumers, benefit from investment in innovation within the wider National Grid Group?	We have included an explanation within the chapter of how NGET partners fit into the wider group.	Closed

57	What has National Grid considered in relation to the development of an innovative culture? What is the perceived value and benefits of innovation and how this links to value to customers?	We have strengthened our chapter to include more 'humility' around our innovation culture, and commitments around our cultural improvement in our December plans. We also now have a signed Board innovation charter.	Closed
73	NGET are asked to identify the value the NGET customers and consumers have received, as a result of innovation going into Business as Usual in RIIO-1.	This has been made clear in our RIIO-1 Annex.	Closed
74	What are the areas or key challenges that NGET intend to invest in RIIO-2 that will deliver value to the customer and consumer in RIIO-3?	Our NIA proposals deliver savings beyond RIIO-2. Savings which deliver benefits within the period are included within our Business as Usual areas.	Closed
64	How does National Grid systematically determine when to collaborate with other networks the ESO, which will increase value for money to the customer/consumer?	Although our external collaboration is good, we recognise that it could be better, and make commitments in our chapter including specific actions we will carry out.	Closed
65	What % of projects in the current portfolio are collaborative with other network businesses?	NGET Innovation RIIO-1 Overview Paper 0519 & Innovation Annex – RIIO-1 Performance to respond to challenges 52-80.	Closed
67	How do the GTO and ETO collaborate in innovation to reduce costs and provide greater value for money? E.g., communicating in terms of best practice, what are the synergies between the businesses e.g., culture and business capability.	NGET Innovation RIIO-1 Overview Paper 0519 & Innovation Annex – RIIO-1 Performance to respond to challenges 52-80.	Closed
150	NGET to ensure that there is no duplication to what is being proposed for the Deeside facility and what others are doing.	Our Deeside facility in RIIO-2 is creating the provision for innovation to deliver benefits in future periods. This is the only facility of its kind in Europe and therefore is not duplicated.	Closed
151	NGET to ensure that the Deeside facility is accessible to different industry segments or the range of industry stakeholders	We commit within our Business Plan to making this facility available to all organisations.	Closed
75	What are the success factors for the Deeside Centre? How will the energy customer and consumer benefit from this investment?	NGET Innovation RIIO-1 Overview Paper 0519 & Innovation Annex – RIIO-1 Performance to respond to challenges 52-80.	closed

55	How does the strategy link to the consumer outcomes? NGET are asked to provide transparency around the golden thread from activity through to consumer outcomes.	The golden thread has been created and shared with the stakeholder group.	Closed
76	How has the stakeholder engagement feedback informed the strategic priorities in the RIIO-2 innovation strategy?		Closed
54	What happened historically in RIIO-1, successes and failures. How is this being built upon in RIIO-2?	The RIIO-1 Annex includes our RIIO-1 performance. We have also improved the section on p135 'Learning for the RIIO-2 period'.	Closed
71	How is innovation to be baked into the business plan?	This is covered in the Innovation Annex 'RIIO-1 Performance'.	Closed
72	NGET are asked to illustrate to the Panel the benefits derived within RIIO-1 from the innovation portfolio and how these are to be built upon in RIIO-2 including the projects that have ceased – which is wholly legitimate in innovation.	This is covered in the Innovation Annex 'RIIO-1 Performance'.	Closed
68	What are the innovative initiatives undertaken in NGET USA business which have been successful and what can be adopted in the UK?	We have summarised our involvement with NG Partners on page 135 of our Business Plan	Closed
62	Are National Grid benchmarking themselves against other companies in terms of best practice and learning from others?	We have included a reference to benchmark on p135 'Comparison to External Benchmarks' in our Business Plan.	Closed
66	How does this compare with other transmission and distribution businesses and the ESO?	We have included a reference to benchmark on p135 'Comparison to External Benchmarks' in our BP. We have not found a direct way to compare our innovation delivery against other utilities. It is too early in the lifetime of the ESO to be able to do this.	Closed
69	NGET are asked to provide transparency and visibility in relation to how innovation projects, both large and small are sanctioned and the criteria used by the sanctioning committee to demonstrate how projects are linked to the business priorities and key challenges including the Energy System Transition challenge.	We have a defined sanctioning process in the December submission & discussed with sponsor prior to that.	Closed

60	What proportion of innovation is large scale and what is deemed smaller innovation and business improvement?	NGET Innovation RIIO-1 Overview Paper 0519 & Innovation Annex – RIIO-1 Performance to respond to challenges 52-80.	Closed
61	What percentage of the portfolio is asset focussed and what is the percentage of other innovation which supports business and cultural change?	NGET Innovation RIIO-1 Overview Paper 0519 & Innovation Annex – RIIO-1 Performance to respond to challenges 52-80.	Closed
70	NGET are asked to provide clear data on projects that have been live in RIIO-1 including costs against the NIA allowance.	NGET Innovation RIIO-1 Overview Paper 0519 & Innovation Annex – RIIO-1 Performance to respond to challenges 52-80.	Closed
149	NGET to ensure that there are no duplications between any associated Output Delivery Incentives and funding.	There are no duplications.	Closed
152	NGET to be clear on what their role is (in the dialogue with other stakeholders on supporting vulnerable customers) and indicate, as part of that collaboration, where they would add the most the most value.	We have indicated on p141 how our proposals for addressing vulnerable consumers relates to our role.	Closed

Transparency

Challenge Reference	User Group Challenge	NGET response	Status
111	NGET to demonstrate the step change in transparency with regards to what has been done in RIIO-1 and what would be different in RIIO-2 and how this has been benchmarked.	<p>(1) We are committed to widening the scope of Our Performance reporting to include key societal measures. This will demonstrate how we are operating as a fair business and making a positive contribution to the society that we serve. This has been referred to in the Chapter.</p> <p>(2) We will be using online digital platforms to share our performance measures in a timely manner. This has been referred to in the Chapter.</p> <p>(3) The independent User Group will challenge us on our reporting; ensuring that we are transparent - see details in chapter "Giving Stakeholders and Consumers a voice".</p>	Closed
113	NGET to articulate any other areas they intend to be transparent in e.g. recycling, tax behaviour. The User Group expect to see this reflected through the chapters where applicable.	Transparency is now a thread in the business plan. Chapter 8 - section 5.3 (iii) - we talk about how we will be transparent in our connection costs. Chapter 11 includes how we intend to create a new environmental page on our NGET website to be transparent on our environmental performance with our stakeholders. We will also lead in transparency on capital carbon and natural capital using open source data to collaborate and drive environmental progress and chapter 12 talks about transparency in innovation.	Closed

114	NGET to review/confirm the different stakeholder segments, establish what they would like reported and why, establish how they would like the information communicated and identify gaps.	Chapter 13 Section 3 - table 13.1 now includes a table which highlights the different stakeholder segments and what they would like reported and section 4 - table 13.2 (pg145-145) proposes what we will be doing to address this. Update from Sponsor Meeting 13/11/19 Appendix 6.4 in the engagement log included a list of stakeholders who were approached for engagement for this priority.	Closed
115	NGET to be clear in the October Iteration on the outcomes they are trying to achieve with the Online Portal. NGET to also justify the need for a bespoke portal as opposed to working in partnership with other networks towards having one network portal.	To increase the accessibility of data and reporting, we plan to invest in our insights platform to structure our data to support Ofgem's energy data exchange service . We will do this by: <ul style="list-style-type: none"> • working with our stakeholders and Ofgem to maximise the value of data held in our business and ensure that key data items are accessible • integrating our insights and enterprise resource planner platform with the portal to surface key financial and performance data • proposing an allowance of £1.2m to be included in the business plan to deliver this requirement. 	Closed
116	NGET to provide the breakdown in the October iteration of the Business Plan of the £16.7m requested against Transparency and demonstrate value for money.	Chapter 13 Section 6 "our proposed costs for RIIO-2" now has a detailed breakdown of the £16.7m. The costs for these proposals are outlined in the table below which are captured within our business support functions and operational expenditure. These have been benchmarked and assessed as efficient, which you can read further on how these have been benchmarked and assessed in the chapter 14. 15/11/19 Update: Business support costs have now been removed from this chapter as it was deemed that these should be included in run the business costs. Section 6 in the business plan now only includes the IT investment as described in NGET response in 115.	Closed
118	NGET to demonstrate how they have benchmarked good practise in relation to Transparency and define what good looks like.	We have taken good practice and learnings from various sources EY and others in and outside the sector and this has been used to shape our proposals as mentioned in the chapter. Benchmarked externally - Transparency International - Corporate Political Engagement Index (CEPI) 2018 - National Grid has just been rated as a "B" in the 2018 Index. https://www.transparency.org.uk/cpei/#resources What good look like to us is that we have delivered to our obligations (financial and regulatory) without any breaches, we delivered our reporting performance that meets the needs of our stakeholders and that our performance is understood.	Closed
119	NGET to ensure that compliant with best practise with regards to accessibility to website and other publications.	NGET has used industry standard IT applications to deliver external communication or collaboration platforms. These will enable best practise for accessibility to different content across our website. Our corporate brand guidelines also set the standards around accessibility to website and other publications. We are listed as a member of the Plain English Campaign and we have the crystal mark for our website.	Closed

Value for Money

Challenge Reference	User Group Challenge	NGET response	Status
96	Articulate how the project management process is different across the spectrum of project size and provide assurance around the efficiency of the project management structure applied and support costs (around the number of people involved to deliver project). The reason this is important to understand is that there is a perception by the industry, is that if we NGET are delivering a £40M or a £400M project that the project structure, governance, number of people involved are similar, or do NGET have a nimble, appropriately resourced small project process?	The end-to-end investment management process at the highest level is the same for all sizes of projects, because the stages that a project needs to go through are common whether we are undertaking a major multi-million-pound project (such as connecting the new nuclear power station at Hinkley) or replacing a single asset in situ for less than £100k. This is the Investment Planning TP500 process was presented to and discussed with the Use Group.	Closed
97	Looking at the comparable programme of work, can NGET articulate which ones are better in the UK compared to the US and vice versa. Articulate the learning and how what has been learnt is subsequently applied. NGET to be more explicit on where there are any caveats.	The User Group was taken through this detail and some detail has also been provided in chapter 14 of the December plan.	Closed
98	With regards to efficiency and innovation, how does NGET extrapolate the benchmarking data to take responsibility for having a forward-looking view on what things should cost and what is wasteful.	<p><u>Future efficiency from delivery of capital investments</u> Within our RIIO-2 submission, we have embedded efficiencies driven from previous innovations (including those achieved during RIIO-1) to ensure that customers and consumers will continue to benefit from efficient ways of working.</p> <p><u>Future efficiency from workforce productivity improvements</u> In future, in order to for us to remain at this efficient frontier, we need to consider the effect of expected productivity gains from our internal workforce and operating activities. CPIH inherently captures both input price pressure and industry productivity within its inflation measure. However, like real price effects, we would also expect there to be differing productivity estimates than those embedded into the generic inflation measure. Predicting the efficient frontier is particularly challenging in the current</p>	Closed

		<p>economic climate, so it is important to assess the range of data sources available as well as looking to regulatory precedent for supporting evidence.</p> <p>For RIIO-2, we are embedding 1.1% of efficiencies per annum across our forecast totex for internal (i.e. controllable) workforce and operating activities, despite economy-wide measures such as from the Bank of England which evidence that a lower estimate could be credible in the current economic climate</p>	
99	<p>NGET to explain assumptions around actions taken, where international comparison is deemed challenging or not possible.</p>	<p>*Additional 0.5% uplift has been applied by Ofwat for the move to totex and outcomes regulation for PR19</p> <p>* RIIO-1 Final proposals weighted average of opex and capex productivity final proposals</p> <p>As previously stated, National Grid operates in compliance with the Competition Act 1998 and the Enterprise Act 1998. We cannot therefore directly share capital costs with other network companies in a manner that provides the information granularity required to undertake meaningful benchmarking analysis.</p> <p>To partially address this, we work with Industry bodies or generic specialist organisations such as:</p> <ul style="list-style-type: none"> • International Benchmarking, e.g. the Engineering Performance Club which includes National Grid (UK), Elia (Belgium), Red Electrica (Spain) and RTE (France) • International Project Association • British Tunnelling Society • Association of Cost Engineers & Society Cost Analysis Forecast • Agency for the Cooperation of Energy Regulators • Infrastructure Client Group (Network Rail, National Grid, HS2, UK Power Network, Highways England) <p>The difficulty is that for benchmarking to provide meaningful information it must consider context, i.e. organisational structure, technical specification and environmental requirements, and while we have managed to secure some useful information such as industry earth removal rates and cabling installation rates which can be used to inform, they cannot be taken as indicators of probable outturn costs without the application of appropriate intelligence. Due to the limited number of companies undertaking work in the same sector, the potential inaccuracies in publicly-available information and the importance of ensuring that benchmarking is undertaken on a like-for-like basis, we believe it is important for us to maintain the specialise skills that we hold in our Estimating Hub (eHub) to ensure we understand our costs.</p>	Closed

100	NGET to provide more information on benchmarking safety as little mention is made in the paper.	<p>National Grid has got a central Safety, Health and Sustainability department who manage safety across our business. It exists to make sure that we are able to work safely, offering world-class skills and expertise to focus on: Safety; Process Safety; Wellbeing and Health; Business Resilience and Continuity; and, Sustainability and Climate Change.</p> <p>National Grid Group data and sharing We know that the majority of our incidents and near misses have behavioural root causes, plus what causes our injuries are not the same things that cause our High Potential Controllable Events (HPCEs) or 'near misses'. That is why we are moving towards leading indicators that track the effort we put in to safety management rather than tracking the harm from not getting it right post-event. It is also why we are focusing on safety culture and have introduced a group-wide safety culture survey. An example of the data that is shared monthly with Electricity Transmission SHE, UK SHE and Group SHE committees is shown below. Such statistics are also included within the NGET performance report, which is regularly cascaded from executive levels through to all management.</p>	Closed
153	NGET to provide more evidence and materiality to support the commitments to efficiency improvements as detailed on pages six and seven of the Value for Money report.	This detail was provided to the User Group and has also been elaborated on in Chapter 14 of the December plan	Closed
154	NGET to clearly articulate, in the business plan, how the target of improving operating productivity 1.1% year on year had been set.	<p>Within our chapter 'Value for Money' we have evidenced through benchmarking and market testing that our costs are at the efficient frontier from the start of the RIIO-2 period. Our future productivity target therefore serves to keep our costs at the efficient frontier throughout the RIIO-2 period and there is no need for further catch up efficiency targets to be embedded.</p> <p>To find an appropriate level of efficiency it is important to assess the range of data sources available as well as looking to regulatory precedent for supporting evidence. Predicting the efficient frontier is particularly challenging in the current economic climate and the levels of uncertainty which are resulting in a large range of productivity estimates. Following the global economic crisis in 2008 there has been a marked slowdown in productivity across many industries which has failed to return to levels seen pre-recession. This is reflected in the UK wide measures, such as the low Bank of England forecast as well as the downturn in productivity signalled by the Office of Budget Responsibility (see figure 3).</p> <p>Given the broad range in future productivity there is a risk around following regulatory precedent without considering the broader UK evidence as seen from the Bank of England data however NGET are committed to embedding an ambitious commitment to deliver efficiencies throughout RIIO-2. Based on the above evidence a 1.1% efficiency commitment has been embedded into our internal workforce costs and other operating activities, based on the EU KLEMS 0.9% long term productivity growth forecast with an additional 0.2% stretch ambition.</p>	Closed

		More detailed explanation on the different data sources for productivity estimates and how we have arrived at our target of 1.1% per annum are set out in the RPE and future efficiency annex A14.14.	
155	NGET to pull out the differences in approach, assurance and process between RIIO-1 and RIIO-2.	<p>RIIO-1 introduced some significant changes to our regulatory framework, moving from a cost focused deal with different incentives to outperform on different cost areas to a framework that focused on outputs, with stronger incentives to innovate and deliver efficiencies across the whole of our cost base.</p> <p>Our activities are continually challenged to ensure that they are efficient and deliver value for money for our customers and the end consumer. We utilise a range of techniques to assure ourselves of this, the main tools being market testing and benchmarking. At the highest level, almost our entire current cost base has either been market tested via competitive tender or benchmarked over the last six years.</p> <p>In preparing our RIIO-2 business plans we have looked to externally assure our costs wherever practicable. Our asset-related unit costs, IT, business support costs and our pay grades are all in line with efficient benchmarks, and where they have not been we have reduced our costs to meet the efficient benchmark. Where it has not been possible to assure our costs externally, we have used historic benchmarks such as RIIO-1 capital unit costs or showing our operating costs are lower than they have been on average. By moving to our new organisational structure ahead of the next price control, we can be transparent with stakeholders about the costs to run our business going forward. On top of this, our productivity improvement target of 1.1% per annum across our operating costs and the labour element of capex is three times the current trend for the UK. These measures ensure that the costs we have put forward remain at the efficient frontier throughout RIIO-2, with consumers benefiting from these efficiencies from the start of RIIO-2.</p>	Closed
156	NGET to demonstrate how wider engagement for e.g. Business as Usual has influenced the costs.	<p>Chapter 6 'Giving stakeholders and consumers a stronger voice' explains that we have tested whether we are providing value for money by collecting evidence on consumer preferences and acceptability and by inviting stakeholders to scrutinise our draft plan. In summary, stakeholders have told us that they expect us to meet their priorities efficiently and to deliver value for money, both over the five years of the RIIO-2 period and the longer term. This broad guidance has been interpreted by us as a need to demonstrate that our costs provide value for money today and will remain efficient over the RIIO-2 period. This is evidenced in Chapter 14.</p> <p>In addition, the engagement tables in each Key Stakeholder Priority chapter list the trade-offs made in response to stakeholder feedback.</p>	Closed
157	NGET to provide a robust explanation of efficiency savings especially changes from July.	This has been provided to the User Group and been included in Chapter 14 of the December Plan	Closed
158	NGET ensure that acceptability testing is undertaken on the cost pertaining to Industry and Commercial customers.	The acceptability of our proposed RIIO-2 plan was tested with I&C consumers as part of our September 2019 acceptability testing work. This asked business consumers of all sizes about the acceptability of the impact of our July plan on their energy bill, with 87% of the 161 business respondents saying that they	Closed

		found our plan acceptable. A summary of the acceptability testing results is included in Chapter 6, and full details can be found in Annex A6.05.	
159	NGET to justify to its stakeholders and customers that the costs pertaining to Cyber are value for money, have appropriate third party assurance and that appropriate efficiencies, optioneering and unit cost evidence have been built into the business plan.	<p>The cyber risk faced by NGET has grown significantly during the RIIO-1 period, both in terms of complexity and rate of change of threat, and this is expected to continue through the RIIO-2 period. Following the introduction of the Network and Information Systems (NIS) regulations, we are working collaboratively with the NIS Competent Authority (Ofgem and BEIS) to ensure that our plans reflect the investment required to meet these new regulations and safeguard the network from cyber threats.</p> <p>We have developed a risk-based methodology to assess the threat to our assets and are working with the NIS Competent Authority and the National Cyber Security Centre to validate our risk assessment and develop options to mitigate. This assessment considers both risk and criticality of assets to ensure that our investments deliver value for money.</p> <p>Our unit costs are based on outturn costs from completed projects, vendor quotes and operational experience from our Alarm Receiving Centre. Our unit costs and proposed cyber investments have been benchmarked by Gartner (independent IT benchmarking specialists), who found our costs to be in the low-mid range in comparison to energy sector peers.</p> <p>Ofgem have proposed two re-openers for our OT Cyber Resilience plan, one at the start of the RIIO-2 period and one mid-way through. This recognises the evolving cyber threat and has allowed us to build a baseline plan which includes only measurable and deliverable solutions to known threats. The re-opener will be used to cater for uncertain solutions and/or costs, and potential changes in requirements during the RIIO-2 period, providing greater cost assurance to our customers and stakeholders. A further safeguard to ensure that we deliver value for money for our customers and stakeholders is the on-going periodic (within year) review of our investments by the NIS Competent Authority.</p>	Closed
160	NGET to present their Industry and Commercial numbers in context with ESO published numbers.	This was discussed with the User Group and an explanation to the Industry and Commercial numbers has been provided in the December plan.	Closed
161	NGET to make the unit cost book update process explicit in the plan and to use a case study to explain the story. NGET to ensure they pull out the big-ticket items which have impacted costs.	Chapter 14 section 5 summarises our processes for managing the capital cost of network-related projects. Under the sub-heading “Informed cost estimation and evaluation”, the process of maintaining and updating our Cost Book is described along with how this is used to estimate project costs at each stage of the project development process. Case studies to show how our RIIO-1 experience has been reflected in our RIIO-2 submission are contained in the subsequent sub-section “Internal capex benchmarking (historic trends)”. More detail by asset type is contained in each of the relevant Investment Decision Packs (as part of the Justification Report element).	Closed

162	NGET to build the level of efficiency ambition into the front of the plan	We have built the level of efficiency ambition into the December business plan. They are also described in more detail in the executive summary.	Closed
163	NGET to demonstrate the trade-offs between different customer/consumer groups and the rationales for any trade-offs.	In our presentation on the customer bill impacts of our draft RIIO-2 plan we explained how the ESO is responsible for setting and administering the TNuoS charging methodology to recover our revenues and the revenues of other transmission networks. We are not able to differentiate or discriminate between different customer or consumer groups when it comes to bill impacts. Alternatively, the engagement tables in each Key Stakeholder Priority Chapter list the trade-offs made in response to stakeholder feedback. These trade-offs are summarised in Chapter 6 'Giving stakeholders and consumers a stronger voice'.	Closed

RIIO 1

Challenge Reference	RIIO 1 – User Group challenge	NGET response	Status
49	Clearly articulate the lesson learnt from RIIO-1 and how this is shaping the RIIO-2 business plan?	The lessons learnt from RIIO-1 and how they have shaped our RIIO-2 business plan is detailed in the Context section of the December business plan. ET.04 RIIO-1 Performance Annex provides further detail on our RIIO-1 performance.	Closed
50	Demonstrate the efficiencies generated in RIIO-1 and how that forms a baseline for stretch in RIIO-2 to show evolution of spend.	We have highlighted the impact of RIIO-1 efficiencies in the development of our RIIO-2 plans as part of our RIIO-2 submission. ET.04 RIIO-1 Performance Annex provides further detail.	Closed

Output Delivery Incentives

Challenge Reference	CHALLENGES	Response	Status
138	NGET to include the SO:TO model in the business plan as an aspiration and to articulate the benefits of a whole system approach	We included the SO:TO optimisation model in our 1 st October business plan and in the whole systems annex (A7-8.06) and explained the whole system benefits it could bring. We have worked intensively to provide a more detailed SO:TO optimisation model for our 9 th December plan, which we will engage the SO, other TOs and Ofgem on.	Closed

Price Control Deliverables (PCDs)

139	NGET to quantify the effects of uncertainty mechanisms	We have worked intensively over the last few months to quantify how the uncertainty mechanisms in our plan should operate to best protect consumers. We have included the headlines of how the uncertainty mechanisms operate the business plan and the detail in the annex "A7-8.05 Managing energy uncertainty".	Closed
164	NGET should pull together all the stakeholder engagement they have done on SO:TO optimisation and present it to Ofgem.	We have worked working intensively to provide a more detailed SO:TO optimisation model for our 9 December plan, which we have engaged the SO, other TOs and Ofgem on. We have also written and shared with the User Group all the stakeholder engagement we have done over the last year on the SO:TO optimisation model. Stakeholder engagement shared 21/11/19	Closed

Price Control Deliverables (PCDs)

Challenge Reference	CHALLENGES	Response	Status
137	NGET to have plan on engaging stakeholders where applicable and to ensure relevant optioneering.	Our engagement on PCDs has been integrated into our overall engagement approach. We have designed and adapted our PCDs to reflect the key themes coming out of our engagement on each key priority. Following your feedback, in our 1 October business plan we included more description of optioneering for our outputs and provided more detail in the supporting investment decision packs.	Closed

Business/Investment Planning

Challenge Reference	CHALLENGES	Response	Status
46	Please provide assurance of the numbers in your business plan. How can you demonstrate that extra costs are not baked in, to then out-perform when delivering?	The numbers submitted in our business plan has been supported by benchmarking evidence to show that our forecast costs are in line with historic costs, and that these historic costs are in line with relevant benchmarks (where available). For our capex business plan submission, we are supplementing our usual processes with an external consultant's report on installed equipment costs. Our detailed RIIO-2 Business Plan Data Templates, when coupled with 13 years of annual Regulatory Reporting data from National Grid (and the same data from the Scottish TOs plus similar data from the GB DNOs), I provide Ofgem's NGET Cost Assessment team with an extensive dataset to assess and challenge our forecast costs on both an equipment unit cost and activity basis. Our approach to demonstrating that our forecasts are efficient (and not over-inflated) has been set out in	Closed

		more detail in the “Benchmarking and efficiency” paper circulated as pre-read for the SUG SG7 meeting on 16 April 2019.	
47	What is NGET doing pro-actively to enable new business models/new entrants/communities to work with them in delivering projects/programme of works?	We have global procurement and commercial functions that work to find the best suppliers for all our different scales of needs. We comply with legal requirements for tendering; for example, depending on the financial value of the project, we advertise upcoming tenders in the Official Journal of the European Union. We review contractor performance over time and seek delivery models which offer improved value for money, depending on the mix and geography of projects.	Closed
48	Demonstrate NGET’s articulation of its approach or view to competition and proxy competition.	<p>We support the principle of introducing competition in transmission, where the model and associated arrangements can deliver value for consumers.</p> <p>The Competitively Appointed Transmission Owner (CATO) model is the only workable onshore competition model developed to date. The existence of a licence would allow for the asset owner and operator to be directly regulated by Ofgem, enable risk to be clearly allocated, and provide statutory powers to the party building the assets. The CATO model would also allow for the competition to be run earlier in the process, maximising the opportunity for consumer value. We support Ofgem’s intention to seek legislation to facilitate this model.</p> <p>The Competition Proxy model does not constitute a competitive process; it is purely a project-specific price control. As such, it does not deliver any of the benefits which would be expected to result from a competition, such as innovation or price discovery. Further, the current proposals do not represent an outcome which would realistically result from a competition, and as such the consumer benefit assessment is not credible. Therefore, we do not support this model.</p> <p>We do not support the introduction of the Special Purpose Vehicle (SPV) model. Firstly, it is not clear how the SPV would be able to participate in transmission or gas transportation activity without holding the relevant licence. Secondly, it suggests a reduction of Ofgem’s regulatory powers, and unclear accountabilities and risk allocation. The lack of licence would bring additional risk for the TO, for which it is not proposed that the TO is compensated. In addition, there are multiple aspects of the model which are not sufficiently well developed. As such, we do not find Ofgem’s assessment of consumer benefit to be credible.</p> <p>Ofgem should explore the early CATO model further. The early model, although potentially more complex to implement, has the potential to deliver a greater consumer benefit than the Late model, and is consistent with international experience. It will be important to distinguish between “very early” and “early” models: the stage of the process where the competition is run will impact on the potential for innovation, certainty for bidders, and ease of comparing bids. The ENA Early Model Report in 2017</p>	Closed

		defined a “very early” model as the competition being run after the need is identified, where bidders can propose options. The “early” model is where a competition is run after the solution is identified, and bidders can propose initial solution designs which are refined during the consenting process. The report found that an “early” model would be more workable.	
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Context

Challenge Reference	CHALLENGES	Response	Status
4	How does NGET set its approach in the context of relevant legal requirements, for example meeting the 4th and 5th carbon budgets?	We welcome the publication of the Committee on Climate Change (CCC) Net Zero Report and the ambitious goals and direction within. We want to play our part in the decarbonisation of Great Britain’s energy system and to make sure the transition to a clean energy system is fair and leaves no-one behind. And we want to achieve it all at the lowest possible costs for bill payers. Natural gas has an important role to play in supporting the transition to low-carbon power, heat, industry and transport. It provides the reliability and flexibility to support growth in renewable generation and it gives Great Britain options to decarbonise commercial vehicles and industry. Perhaps most importantly, gas can also help to decarbonise heat, the biggest source of UK carbon emissions, at the lowest cost and with least disruption to consumers. As per the Committee on Climate Change (CCC) report, we need to see much greater progress in making areas like heat and transport cleaner, with both government and industry stepping up action. Gas can support a fair transition to low-carbon power, heat, industry and transport and play a key role in meeting the GB environmental targets. Further development of this challenge will be linked to emissions compliance challenges (#116-121).	Closed
5	Given Nicola Shaw’s very helpful comments about needing to move beyond a ‘least worst regrets’ approach toward something which takes strategic decisions, how does NGET see its business plan supporting the big strategic decisions of the 3Ds?		