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23 April 2021

Application for Permission to Intervene in Energy Licence Modification Appeal 2021 (Opened 5th March)

For the attention of the CMA Panel,

Summary of Intervention Notice

Introduction

1. Citizens Advice wishes to intervene, to oppose these appeals, as part of its statutory role to represent domestic and small business energy consumers in Great Britain.
2. Allowing these appeals would grant the appealing network companies significant additional revenue, to be funded by consumers, without any related improvement in service or investment. We do not believe that this is justified. We do not accept companies' claims that Ofgem did not follow due process; that Ofgem has limited scope to use its judgement in applying the Capital Asset Pricing Model ("CAPM") model (for determining the companies' allowed returns), or that the Final Determinations will materially impact the companies' financeability. Thus, we present a case that the appeals are not in the best interests of either current or future consumers.
3. UK regulated networks companies have generally and consistently enjoyed high returns through regulatory settlements that have proved too generous. This now needs to be addressed and, although we believe Ofgem could have gone further,

Patron HRH The Princess Royal Acting Chief Executive Alistair Cromwell

Citizens Advice is an operating name of the National Association of Citizens Advice Bureaux

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RIO-2 represents a step change in the right direction. It would not be in consumers' interests if Ofgem's approach was undermined by these appeals.

4. We focus our response on the evidence for a lower Cost of Equity, including the importance of addressing structural outperformance by making a downwards adjustment to the Cost of Equity (the Outperformance Wedge). We will also make limited comments on the Cost of Debt. These issues are important both for these appeals and for setting appropriate expectations for future price controls.
5. We consider that the structural outperformance, as seen in previous price controls, and the revealed investor acceptability of reduced Cost of Capital are evidence that the implementation of the CAPM model in the energy sector has structurally favoured investors over consumers. The evidence suggests that the econometric components of the model to calculate the Cost of Equity do not properly reflect the risks associated with the price controls, thereby overstating non-diversifiable risk and so fair costs of financeability.
6. We will outline the important consumer context for the RIO-2 determination and explain how overestimation of the Cost of Capital and associated continued structural outperformance risks consumer detriment in multiple ways.
7. Accepting these appeals and unduly rewarding networks is a high risk approach for consumers in the current UK economic context. We are particularly concerned about the impact on affordability by any undue increase in prices - at a time where evidence is growing that affordability is worsening - as well as the potential detrimental impact on Net Zero delivery by the energy industry.
8. Appeals processes are themselves costly from a consumer perspective. The recently concluded water sector (PR19) appeals process added over £8 million to consumer bills, from a total £26 million of network company costs. There is in addition over £6 million in costs to Ofwat and the CMA¹, also ultimately payable by consumers. These costs illustrate the resource asymmetry, between the

¹ CMA (2021) [Anglian Water Services Limited, Bristol Water plc, Northumbrian Water Limited and Yorkshire Water Services Limited price determinations](#) "We therefore decide to include the following total costs in the determinations (and hence the Disputing Companies can recover the following redetermination costs from their customers): Anglian £2.125 million; Bristol £1.964 million; Northumbrian £1.838 million; and Yorkshire £2.293 million." p1159

network companies and other interested parties, i.e. consumer representatives, in the appeals process.

9. We are also concerned that the appeals rules in the energy sector encourages companies to appeal. This is because companies are able to 'cherry-pick' which issues to appeal upon, whereas parties with contrary interests, i.e. consumers, do not have the same opportunity, nor the resources, to appeal. This leads to a highly asymmetric process, with only matters where appealing might be favourable to the networks being addressed at the appeals. This has the potential to lead to an overall outcome even more skewed against consumer interests.
10. We therefore encourage the CMA Panel to consider the important role the CMA can have in working with government and sectoral regulators to reduce the likelihood of appeals and improve the regulated network sector appeals processes. In particular, a more coordinated regulatory approach to setting the Cost of Capital would at minimum provide greater clarity for all stakeholders and so reduce the prospect of appeals on this ground. Moreover, close alignment of regulatory appeals processes and establishing best practice across sectors would further reduce overall uncertainty and costs.

Cost of Equity

11. Citizens Advice disagrees with the companies' claimed reasons for appealing against Ofgem's decision. In particular, Citizens Advice believes that the regulator's determination met their statutory duty, was based on thorough market evidence, and considered the interests of existing and future consumers, while having regard to the companies being able to finance their activities. Moreover, whilst accepting Ofgem's decision was within the bounds of regulatory judgement, Citizens Advice considers that Ofgem's determination of the Cost of Equity was still too high, on the basis of reasonable evidence. It was therefore generous to the companies, while not sufficiently fair to the interests' of existing and future consumers.

The key evidence we provide regarding the Cost of Equity includes:

- the **Risk-free rate (RFR)** - we maintain that the CMA was wrong (in its PR19 water Final Determinations) to attach any weight to corporate bonds in its estimate of the RFR;
- **Total market returns (TMR)** - the TMR should not just be based on the average returns on UK equities, but ideally on the average returns on a wider and more diversified portfolio of investments;
- **Equity beta** - the relevant data should be from the perspective of the overall non-diversifiable risk that investors in the UK energy and water companies face – i.e. global investors investing in a highly diversified portfolio of global assets – not merely from where the companies conduct their business. Also, the introduction of new regulatory mechanisms at RIIO-2, in particular, new uncertainty mechanisms, offer the network companies additional protection against changing circumstances. This itself reduces non-diversifiable risk facing the companies and so the equity beta.
- **'Aiming up'** - the above evidence relating to the Cost of Equity being too high demonstrates that any further increase to Cost of Equity is not justified, and will lead to a further over-statement of companies' allowed returns.

12. We would also note that there is no evidence of any realistic risk to investment from Cost of Equity being set too low. On the contrary, the recent proposed purchase price for Western Power Distribution (WPD) by National Grid implies a premium of at least 60% to the Regulated Asset Value. Such a premium was in full knowledge that Ofgem has said that the financial methodology for the next electricity distribution price control, after RIIO-2, will be similar to the other RIIO-2 settlements being appealed here. This is clear evidence that there is a continued strong appetite for regulated assets of this type. Moreover, such a large purchase premium for one of the energy network companies itself strongly confirms that the Cost of Equity has been set too high by Ofgem.

Outperformance Wedge

13. Ofgem's use of an Outperformance Wedge adjustment, to effectively reduce the Cost of Equity to allow for expected outperformance, in its calculation of the allowed return on equity, represents a significant improvement in the way regulators determine the level of profits network companies can earn.

14. It provides a theoretically robust solution to a key failing of previous calculations of the allowed return on equity: that information asymmetry has enabled companies to persistently earn a higher level of profit than that required by investors to finance the companies, which has resulted in consumers paying billions more than necessary.²

15. We set out our analysis that shows the proposed adjustment is modest:³

- Historical totex performance from 2000 to 2020 – historical outperformance of 1.53%
- RIIO-1 outperformance – historical outperformance of 1.9%
- Market to Asset Ratios (MARs) – current level of expected outperformance of 3.2%. This is further supported by the proposed purchase of WPD by National Grid.

16. Given the amount of evidence of structural outperformance, repeated over a long period of time, it is plainly not credible to suggest that outperformance should not be expected on this occasion. In any case, although we do not believe it is necessary, Ofgem has provided a mechanism to return the Outperformance Wedge should outperformance not transpire on this occasion.

17. Addressing the companies' claims of challenge to financeability, we are not aware of the companies seeking to raise significant new equity or having difficulty obtaining new equity and do not see a basis for this concern.⁴

Consumer context

18. Consumers would be materially affected by the scope of potential amendments requested by network companies on these appeal grounds. We estimate that the companies are asking for up to **£1.5 billion over 5 years**⁵. This is before additional opportunity for further returns that will arise from the sizeable uncertainty mechanisms and reopeners.

² Citizens Advice (2017) [Energy Consumers Missing Billion. The profits gifted to energy networks](#)

³ Citizens Advice (2020), [Submission to Ofgem consultation on RIIO-2 Draft Determinations Finance Section](#) Pages 38-46

⁴ We note that some companies assume that some shareholders elect to reinvest dividends via a scrip dividend

⁵ Citizens Advice (2021) Impact on Revenues calculation

19. Any unjustified returns for network companies arising from RII-2 add unfair cost to consumers' bills. We present growing evidence that current bills, and future bills with additional spending via uncertainty mechanisms, will be less affordable. We also believe unjustified returns will be detrimental to Net Zero delivery. This must mean there is a high burden of proof to allow network companies additional money.
20. The average UK household energy bill increased by £32 per month due to people spending more time at home because of the pandemic⁶. With 1.62 million people unemployed⁷ and 9.6 million furloughed⁸, the job market also worsened significantly. Higher bills and reduced job security mean fuel-poor households find themselves under even greater stress.
21. Citizens Advice's research indicates the situation is particularly tough for certain groups. Black, Asian and minority ethnic minority (BAME) groups, parents and carers, and people who were furloughed are all more likely to have fallen behind⁹.
- 28% - twice the UK average - of BAME people are behind on essential bills or rent. This rises to 31% for black people.
 - A quarter (26%) of those with children under 18 in their house are behind on essential bills or rent
 - 24% of people who were furloughed have fallen behind on essential bills or rent
22. Unwarranted generosity to network companies is also likely to detrimentally impact Net Zero delivery:
- Unjustified levels of returns could distort investment in innovation. If network companies can achieve high levels of returns without needing to innovate this reduces the incentive to do so.
 - It will also directly affect the affordability of the delivery of Net Zero which could affect customer trust.

⁶ Compare the Market (2020) [Millions can expect 'shock' energy bill this autumn](#)

⁷ BBC (2021) [Unemployment rate: How many people are out of work?](#)

⁸ HMRC (2021) [HMRC coronavirus \(COVID-19\) statistics](#)

⁹ Citizens Advice (2020) [Debt at the close of 2020: What 9 months of a pandemic has done to UK household finances](#)

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Citizens Advice request to intervene

23. This is a Notice of Intervention by Citizens Advice. We make this request to intervene in the RIIO-2 price control appeals as an interested third party in accordance with the provisions of the Acts and the Energy Licence Modification Appeals Rules and Guide. Citizens Advice opposes these appeals.

Material interest

24. Citizens Advice is materially interested in the outcome of this appeal. Citizens Advice has statutory responsibilities to represent energy consumers in Great Britain and has appeal rights under the Electricity Act 1989. These consumers would be materially affected by the scope of potential amendments requested by network companies on these appeal grounds. We estimate that the companies are asking for up to **£1.5 billion over 5 years**¹⁰.

Unique perspective

25. Citizens Advice provides a unique perspective that will assist the CMA in the determination of these appeals. As the statutory consumer advocate for energy, Citizens Advice have been heavily engaged in the RIIO process and so can provide informed insight. We intervened previously in the RIIO-ED1 appeals process¹¹. As in RIIO-ED1, we have again represented the interests of consumers at each stage of the RIIO-2 price control process¹². We have worked closely with energy network companies, customer engagement groups, consumers, the RIIO-2 Challenge Panel, and Ofgem. Citizens Advice has sought long term network cost efficiency, high standards of service, including in relation to the reliability of their electricity supply, support for vulnerable customers during outages and complaint resolution.

Proportionate approach

¹⁰ Citizens Advice (2021) Impact on Revenues calculation

¹¹ Citizens Advice (2015) [Energy Price Control Appeals: British Gas Trading and Northern Powergrid](#)

¹² Most recently, see Citizens Advice (2020) [Citizens Advice response to RIIO-2 Draft Determinations for Transmission, Gas Distribution and Electricity System Operator](#)

26. We will focus our response on the combined grounds relating to the Cost of Equity and the Outperformance Wedge because of the impact these issues will have on consumer bills. We will also make limited comments on the cost of debt. We believe this is a proportionate approach to intervening and should not be interpreted as support for any of the other appeal grounds.

Further engagement

27. We note that the appealing companies' notices of appeals rely heavily on expert witness statements and supporting consultants' reports which have not been made available to us. We therefore request that the CMA makes these documents available to us and provides sufficient time for us to consider them and provide further comments. Accordingly, our comments and analysis presented in this submission may change as a result of reviewing the additional documents submitted by the appealing companies.
28. Given the overlapping nature of the appeals and the short amount of time we have had to prepare this response we have not individually addressed all points raised by each of the appealing companies. Instead we refer to example comments from individual companies. The fact that we have not referred specifically to points made by a particular company does not mean we accept that company's appeal.
29. We wish to attend any hearings and would welcome the opportunity to make oral representations.

Regulatory and consumer context

30. As explained above, Citizens Advice has been heavily engaged in the RIIO process. We have also contributed to the NATS/CAA and PR19 price control appeals on the Cost of Capital and the consumer context to encourage a fairer and more sustainable approach to funding non-competitive low risk utility networks.
31. Citizens Advice has produced a number of reports including *Many Happy Returns? The consumer impact of price controls in regulated networks*¹³, *Energy Consumers' Missing Billions*¹⁴, *Monopoly Money: How consumers overpaid by billions*¹⁵, and *Redetermining Water*¹⁶ which provide evidence of systematic overestimation on the Cost of Capital in utility price controls in Great Britain.
32. We believe it would be helpful, therefore, to share some wider observations in addition to the specific grounds.

Consumer bill affordability

33. Any unjustified returns for network companies arising from RIIO-2 add unfair cost to consumers bills. There is growing evidence that current bills, and those that include additional spending, related to uncertainty mechanisms will be less affordable.
34. Network price controls include a degree of regulatory discretion in balancing the risk of network financeability while improving service and the actual detriment that is caused by bill increases.
35. Sector specific regulators have to be conscious of bill affordability in seeking to improve service. They have made a judgement on this trade off. The CMA is now set to redetermine this balance at a time of heightened affordability challenges

¹³ Citizens Advice (2015) [Many Happy Returns? The consumer impact of price controls in regulated networks](#)

¹⁴ Citizens Advice (2017) [Energy Consumers Missing Billion, The profits gifted to energy networks](#)

¹⁵ Citizens Advice (2019) [Monopoly Money: How consumers overpaid by billions](#)

¹⁶ Citizens Advice (2020) [Redetermining Water](#)

for consumers which risks negating the consumer engagement that occurred in the development of RIIO-2.

36. The average UK household energy bill increased by £32 per month due to people spending more time at home because of the pandemic¹⁷. With 1.62 million people unemployed¹⁸ and 9.6 million furloughed¹⁹, the UK job market also worsened significantly. Higher bills and reduced job security means fuel-poor households find themselves under even more stress.
37. COVID-19 has hampered the delivery of fuel poverty policy making and initiatives, including lost progress on energy efficiency projects and smart meter installations. Smart meters can have positive benefits to those in fuel poverty, as they allow customers to have more accurate energy readings, a better sense of where their energy is being used, and access to a potentially wider range of cheaper tariffs. There have also been delays in publishing new government strategies to support energy consumers²⁰.
38. Citizens Advice has seen evidence of these challenges first hand in the past year as we have had 60 million views of our self-help advice pages, and our frontline advisers have given one-to-one advice to 2 million people²¹.
39. Citizens Advice's research indicates the situation is particularly tough for certain groups. Black, Asian and ethnic minority (BAME) groups, parents and carers, and people who were furloughed are all more likely to have fallen behind²².
- 28% - twice the UK average - of BAME people are behind on essential bills or rent. This rises to 31% for black people.
 - A quarter (26%) of those with children under 18 in their house are behind on essential bills or rent
 - 24% of people who were furloughed have fallen behind on essential bills or rent

¹⁷ Compare the Market (2020), [Millions can expect 'shock' energy bill this autumn](#)

¹⁸ BBC (2021) [Unemployment rate: How many people are out of work?](#)

¹⁹ HMRC (2021) [HMRC coronavirus \(COVID-19\) statistics](#)

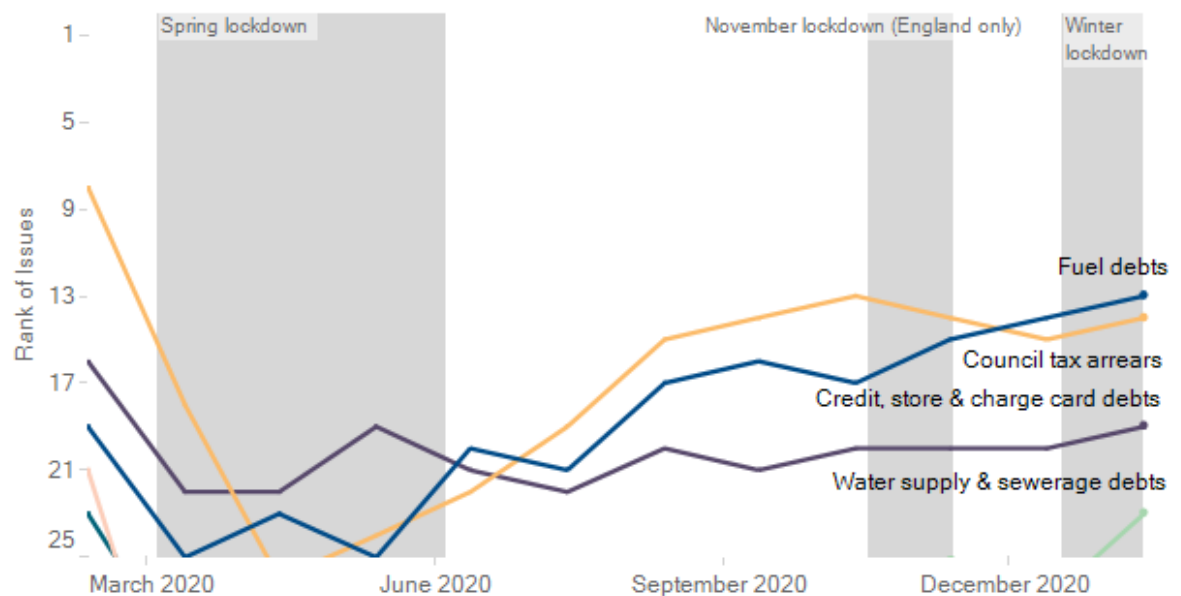
²⁰ BEIS (2021) [Sustainable warmth: protecting vulnerable households in England](#)

²¹ Citizens Advice (2021) [18 people helped every minute: What Citizens Advice data shows about the year everything changed](#)

²² Citizens Advice (2020) [Debt at the close of 2020: What 9 months of a pandemic has done to UK household finances](#)

40. Unemployment is set to peak of 6.5% at the end of 2021²³, while 1.4 million people that are subject to the No Recourse to Public Funds (NRPF) are in a precarious position, with the pandemic exposing the extreme hardship that can result from having no access to the benefits safety net.²⁴

Rise in fuel debt concern in Citizens Advice one-to-one consumer sessions



41. Fuel debts are an increasingly prominent consumer issue in our one-on-one sessions as shown in the above chart. Our research has also shown a quarter of all energy customers - up to 7 million households - are worried they wouldn't be able to pay their bill this winter²⁵. In December 2021 2.1 million households were behind on their energy bills, 600,000 more than in February 2020.²⁶

42. It is clear that consumer bill affordability has deteriorated.

43. We commissioned research from Europe Economics to consider the way the COVID-19 pandemic may impact anticipatory or strategic network investment

²³ BBC (2021) [Unemployment rate: How many people are out of work?](#)

²⁴ Citizens Advice (2020) [Nowhere to turn: How immigration rules are preventing people from getting support during the coronavirus pandemic](#)

²⁵ Citizens Advice (2021) [Recovery or Ruin? The role of accessible support in helping energy consumers through the crisis](#)

²⁶ *ibid*

needed to deliver change to support decarbonisation. These are reasons why investment efficiency is increasingly important:

- Reductions in the demand for energy may weaken the case for highly anticipatory investments
- Customer willingness to pay for improvements to the quality of service or the environment may be lower
- Affordability issues may be especially important given that many more households are struggling financially
- The case for applying real options analysis is especially strong in the current context with the value of the real option to wait now likely to be higher
- Cost and benefit analysis to value highly anticipatory investments will need to accommodate different COVID-19 scenarios and the ranges for estimated impacts are likely to be wider

Delivering Net Zero

44. Bill affordability and efficient delivery of Net Zero will be vital for ensuring that consumers trust energy networks and the Net Zero policy framework that will require their behaviour change²⁷. The decarbonisation agenda requires long term consumer engagement to deliver Net Zero. The risks of consumer apathy and distrust of energy system costs will be potentially significant. This is clearly addressed by the National Infrastructure Commission:

"...ultimately it will be bill payers who fund this transformation. Regulation must ensure that consumers are getting a good deal, and that all of them – including the most vulnerable – can access these services at a reasonable price."²⁸

An efficient settlement is a requirement for a fair social contract which is already likely to be demanding for energy consumers. For example, the cost and carbon savings of microgeneration adoption, home insulation measures and energy demand flexibility all require active engagement. This sits alongside the broader lifestyle changes that are required by Net Zero.

²⁷ BEIS (2021) [Net Zero public engagement and participation](#)

²⁸ National Infrastructure Commission (2019) [Strategic Investment and public confidence](#)

45. By overestimating the Cost of Capital relative to real world rates it will bias consumers and government against the choice and perceived deliverability of low carbon scenarios.
46. By seeking to ensure efficient investment in RIIO-2, Ofgem position network costs to accommodate the rise in bills, challenges in funding Net Zero and the increased scrutiny that energy companies will face in the context of the COVID-19 recovery. There is, therefore, a high burden of proof to increase the current Cost of Equity beyond any level that is strictly justifiable.
47. Energy networks are clearly vital to delivering Net Zero. However unwarranted generosity to network companies is likely to detrimentally impact Net Zero delivery: unjustified levels of returns could distort investment in innovation.
48. Delivery of Net Zero will not be done by energy networks in isolation but in combination with innovators in competitive markets that are also competing for investment. As highlighted by the Energy Systems Catapult recent report, a vital characteristic for RIIO-2 is that it incentivises efficient investment:
- “RIIO price control methodology is being evolved to better drive innovation by strengthening incentives for network owners and operators to be more ambitious and innovative, and to undertake efficient investments... investment needs to be coordinated efficiently across the energy value chain, particularly in networks at the distribution level and between different vectors [which includes transmission] in order to minimise costs and facilitate the modernisation and decarbonisation of the energy system.”²⁹*
49. Net Zero requires a broad spectrum of investment for innovative collaboration with networks or separately. We believe structural outperformance through excessive returns on Cost of Capital will reduce risk appetite for incentives linked to better service delivery. The ability to receive generous returns without requiring innovation dampens the incentive to take innovative approaches, given the inherent risk this brings. This can distort the development of adjacent competitive markets for technology and services, for example in the development of hydrogen projects, by underfunding or forcing development that is detrimentally network centric.

²⁹ Energy Systems Catapult (2020) [Rethinking Electricity Markets – EMR 2.0: a new phase of innovation-friendly and consumer-focused electricity market design reform](#)

50. There is precedent for regulators recognising that overly secured level of returns damaging incentives. The Competition Commission when challenged to further guarantee a higher level of returns by Bristol Water stated:

“Further, such a guarantee would be to the detriment of consumers and would prevent us providing incentives for Bristol Water to carry out its functions properly.”³⁰

51. This is also pertinent to the Wales and West Utilities (WWU) appeal on the cost of debt, in that the Ofgem statutory obligation “have regard to ... the need to secure that licence holders are able to finance the activities”³¹ cannot be interpreted as a requirement to fund any licence holder cost (even if it is inefficient). WWU expects to be able to recover its actual costs of its debt. This interpretation would give the aforementioned licence condition complete primacy over “the interests of existing and future consumers”³². We believe any price control commitment to fund activity, such as the Cost of Debt, without a requirement for clearly defined and efficiently delivered outcome provides undue protection to the licence holder. It also risks weakening companies’ pursuit of other outcome based incentives that benefit consumers.

52. The legacy of low carbon investment and strong policy signals in RII0-2 regarding Net Zero should result in lower risk to the companies. This in turn should result in customers funding lower financing costs.

53. It is clear from the Climate Change Committee that the cost of financing Net Zero will be substantial³³. The Advisory Group on Finance (AGF) for the UK’s Climate Change Committee highlight the variance in cost that is possible. The first scenario, *“presents the Cost of Capital at 1.5% assuming clear, strong and reliable policy signals: this results in an annual Cost of Capital of c£3bn. The second, ... shows the Cost of Capital at 7.5%, expressing more uncertain policy signals: this adds about £14bn to the Cost of Capital, results in the total Cost of Capital being over four times*

³⁰ Competition Commission (2010) [Bristol Water plc A reference under section 12\(3\)\(a\) of the Water Industry Act 1991](#) p68

³¹ [Gas Act 1986](#)

³² *ibid*

³³ The Advisory Group on Finance (2020) [The road to net-zero finance: A report prepared by the Advisory Group on Finance for the UK’s Climate Change Committee](#)

higher and adds an increment of over 30% to overall investment.”³⁴ Given the range in potential costs subject to policy direction it is vital that the policy confidence, where it is present, is capitalised upon with a representative Cost of Capital.

54. The AGF stated that *“well-designed real economy and financial policy will be crucial for reducing the cost of making the transition more affordable and speedier. Done well, the Cost of Capital could fall over time.”* concluding that demand for net-zero financial services in energy is *“increasingly high and sophisticated”*.³⁵

55. It is not just the AGF who highlights the value of the policy direction in the UK. PWC summarises from their investor interviews that there is *“a clear commitment on Net Zero and climate change has sent a powerful and clear message which appears to have cross-party support and is therefore seen by investors as an important and stable backdrop underpinning investment.*

This investment environment has succeeded in driving investment across a wide variety of infrastructure assets. Significant private investment can be seen across some of the most critical ‘Net Zero’ areas to date.”³⁶

56. If the CMA does not accept Ofgem’s use of market indicators about the broader confidence in UK commitments to Net Zero and the ascribed investor value for companies delivering against carbon reduction commitments such as energy network companies, it cannot accurately track network companies' relative low risk in relation to competitive markets.

Structural outperformance in RIIO-1 and previous price controls must be addressed

57. We have described above the importance of ensuring network company returns are justified, in terms of the detrimental impact on affordability generally and on Net Zero delivery. To achieve this requires a material change in approach from RIIO-1 and previous price controls. There is strong evidence of structural outperformance in RIIO-1 and previous price controls. This must be addressed, which we believe Ofgem has attempted to do.

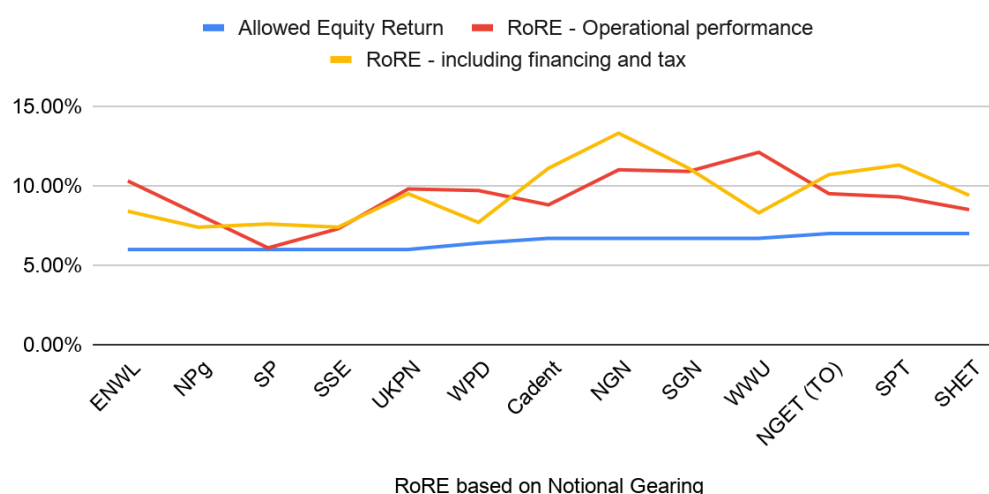
³⁴ *ibid*

³⁵ *ibid*

³⁶ PWC (2020) [Unlocking capital for Net Zero infrastructure: Aligning policy and private capital to provide infrastructure backbone to a Net Zero economy](#)

58. Across RIIO-1, despite numerous instances of failure to meet performance targets or forecast failure to meet targets across electricity transmission³⁷, gas transmission³⁸, gas distribution³⁹ and electricity distribution⁴⁰ current expectations are that nearly all companies will outperform compared to their allowed Cost of Equity:

Energy companies structural outperformance in RIIO-1 on Return on Regulated Equity (2013-2020)



Ofgem 2019-20 RIIO-1 network performance data⁴¹

59. This repeats the pattern of previous price controls. Ofgem considers historical levels of totex spend compared to levels assumed in the price control cost models and uses it to assess and calculate an impact on RoRE. It found that between 2000 and 2020 and a sample of 943 observations (licensee-years) across water, energy and aviation, the average level of underspend was 7%.

³⁷ Ofgem (2021) [RIIO-ET1 Network Performance Summary 2019-20](#)

³⁸ Ofgem (2021) [RIIO-GT Network Performance Summary 2019-20](#)

³⁹ Ofgem (2021) [RIIO-GD1 Network Performance Summary 2019-20](#)

⁴⁰ Ofgem (2021) [RIIO-ED1 Network Performance Summary 2019-20](#)

⁴¹ Ofgem (2021) [Supporting data file to Regulatory financial performance annex to RIIO-1 Annual Reports - 2019-20](#)

60. We believe that high-performing companies, delivering exceptional service for consumers, should be able to enjoy strong returns. However, we, like Ofgem in RIIO-1, do not expect that all network companies should receive high returns.

*"well performing GDNs can earn post-tax real double-digit returns on (notional) equity, and GDNs who perform poorly would be exposed to returns at or below the cost of debt."*⁴²

In a well-calibrated price control settlement, we would expect to see companies' performance distributed *around* the allowed Cost of Equity. That companies are generally distributed *above* the allowed Cost of Equity demonstrates the structural outperformance.

Ofgem's RIIO-2 decisions are too generous to the network companies

61. We maintain, as we previously argued in response to RIIO-2 Draft Determinations⁴³ that Ofgem's Draft Determinations and subsequent Final Determinations, although going some way to address excessive outperformance stemming from Cost of Capital assumptions, were still significantly generous and will allow windfall gains which dis-incentivise companies pursuit of more challenging company targets. This is unfair to consumers and increasingly unsustainable in the context of pressures of COVID-19 recovery and funding Net Zero. We think it is important that the CMA consider this context for Ofgem's decision.

62. Citizens Advice do not agree with a number of decisions that Ofgem has made in Final Determinations - particularly the changes from Draft Determinations on Cost of Equity and cutting the Outperformance Wedge in half. We provide further details on this in our discussion around the Cost of Equity appeal ground.

63. However, from our perspective, Ofgem has followed due process and already addressed many of the preferences put forward by the appellants. Ofgem has provided balanced recognition of evidence provided and could equally have provided greater consideration of a lower Cost of Equity and larger Outperformance Wedge.

⁴² Ofgem (2012) [RIIO-GD1: Final Proposals - Overview](#), p38

⁴³ Citizens Advice (2020) [Citizens Advice response to RIIO-2 Draft Determinations for Transmission, Gas Distribution and Electricity System Operator](#)

Lower returns well signalled and understood

64. RIIO-2, like PR-19 in water, is a step change by regulators to better align investor incentives with consumer service outcomes.
65. It is the responsibility of regulators to continually pursue this objective and improve price control mechanisms. Examples of this are continual updating of the CAPM model and introducing an enhanced consumer engagement process. As mentioned earlier, we believe this step change was necessary.
66. Initiatives in water and energy price controls to tackle structural outperformance were highly predictable for investors given the signposting from regulators in PR19⁴⁴ and the lengthy RIIO-2 process, including the RIIO-2 Sector Specific Methodology Document and Draft Determinations and then ultimately the Final Determinations. As a result, the step change in Cost of Capital is within scope of regulators and has been clearly communicated. During the following period there has been no evidence of an exodus of capital by investors.

Differences between energy and water appeals

67. We believe the PR19 Draft Determination proposed Cost of Capital by the CMA will have encouraged energy companies to appeal the RIIO-2 settlements. Energy companies are able to 'cherry-pick' which issues to appeal upon, whereas parties with contrary views do not have the same incentive, or the resources, to appeal. This leads to an asymmetric process, with only issues where appealing is favourable to the networks being addressed. As the scope of the appeal in energy is solely defined by the appellant this does not naturally afford the CMA the ability to seek expert stakeholder views on the grounds that are reopened or other potential issues. This has the potential to lead to an overall package skewed against consumer interests.
68. The CMA states in its determination on RIIO-1 appeals *"we accept that it may in some circumstances be necessary to take care that overturning one aspect of a complex regulatory decision does not have knock-on consequences for other, unappealed aspects of the Decision ... we have not limited ourselves to errors of law*

⁴⁴ Ofwat (2015) [Towards Water 2020 – policy issues: regulating monopolies](#)

or judicial review grounds, but have duly taken the merits of the case into account when considering whether any of the statutory grounds of appeal is made out.”

69. We expect this means the CMA will consider the regulatory and consumer context and implications for future price controls when considering possible changes to Ofgem’s decision. As Ofgem notes:

“...there are imperatives, to keep the impact on energy bills affordable. Given the vital areas of investment necessary to meet decarbonisation goals over RIIO-T2, and the deterioration in energy bill affordability for many consumers”⁴⁵

70. Given this and the asymmetry in the appeal process, we would encourage the CMA to consider carefully the evidence thresholds required to allow the network companies additional returns without any related service improvement.

71. A further difference compared to the water sector appeal is that this is not a redetermination. The Energy Licence Modification Guidance is explicit that:

“The CMA will not allow an appeal merely because it would not have reached that decision had it been the regulator”⁴⁶

72. The CMA’s Final Determinations in the RIIO-ED1 appeals also set out guidance on the standard of review:

“3.26 In relation to the review of Ofgem’s exercise of discretion, in paragraph 5.11 of the E.ON decision, the CC stated that:

As a specialist appellate body charged with considering whether a decision of Ofgem is wrong, the function of the CC is to provide accountability in relation to the substance of code modification decisions. However, leaving to one side errors of law, it is not our role to substitute our judgment for that of Ofgem simply on the basis that we would have taken a different view of the matter were we the energy regulator.

3.27 Further, the CC took the view that the statutory test:

⁴⁵ Ofgem (2020) [RIIO-2 Final Determinations Electricity Transmission System Annex \(REVISED\)](#) p47

⁴⁶ CMA (2017) [Energy Licence Modification Appeals: Competition and Markets Authority Guide](#) p7

clearly admits of circumstances in which we might reach a different view from Ofgem but in which it cannot be said that Ofgem's decision is wrong on one of the statutory grounds. For example, Ofgem may have taken a view as to the weight to be attributed to a factor which differs from the view we take, but which we do not consider to be inappropriate in the circumstances.

3.28 We consider that these observations are equally apposite for the standard of review which we must apply in the present context.”⁴⁷

73. We believe this means that the CMA should allow an appropriate level of discretion to Ofgem in these appeals. The CMA should take into account the asymmetry, in favour of the network companies, of the appeal process in energy when deciding what the appropriate level of discretion is. Citizens Advice believes the appeal grounds fall within an appropriate range of regulatory judgment in this context.

⁴⁷ CMA (2015) [British Gas Trading Limited v The Gas and Electricity Markets Authority Final Determination](#) p17

Ground 1: Cost of Equity

74. In its Final Determinations, Ofgem decided that the Cost of Equity had fallen from 7.8% (on a CPIH-real basis), at the RIIO-1 price control, to 4.55%, at RIIO-2. Ofgem said that this decision was “fair, based on market evidence, and [...protected] the interests of existing and future consumers, while having regard to the need to secure that companies are able to finance their activities”⁴⁸. This was an upward revision of the Cost of Equity since Ofgem’s RIIO-2 Draft Determination, of 4.2% on the same basis.
75. In response to this, 9 energy companies have appealed against Ofgem’s Cost of Equity decision, on grounds that it *“does not maximise consumer welfare”*, that it will result in a *“loss of consumer welfare”*, and will *“materially harm consumers”*. This is because it *“undermines investment and incentives”*, will result in *“under-investment”*, *“risks that investment will be disabled”*, will result in firms *“not being able or failing to attract investment”*, and *“fails to consider Ofgem’s Sustainability Objectives”*.⁴⁹
76. Furthermore, the companies say that Ofgem’s approach made *“selective and unbalanced use of evidence”*, had *“not given due consideration to evidence”*, represented a *“failure to consider or have regard to evidence”*, *“made unbalanced judgements”*, is *“inconsistent with financial theory and regulatory precedent”*, is *“contrary to well-established principles”*, *“disregards academic thought, evidence, and precedent”*, *“departs from previous approaches”*, exhibits *“downward bias and skew”*, and had *“no adequate justification”*.
77. Citizens Advice disagrees with these claimed reasons for appealing against Ofgem’s decision. In particular, Citizens Advice agrees with Ofgem that its overall determination has met their statutory duty, based on market evidence, and considered the interests of existing and future consumers, while having regard to the companies being able to finance their activities. Moreover, whilst accepting Ofgem’s decision was within the bounds of regulatory judgement, Citizens Advice considers that Ofgem’s determination of the Cost of Equity was too high, and therefore excessively generous to the companies while not sufficiently fair to the interests of existing and future consumers.

⁴⁸ Ofgem (2020) [RIIO-2 Final Determinations – Core Document](#), Ofgem, §2.22.

⁴⁹ See Table 1 at the end of this section (“Overall claimed harm”).

78. We believe Ofgem has followed due process in considering representations from parties. Ofgem did not provide a detailed response in its RIIO-2 Final Determinations to Citizens Advice and other stakeholders, such as the RIIO-2 Challenge Group, arguing for approaches that would produce a lower Cost of Equity. However, Ofgem did engage with the key arguments put forward by stakeholders. We believe this is proportionate and also demonstrates that arguments supporting a lower Cost of Equity were not given greater weight by Ofgem than those supporting a higher Cost of Equity.
79. 'Regulatory precedent' does not, and cannot, mean that Ofgem is unable to change its approach. Regulators have successively developed and updated their application of the CAPM, and supporting price control framework, across the water and energy sectors to try and better align company interests with consumers. For example, the Information Quality Incentive was introduced in RIIO-1 to address structural outperformance. It is clearly within the scope of a sectoral regulator's discretion to develop and continually update its approach to reflect the most up to date thinking and evidence. Indeed, it is the regulator's duty to do so.
80. Citizens Advice has engaged extensively with Ofgem throughout RIIO-2, in particular, in response to Ofgem's 2020 RIIO-2 Draft Determinations, as well also with the CMA's determinations for the 4 companies that appealed Ofwat's PR19 price controls. We explain our reasons for seeking to intervene in the appeals for below, on each of the components of the Cost of Equity. We also summarise and detail the companies' corresponding stated reasons for appeal.

The risk-free rate (RFR)

81. Ofgem's Final Determination found that the forecast risk-free rate for the RIIO-2 period (2022-26) was -1.58% (on a CPIH-real basis), based on forecast UK Index-Linked Gilt ("ILG") returns. This approach was on the basis that: *"We [...] recognise that AAA-rated corporate bonds are low risk, in line with CMA's PR19*

[Provisional Findings]. However, the overwhelming weight of academic theory and of suggested practice, regarding RFR estimation, supports the use of ILGs.”⁵⁰

Citizens Advice agreed with and supported Ofgem’s approach.

82. The appealing companies nevertheless argue that Ofgem set the RFR too low, on grounds that Ofgem’s approach *“relied exclusively on ILGs”, was “wrong to disregard AAA-corporate bonds”, as “governments can borrow at far lower rates [than corporate borrowers] and [ILGs] ignore the ‘convenience premium’”* and therefore that *“Government bonds are below the ‘true risk-free rate’⁵¹*. The appealing companies sought to rely in particular on the conclusions of the CMA’s PR19 Provisional Findings.

83. The CMA’s PR19 Provisional Findings concluded that *“on the balance of evidence”, the CMA considered “AAA-rated non-government bonds to be a suitable input into our estimate of the RFR”, on the basis that economic/finance theory “requires that all market participants can both borrow and lend at the same price, and that all debt is considered as risk free”, but “the investors in water companies cannot [...] be assumed to be able to borrow at the risk-free rate, if it is set at the UK ILG rate”.⁵²*

84. In response to the CMA, Citizens Advice said that it strongly disagreed with the CMA’s conclusions and reasoning, in particular, highlighting that *“the cost of borrowing by low-risk investors is not ‘another’ way of estimating the return on a zero-beta asset [as...] On the contrary, it will always over-estimate the return on a zero-beta asset, i.e. the RFR”⁵³*.

85. Subsequent to the RIIO-2 appeals, the CMA has published its PR19 Final Determinations and says that it now *“[calculates] an RFR by placing weight on both long-tenor index-linked gilts and AAA-rated non-government bonds”⁵⁴*, resulting in an RFR determination of -1.34%. The CMA set the bottom of its RFR range as the *“6-month average of the UK 20-yr ILG”* (of -1.63%) and the top of its range as the

⁵⁰ Ofgem (2020) [RIIO-2 Final Determinations – Finance Annex](#), §3.13.

⁵¹ See Table 1 below (“Risk-free rate (RFR)”).

⁵² CMA (2020) [PR19 Provisional Findings](#), §9.75, §9.86, §9.93.

⁵³ Citizens Advice (2020) [Response to Ofwat Price Determinations – CMA provisional findings](#)

⁵⁴ CMA (2021) [Anglian Water Services Limited, Bristol Water plc, Northumbrian Water Limited and Yorkshire Water Services Limited price determinations: Final report, Competition & Markets Authority, 2021 \(“CMA PR19 Final Determinations”\)](#), §85.b.

6-month average of the *"IHS iBoxx £ Non-Gilt AAA 10+ and 10-15 indices"* (of -1.05%). The CMA then determined the RFR as the mid-point of this range (i.e. simple average).

86. Citizens Advice welcomes the CMA's partial change of position, but nevertheless maintains that the CMA was wrong to attach any weight to corporate bonds in its estimate of the RFR.

The Total Market Return (TMR)

87. Ofgem's RIIO-2 Final Determination decided on a TMR range of 6.25% to 6.75% (CPIH real basis), with a mid-point of 6.5%.
88. In comparison, in its recent PR19 Final Determinations, the CMA decided on a range for the TMR of 6.2% to 7.5%, and mid-point of 6.81% (on a CPIH real-basis).
89. Citizens Advice considers that Ofgem's (and the CMA's) TMR determinations are too high.
90. In contrast, the appealing companies claim, that Ofgem's TMR is *"too low"*, on the basis that it *"departs from precedent"*, uses *"narrow evidence"*, uses an *"incorrect inflation method [known as 'back-cast CPIH']"* and/or *"relies excessively on CPIH"*, and uses a *"biased or inappropriate averaging method"*⁵⁵.
91. Ofgem's Final Determination followed from its thinking at its earlier RIIO-2 consultation documents. At Ofgem's 2018 RIIO-2 Framework Consultation, Ofgem said that it proposed to estimate the TMR *"by considering the historical long-run average of market returns as the best single objective estimate of investors' expectations of the future, [...] taking into account recent decisions by other sector regulators, including Ofwat and the CAA, and the recommendations on the 2018 UKRN Cost of Capital report"*⁵⁶. In Ofgem's subsequent RIIO-2 Framework Decision, Ofgem said that it has *"decided to implement our preferred TMR approach – that the*

⁵⁵ See Table 1 below ("Total Market Return (TMR)").

⁵⁶ Ofgem (2018) [RIIO-2 Framework Consultation](#), §3.44.

best objective measure of TMR is the long-run outturn average, while also placing due weight on forward-looking approaches”⁵⁷.

92. At Ofgem’s later 2019 RIIO-2 Sector Specific Methodology Decision, Ofgem said that it *“continued to believe that the UKRN Study provides a robust recommendation that the TMR is between 6% and 7% CPIH real”* and to *“re-present [Ofgem’s] TMR range of 6.25% to 6.75% CPIH-real as a working assumption [...], which we believe is conservative in light of the range of reasonable evidence”⁵⁸.*
93. At Ofgem’s subsequent 2020 RIIO-2 Draft Determinations, Ofgem noted the cross-sector importance of TMR and that Ofgem had already referred the TMR issues identified in the RIIO-2 process to the CMA in the CMA’s price determination for NATS En-route Limited (NERL)⁵⁹. Ofgem said that it remained of the view that a TMR range of 6.25% to 6.75% (CPIH-real) was appropriate for the RIIO-2 price controls but would consider the CMA’s final view alongside stakeholder responses to the Draft Determinations, before making its Final Determinations for RIIO-2⁶⁰.
94. In response to the Ofgem’s Draft Determinations, Citizens Advice said that it considered that Ofgem’s proposed TMR range of 6.25%-6.75% (CPIH-real) was conservative, i.e. too high, and thereby likely to overstate the true TMR⁶¹. Citizens Advice responded to Ofgem – and likewise to the CMA’s PR19 Provisional Findings – that:

“The TMR should not just be based on the average returns on UK equities, but ideally on the average returns on a wider and more diversified portfolio of investments, namely, including bonds, property, infrastructure, private equity, and other such assets that are all readily available to the typical investors in UK energy and water network companies. Such a portfolio is necessarily more diversified than UK listed equities alone, therefore a much better fit for the CAPM’s requirement that the ‘market portfolio’ should represent the most diversified (and readily available) portfolio of investments to relevant

⁵⁷ Ofgem (2018) [RIIO-2 Framework Decision](#), §3.45.

⁵⁸ Ofgem (2019) [RIIO-2 Sector Specific Methodology Decision – Finance](#), §3.103-3.104.

⁵⁹ Ofgem (2020) [Consultation - RIIO-2 Draft Determinations – Finance Annex](#), §3.16.

⁶⁰ *ibid*, §3.22-3.23.

⁶¹ Citizens Advice (2020) [Ofgem consultation on RIIO-2 Draft Determinations – Finance Section, Citizens Advice submission](#)

investors. Such a portfolio is also likely to exhibit lower average returns than equities alone, owing to the inherently geared nature on average of equities. [...]

Correspondingly, estimation of water company betas with respect to UK equities alone is likely to result in overestimation of the relevant non-diversifiable risk. This is because the risk associated equities – assumed by the UKRN report as having a beta of 1 – itself represents a diversifiable risk, especially from the perspective of highly sophisticated global investors. Hence, water company betas estimated with respect to UK equities should represent at most an upper bound estimate."

95. As evidence of the long-run average returns on such a wider portfolio of assets, Citizens Advice recommended in particular the widely acclaimed research of economist Professor Thomas Piketty, who finds that the real "pure return on capital" – a measure based on very long-run directly observable historic averages of return on all capital (including land and real estate, infrastructure, private equity, and other non-listed assets) – is in the range 3-4%.
96. Ofgem did not specifically respond to Citizens Advice's position in its Final Determinations.
97. In responding to Citizens Advice's submissions to the CMA, the CMA said that it "[agreed], in principle, with Citizens Advice that the relevant return under the CAPM is that on the whole portfolio of investable assets"⁶². The CMA nevertheless rejected Citizens Advice's proposed approach on grounds that:

"First, [...] Piketty's data and analysis is contested and has necessarily been assembled from a broad range of historical sources, some of which are incomplete.

Second, an approach which used Piketty's dataset of returns would also need to use the same returns information in order to calculate beta. [...]

We do not agree that betas derived from a broader asset portfolio would necessarily be lower than those derived from stock market return data since

⁶² CMA (2021) [PR19 Final Determinations](#), §9.283.

*the actual impact on water company beta estimates would depend on the extent to which returns on non-equity assets were correlated with the returns on equity assets. For some types of assets, eg bonds, their returns may exhibit a low/inverse correlation with stocks, but for other asset classes, such as property, this may not be the case.”*⁶³

98. The CMA therefore said that “*In the absence of more robust evidence*”, it had decided that “*it is more appropriate to maintain the existing, established approach of using equity market returns and betas to calibrate the CAPM*”. Overall, the CMA said that in coming to a view on a reasonable range of TMR estimates, it placed most weight on the historic ex post and historic ex-ante approaches⁶⁴.

99. In comment, Citizens Advice disagrees with the CMA’s reasons for rejecting Citizens Advice’s evidence for estimating the TMR.

100. First, the fact that Professor Thomas Piketty’s data and analysis has been assembled from a broad range of historical sources is a virtue – not a defect – as it makes Piketty’s data series far more complete and more extensive than other sources of historic returns data. The distinctiveness and comprehensiveness of Piketty’s data and analysis has also been widely recognised⁶⁵.

101. Second, an approach which used Piketty’s dataset of returns would not be required to use the same returns information in order to calculate beta. This is because – as Citizens Advice explained to Ofgem and the CMA – UK equities are just one component of a wider and more diversified portfolio of all investable assets, and that such a portfolio is necessarily more diversified than UK public listed equities alone. Hence, such a portfolio would be expected to be a far better fit for the CAPM’s requirement that the “market portfolio” should represent the most diversified (as well as readily available) portfolio of investments to relevant investors.

102. Accordingly, estimation of energy or water company betas with respect to UK equities alone is likely to result in overestimation of the relevant non-diversifiable risk. This is because the risk associated with equities itself represents a

⁶³ ibid §9.283.

⁶⁴ ibid, §9.393.

⁶⁵ For example, see https://en.wikipedia.org/wiki/Capital_in_the_Twenty-First_Century.

diversifiable risk, especially from the perspective of highly sophisticated global investors, such as current investors in the UK energy and water companies. Hence, energy and water company betas estimated with respect to UK equities should represent at most an upper bound beta estimate, i.e. maximum non-diversifiable risk estimate.

103. The CMA suggests that this conclusion might not be the case because, while returns on some other assets, e.g. bonds, may exhibit a low or inverse correlation with equities (i.e. would result in a more diversified portfolio than equities alone), *"for other asset classes, such as property, this may not be the case"* (i.e. would result in less diversified portfolio than equities alone).
104. However, unless energy and water company equity returns were more correlated with the returns of such other assets – e.g. property – than with returns on equities in general, then such a result would not be mathematically possible. The CMA nevertheless offers no reason though why energy and water equity returns might be more correlated with property returns than with other equities. This result also seems unlikely. This result could nevertheless be tested. We believe that it would be shown to be false, thereby confirming that the CMA is likely to have overestimated the applicable TMR.

The energy company equity beta

105. Ofgem's RIIO-2 Final Determination decided on an energy company asset beta of 0.349, unlevered beta of 0.311, and notional equity beta of 0.759, at slightly higher than at Ofgem's Draft Determination⁶⁶.
106. Correspondingly, the CMA's PR19 Final Determinations decided on a water company unlevered beta of 0.29 and notional equity beta of 0.71⁶⁷.
107. In response to Ofgem's Final Determination, the appealing companies objected to Ofgem's finding, say that its beta *"does not properly reflect systematic risk"*, *"wrongly relied on water companies (which have lower risk)"*, puts *"undue*

⁶⁶ Ofgem (2020) [RIIO-2 Final Determinations – Finance Annex](#), §3.

⁶⁷ Ibid, Table 7.

reliance on 10-year averages" and "insufficient weight on National Grid's beta", uses "inappropriate comparators", and "fails to account for structural breaks".

108. In response to Ofgem's Draft Determinations, Citizens Advice said that Ofgem should apply an asset beta of at most 0.30, rather than 0.34-0.39, and a corresponding notional equity beta of at most 0.56, rather than 0.66-0.79⁶⁸.
109. Citizens Advice relied in particular on the long-run raw betas estimated at Appendix G of the UKRN Cost of Capital Report⁶⁹, known as the "Wright and Robertson Report"⁷⁰, of 0.3-0.5. On the basis of these, Ofgem's asset betas would fall from 0.36 to 0.21-0.30, and notional equity betas from 0.71 to 0.33-0.55.
110. In the 2019 RIIO-2 Sector Specific Methodology Decision, Ofgem proposed to estimate "forward-looking" equity betas for the regulated network companies by looking at the historical correlations between the share prices of listed regulated utilities and stock market indices, such as the FTSE All-Share index, following the methods described in the UKRN Cost of Capital Report⁷¹.
111. In the subsequent RIIO-2 Draft Determinations, Ofgem has said that *"given the uncertainty of any beta estimate, Ofgem has considered a range of estimation approaches and averages" – based on "raw equity beta estimates for SSE, National Grid plc (NG), Pennon (PNN), Severn Trent (SVT) and United Utilities (UU), using a combination of estimation windows and averaging periods" – and that "such raw equity betas indicate a majority of the values between 0.55 and 0.70"*⁷².
112. Furthermore, the Draft Determinations found that the systematic risk (relevant to estimating beta) of GB energy networks is similar to the corresponding risk for GB water networks, based on work by CEPA, and therefore that the beta (and overall allowed return on capital) for the energy and

⁶⁸ Citizens Advice (2020) [Ofgem consultation on RIIO-2 Draft Determinations: Executive Summary, General Comments and Core Section, Citizens Advice submission.](#)

⁶⁹ UKRN (2018) [Estimating the Cost of Capital for implementation of price controls by UK Regulators: Report for UKRN](#), by Stephen Wright, Phil Burns, Robin Mason, and Derry Pickford, 2018 ("the UKRN Cost of Capital Report").

⁷⁰ *ibid*, Appendix G: Beta Estimation for CAPM-WACC at Long Horizons, by Stephen Wright and Donald Robertson (the "Wright and Robertson report").

⁷¹ Ofgem (2019) RIIO-2 Sector Specific Methodology Decision – Finance, §3.106.

⁷² Ofgem (2020) Consultation - RIIO-2 Draft Determinations – Finance Annex, §3.32-3.33.

water companies should also be similar⁷³. Citizens Advice strongly agreed therefore with Ofgem's conclusion that, on the basis of CEPA's report, *"pure-play energy networks in GB have several similar risk characteristics as pure-play GB water networks, suggesting that [the pure-play water companies Severn Trent (SVT) and United Utilities (UU)] are appropriate comparators for estimating betas for pure play GB energy networks"*⁷⁴.

113. Citizens Advice also said that it agreed with Ofgem that RIIO-2 should seek to determine the *"forward-looking"* betas for the regulated energy network companies focusing on the *"longest horizon available"*⁷⁵, namely the betas for the RIIO-2 price control review period for long-term investors. This UKRN Cost of Capital Report recommends the same use of *"fairly long horizons, for example, 10 years"*.

114. This is because the systematic risk (and associated beta) of regulated network companies varies considerably by time. In general, systematic risk is considerably lower for long-term investors than for short-term investors, especially for the equities and bonds of regulated utility companies. This is owing to short-term movement in equity and bond prices being strongly correlated with overall market indices, in contrast to longer-term variation in prices and underlying financial performance.

115. Systematic risk and beta can also vary materially by time period, for example, by regulatory price control review period. This is primarily the result of changes in the regulatory and policy framework, such as changes in the price control setting mechanisms. This is highly relevant for determining beta for RIIO-2 (and PR19) owing to introduction of new uncertainty mechanisms ("UMs") at both RIIO-2 and PR19, which provide additional protection to investors against systematic risk, by transferring systematic risk from energy and water company investors to customers, for example, in the case of RIIO-2:

"Overall, the RIIO-2 price control exhibits lower systematic risk than previous controls, with lower sharing factors and a narrower [Return on Regulatory

⁷³ *ibid*, §3.57.

⁷⁴ *ibid*, §3.49.

⁷⁵ *ibid*, §1.8.

*Equity (RoRE)] range [...than] RIIO-1."*⁷⁶

116. In the UKRN Cost of Capital Report, three out of the four report authors argued for the importance of using longer-term data and at lower frequencies, as being more relevant to the long-term horizons applied by the regulators⁷⁷, and accordingly, that *"regulators should take very seriously the implications of lower values of equity betas, and hence asset betas"*⁷⁸.
117. The UKRN report includes an appended report – the Wright and Robertson Report – on estimation of beta at longer horizons, which argues that *"if [UK utility regulators] are concerned to assess the nature of systematic risk at long horizons, [they] should ensure that our estimation techniques are consistent with that horizon [whereas, in contrast...] what is now standard practice in beta estimation: the use of relatively short (2- 5 year) samples of, usually daily data [...] reflects the relatively short-term objectives of most users of estimated betas in the finance industry"*⁷⁹
118. Accordingly, the Wright and Robertson Report specifically argues for estimation of beta based on *"longer-term data and at lower frequencies"*, on grounds that this is *"more relevant to the long horizons used by regulators"*, and that this *"results in distinctly lower equity beta estimates"*, namely, of raw equity beta estimates in the range 0.3-0.5 – and towards 0.3 at lower estimation frequencies – on the basis of United Utilities and Severn Trent Water, the same 2 listed water companies on which Ofwat and Ofgem rely on for their beta estimates⁸⁰.
119. Moreover, energy and water companies should be expected – "ex ante" – to have low betas, owing to the absence of the sensitivity of the energy and water companies to the general economic cycle and/or to other economy-wide

⁷⁶ Ofgem (2020) Consultation - RIIO-2 Draft Determinations - Core Document, §6.11 and §2.15-2.16.

⁷⁷ The fourth (dissenting) author is a Director of consulting firm Frontier Economics, and therefore might appear to have a strong interest in resisting any methodology that leads to lower beta estimates, given Frontier Economics' role advising many of the regulated water and energy companies (including four of the appealing energy companies, plus the Energy Networks Association).

⁷⁸ UKRN (2018) Cost of Capital Report, page 9.

⁷⁹ *ibid* page G-139.

⁸⁰ *ibid* page 9.

economic shocks. This reflects a combination of reasons, most of which were already identified in detail by Ofwat and Ofgem, in particular that:

- energy and water are non-cyclical economic sectors, with neither revenues nor costs likely to vary materially, or at all, with the wider economy;
- the energy and water regulatory regimes substantially protect investors from systematic risk (they also substantially protect investors from most non-systematic risks (also known as “diversifiable” or “idiosyncratic” risk); and
- both RIIO-2 (and PR19) add a series of new mechanisms that further protect investors from systematic risk (namely, transfer risk from investors to customers).

120. Recent evidence highlights the relative insensitivity of the energy and water sectors to general economic factors, namely, the impact of COVID-19, which appears to have impacted the energy and water companies’ share prices far less than UK equities as a whole.

121. Citizens Advice has previously highlighted the relative outperformance of listed water companies. It stated that from January to November 2, the FTSE had fallen 16%, whereas the listed water companies were up 2%. From the start of the year to mid-March, which showed the steepest drops as a result of COVID-19, the FTSE fell 32% compared to the water companies falling 8%⁸¹.

122. Uncertainty mechanisms in RIIO-2 lower network companies’ exposure to risk. They shift risk onto consumers in two ways. Firstly, further costs will be added to bills to pay for reopeners and uncertainty, which makes consumer bills less predictable, for example the open-ended £10 billion Net Zero re-opener and the Strategic Investment Fund for areas including: EV rapid charging, connecting additional offshore renewables, and other Net Zero-related projects. Based on Ofgem’s Draft Determinations with a lower Cost of Capital than in Final Determinations, we calculated these mechanisms could add to consumer bills

⁸¹ CMA (2021) [Anglian Water Services Limited, Bristol Water plc, Northumbrian Water Limited and Yorkshire Water Services Limited price determinations: Final report, Competition & Markets Authority, 2021 \(“CMA PR19 Final Determinations”\) §4.584](#)

between £6.15 and £24.61 using a capitalisation rate of 90 per cent, and between £8.37 and £33.48 using a capitalisation rate of 80 per cent.⁸²

123. Secondly, these further costs are likely to have greater time urgency and so potentially less scrutiny. This provides scope for broader adjustments to the price control to protect investors if required. We support the increased use of uncertainty mechanisms but note that it transfers risks, previously borne by energy companies, on to consumers. This supports a lower equity beta.

124. For example, Ofwat and Ofgem have also previously highlighted that: “[Water and energy] companies’ exposure to unanticipated cost shocks is limited to the extent that there are regulatory mechanisms that can be used to deal with them for example in the water sector the interim determination and substantial effect mechanisms” noting of course that “these mechanisms are not designed to subsidise inefficiency”⁸³.

125. Citizens Advice made similar submissions in response to the CMA PR19 Provisional Findings⁸⁴.

126. In Ofgem’s Final Determinations, Ofgem says that it presents analysis of unlevered betas updated for latest information as at October 2020, for the 5 publicly listed UK energy and water companies, SSE, National Grid, Pennon, Severn Trent, and United Utilities⁸⁵, then explaining that “in line with [Ofgem’s] methodology, we put more weight on larger samples of data, such as the 10-year estimation window or the 10-year average of the smaller windows. On this basis, while putting greater weight on [National Grid] than the other entities, an unlevered beta of 0.31 appears reasonable [...which] implies a mid-point for notional equity beta of 0.759”⁸⁶.

127. Citizens Advice disagrees that this result appears reasonable.

⁸² Citizens Advice (2020) [Ofgem consultation on RIIO-2 Draft Determinations: Executive Summary, General Comments and Core Section, Citizens Advice submission](#) Appendix 1

⁸³ Ofgem and Ofwat (2006) [Financing Networks: A discussion paper](#), para. 71.

⁸⁴ See Citizens Advice response to “[Ofwat Price Determinations – CMA provisional findings](#)”, October 2020; and response to “[Response to CMA consultation - Cost of capital working papers](#)”, January 2021.

⁸⁵ Ofgem (2020) [RIIO-2 Final Determinations – Finance Annex](#), Table 10.

⁸⁶ Ofgem (2020) [RIIO-2 Final Determinations – Finance Annex](#), §3.74.

128. Correspondingly, the CMA's PR19 Final Determination beta determination says that it is "based on a range of approaches of analysing the observable market data of [water and sewerage company] comparators"⁸⁷. In particular, the CMA said that it "*considered whether, as suggested by Wright and Robertson in the UKRN Report, we should place greater weight on lower frequency betas, ie monthly or quarterly estimates, than on the higher frequency figures [...but] did not find this to be a robust approach [...owing to being] more volatile than other time horizons and frequencies.*"⁸⁸ The CMA therefore included daily, weekly and monthly estimates in coming to a view on the appropriate level of beta.
129. The CMA also said that it considered Citizens Advice's submission that the beta estimates generated from historic data are likely to overstate the non-diversifiable risk faced by investors in water companies over the PR19 price control for a variety of reasons⁸⁹.
130. First, the CMA said that: "*We do not agree that the PR19 determination represents a unilateral reduction in risk for investors and, as a result, should necessarily require a lower beta than PR14. While we acknowledge the changes that Citizens Advice highlights, we also observe that Ofwat has put in place a more demanding set of performance commitments for the water companies and has significantly reduced the Cost of Capital allowance. Together these two effects may be expected to increase the variability of investor returns in response to economic cycles. The overall impact of the PR19 determination on beta is unclear at the current time.*"⁹⁰
131. Second, the CMA said that: "*We considered Citizens Advice's view that the actual beta measured does not reflect the level of non-diversifiable risk that investors face. While not explicit, we noted that this could be interpreted as an argument for using a broader index, for example a Eurostoxx or a Global index. However, we consider that in coming to a view on the Cost of Equity for a water company which conducts all of its business in the UK and generates only sterling cash flows, the most relevant data is*

⁸⁷ Ibid, §85.c.

⁸⁸ Ibid, §9.463.

⁸⁹ Ibid §9.476.

⁹⁰ Ibid, §9.477.

that from UK markets. This is consistent with the approach that we have taken to estimating the risk-free rate and the total market return.”⁹¹

132. We disagree with these reasons for rejecting Citizens Advice’s submission that the beta estimates generated from historic data are likely to overstate the non-diversifiable risk faced by investors in water companies over the PR19 price control.
133. First, the CMA provides no justification for its assertion that Ofwat having *“put in place a more demanding set of performance commitments for the water companies and has significantly reduced the Cost of Capital allowance [...] may be expected to increase the variability of investor returns in response to economic cycles”*. On the contrary, while more demanding performance commitments for the water companies and a reduced Cost of Capital allowance will of course reduce investor returns (all else equal) they will not increase the non-diversifiable risk facing the companies, as the CMA claims.
134. Second, the fact that the UK regulated water (and energy) companies conduct all of their business in the UK and generate only sterling cash flows does not mean that the relevant data for assessing the non-diversifiable risk that investors face *“is that from UK markets”* only. On the contrary, the relevant data should be from the perspective of the overall non-diversifiable risk that investors in the UK energy and water companies face – i.e. global investors investing in a highly diversified portfolio of global assets – not merely from where the companies conduct their business.
135. Overall, the CMA said that its approach to estimating the unlevered equity beta follows the broad approach used by Ofwat in PR19. Citizens Advice considers that the CMA’s approach will continue to overstate the water companies’ equity betas for the same reasons as above.

Aiming up

136. We recognise that there has been a history of regulators, including Ofgem and Ofwat, setting the Cost of Capital from the top half of an underlying range.

⁹¹ Ibid, 9.478.

That approach, however, led to a persistent and large over-remuneration of investors at the expense of customers, as is now widely accepted. Setting the Cost of Equity above the midpoint and aiming up on the Cost of Capital creates a certain – and unnecessary – cost to consumers.

137. The CMA agrees that expectations of future excess returns will tend to be capitalised in current share prices: *“A high return on existing assets may result in a premium for current shareholders, if it is expected to continue over multiple periods.”*⁹² In any event, maintaining investors’ confidence that the UK energy sector will continue to generate excessive returns is of course not a legitimate objective or consistent with Ofgem’s and the CMA’s financing duty. Investors must be confident merely that they will receive a rate of return equal to a robust – and central – estimate of the Cost of Capital assuming acceptable performance but no more than this. Consumers must similarly have confidence that regulators will protect their interests, in accordance with regulators’ primary duty.

138. Accordingly, the regulatory approach of setting the Cost of Capital from the top half of a range – along with multiple other conservative assumptions – has now been discredited, following the historic experience, and as documented in various reports by the UKRN⁹³ and NAO⁹⁴, among others.

139. Indeed, as evident from RII01 the greater problem that Ofgem faces is not exit of capital from the energy sector, but too much capital, namely, that the Regulatory Capital Value (RCV) *“may also contribute to a bias towards capital-intensive solutions where they may not be optimal”*⁹⁵. This can contribute to investment behaviour that does not protect customers and environmental objectives, for example in favouring network reinforcement over flexibility options. Where allowed, companies’ add to their RCV, allowing receipt of further returns in excess of the Cost of Capital. As the CMA notes: *“a higher Cost of Capital [...] provides incentives for existing investors to put in new equity or forego*

⁹² CMA (2021) [Water Redeterminations 2020: Choosing a point estimate for the Cost of Capital – Working Paper](#), para. 38.

⁹³ UKRN (2018) [Estimating the Cost of Capital for implementation of price controls by UK Regulators](#)

⁹⁴ NAO (2020) [Electricity Networks](#)

⁹⁵ Ofwat (2015) [Financeability and the asset base](#), p17

*dividends and grow the RCV*⁹⁶. This is evidence alone that the allowed return on capital materially exceeds the Cost of Capital and that the companies expect it to stay that way.

140. Energy network companies, with a low but steady return on investment are highly desirable. At Ofgem's recent Open Meetings for the RIIO-2 price controls, the chair of Ofgem's independent Challenge Group, Roger Witcomb, said his group has had discussions with investors (who he described as "neutral") who are satisfied that Ofgem's proposed Draft Determination regime provides adequate incentive to invest⁹⁷.
141. It is argued that aiming up is necessary because the risk to consumers of setting a Cost of Capital too low exceeds the risk of setting it too high. This is primarily because it will impact future investment. We have seen no evidence that this is the case, with plenty of evidence to the contrary. We would draw attention to the Market-Asset-Ratios that we discuss under the Outperformance Wedge Ground. This provides clear evidence that outperformance is expected. The proposed purchase of WPD by National Grid is a recent piece of evidence. The purchase price implies at least a 60% premium to RAV. Ofgem had already indicated that the financial methodology for the next electricity distribution price control will be similar to the other RIIO-2 settlements. This means it is fair to assume that National Grid believes it can significantly outperform under the financial methodology.
142. As described above, we believe that Ofgem has been generous to the networks companies with regards to the components of the CAPM. Whilst we recognise Ofgem has discretion to exercise regulatory judgement in these areas, it should be taken into account that Ofgem has therefore already implicitly 'aimed up' in setting the Cost of Equity. Indeed Ofgem stated in the Final Determinations:
- "Our final view in these FDs is arguably consistent with a degree of aiming up"*
143. No further aiming up should be allowed.

⁹⁶ CMA (2021) [Water Redeterminations 2020: Choosing a point estimate for the Cost of Capital –Working Paper](#), para. 38.

⁹⁷ Ofgem (2021) [National Grid Transmission RIIO-2 Open Meetings Transcript](#)

144. CMA energy appeals – Cost of Equity/aiming up

Table 1: Cost of Equity: Summary of energy company grounds for appeal

	Cadent Gas	National Grid Electricity/Gas	Northern Gas	Scottish Hydro Electric	Southern Gas/ Scotland Gas	SP Transmission	Wales & West Utilities
Overall claimed harm	Risk that investment will be disabled; Does not maximise consumer welfare	Undermines investment; Drive up future Cost of Equity; Materially harms consumers	Under-investment; Loss of consumer welfare	Fails to attract investment	Not able to attract investment	Fails to consider Ofgem Sustainability Objectives	Undermines incentives; Harms consumer welfare; Risks future investment
Cost of Equity (CoE)	Selective and unbalanced use of evidence; Inconsistent with financial theory and regulatory precedent	Not given due consideration to evidence; Made unbalanced judgements; Contrary to well-established principles; Downward bias	Disregards academic thought, evidence, and precedent; Downward skew	Lowest ever	Failure to consider evidence	Failure to have regard to evidence	No adequate justification for policy changes; Departs from previous approaches
Risk-free rate (RFR)	Relied exclusively on index-linked gilts (ILGs)	Use of ILG spot yields; Wrong to disregard AAA-corporate bonds	Reliance on ILGs; Wrongly disregards AAA-corporate bonds	Reliance on ILGs; Disregards AAA-bonds; SONIA wrong cross-check	Sole reliance on ILGs (governments can borrow at far lower rates and ignores	Sole reliance on ILGs	Government bonds below the “true risk-free rate”; Investors can borrow and lend at the RFR

					"convenience premium"		
Total Market Return (TMR)	Solely used back-cast CPI; Used single approach to averaging	Departs from precedent; Narrow evidence; Averaging	Relies excessively on CPIH; Inappropriate averaging	Reliance on CPI	Reliance on CPI; Biased averaging method	Reliance on CPI;	Incorrect inflation measure; Biased averaging technique
Equity beta	Does not properly reflect systematic risk	Insufficient weight on NG beta; Over-reliance on water; Undue reliance on 10-year average	Failed to consider systematic risk profile; Too much reliance on water; Failure to account for structural breaks	Wrongly relied on water companies (which have lower risk)	Too much weight on water	Too much weight on water; Undue reliance on 10-year average	Inappropriate comparators; Invalid 10-year estimation window
Aiming up	Asymmetric risks of setting CoE too low; Disregards well-established regulatory approach	Disregards precedent	Rejects regulatory precedent	Wrongly dismisses asymmetric risk		Wrongly dismisses asymmetric risk	Well established that regulators should "err on the side of caution"
Cross-checks	Invalid	Misapplied	Basic errors		Basic errors	Inappropriate/flawed	Error
Expert witness statements	Oxera	Frontier Economics	KPMG	Oxera	KPMG	KPMG	Oxera

Source: Energy company notices of appeal.

Ground 2: Outperformance Wedge

Introduction

145. Ofgem's use of an Outperformance Wedge adjustment in its calculation of the allowed return on equity represents a significant improvement in the way regulators determine the level of profits network companies can earn.
146. It provides a theoretically robust solution to a key failing of previous calculations of the allowed return on equity: that information asymmetry has enabled companies to persistently earn a higher level of profit than that required by investors to finance the companies, which has resulted in consumers paying billions more than necessary.⁹⁸
147. The need to address the problem of historically inefficient high levels of return earned at the expense of consumers has been recognised by consumer groups, the National Audit Office⁹⁹ and House of Commons Energy and Climate Change Committee.¹⁰⁰
148. Citizens Advice considers the Outperformance Wedge to be an important development in the methodology used by regulators to determine the allowed return on equity (albeit that in Citizens Advice's view the amount of Ofgem's Outperformance Wedge is much smaller than is justified by the evidence). If the CMA determines that the Outperformance Wedge as applied by Ofgem is not a valid approach to addressing the information asymmetry problem, Citizens Advice asks the CMA to provide guidance on how this problem should be addressed by regulators in future price controls, and how the allowed Cost of Equity in Ofgem's final decisions should be adjusted to address the problem.
149. In the remainder of this section we:
- Summarise the rationale and supporting evidence behind the need for the Outperformance Wedge.
 - Provide our views on the appealing companies' grounds for appeal.

⁹⁸ Citizens Advice (2017) [Energy Consumers Missing Billion. The profits gifted to energy networks](#)

⁹⁹ National Audit Office (2020) [Electricity Networks](#), Summary paragraph 20: "Under Ofgem's current regulatory framework, electricity network companies have provided a good service, but it has cost consumers more than it should have".

¹⁰⁰ House of Commons Energy and Climate Change Committee (2015) [Energy network costs: transparent and fair?](#), page 28: "RIIO has not gone far enough in providing value for money for consumers of energy. We are particularly concerned by the greater than expected profits by the network companies after the first year of the new framework."

- Explain why, if the CMA decides to strike out the Outperformance Wedge, it should make further adjustments to the allowed return on equity to address the problems the wedge seeks to correct.

Rationale for Outperformance Wedge

150. The Outperformance Wedge adjustment seeks to address a significant flaw in the previous approach to calculating the allowed return on equity. This is that historically information asymmetry has enabled energy network companies to persistently earn a higher level of return than is required by investors to finance the companies which comes at the expense of consumers paying higher prices than are necessary.

151. A framework for understanding why this has occurred was provided by Wright et al in their 2018 paper for the UK Regulators Network.¹⁰¹ In particular, the UKRN Paper explained the critical need to distinguish between:

- **The Regulatory Expected Return (RER)** – investors' ex ante *expected* return on the assets of regulated utilities
- **Regulatory Allowed Return (RAR)** – the ex ante rate of return allowed by the regulator in determining future prices *conditional on companies hitting targets* set by the regulator. Historically, the RAR has been determined using the CAPM which seeks to estimate the efficient (or minimum) level of return required by investors to finance a company.
- **Equity return implied by Capital Assets Pricing Model (CAPM ROR)** – the ex ante efficient level of equity returns implied by the CAPM

152. The key insight from this paper was that from an investor's perspective the RER will be different to the RAR, *if the company was expected to outperform against the ex ante RAR*. Crucially, this means that if an efficient level of return, as determined by the CAPM is used as the basis for determining the RAR, then RAR will exceed the efficient level of return required to finance the company (CAPM ROR) by the level of expected outperformance.

153. The need for the Outperformance Wedge thus depends critically on the assumption that investors expect companies to outperform. Ofgem presented 3

¹⁰¹ UKRN (2018) Estimating the Cost of Capital for implementation of price controls by UK Regulators An update on Mason, Miles and Wright (2003)

sets of evidence relating to this. We set out our analysis of Ofgem's data in our response to Ofgem's draft decisions:¹⁰²

- Historical totex performance from 2000 to 2020 – historical outperformance of 1.53% and therefore a minimum Outperformance Wedge of 0.83 (based only on totex)
- RIIO-1 outperformance – historical outperformance of 1.9% - and a corresponding Outperformance Wedge of 0.95%
- Market to Asset Ratios (MARs) – *current level of expected outperformance of 3.2%* - and a corresponding Outperformance Wedge of 1.6%

154. Of these three, we suggested that more weight is placed on the MAR analysis because it is based on actual market valuations which reflect expected levels of performance. We note that evidence from MAR's subsequent to Ofgem's final decision continues to strongly indicate high levels of expected outperformance. In particular National Grid announced on 18 March 2021 that it had agreed to acquire the electricity distribution network, Western Power Distribution (WPD) at an equity value of £7.8 billion.¹⁰³ This represents a premium of at least 60% over RAV (which would indicate an even higher level of outperformance than that suggested by Ofgem's data).¹⁰⁴ The fact that National Grid is willing to pay such a high premium over the RAV suggests that it considers that under its ownership it will be able to significantly outperform any targets Ofgem may set when set price controls for electricity distribution companies in 2023. As noted in the trade publication, Utility Week:

"Young [an Investec analyst] commented that:

*"National Grid's argument that the Cost of Equity being offered by Ofgem is insufficient to attract the required investment will be somewhat undermined by the agreed £7.8 billion purchase price for WPD"*¹⁰⁵:

*"It makes it more difficult to try and push your claims [i.e. National Grid's] around the Cost of Equity"*¹⁰⁶

¹⁰² Citizens Advice (2020), [Submission to Ofgem consultation on RIIO-2 Draft Determinations Finance Section](#) Pages 38-46

¹⁰³ National Grid (2021) [Proposed acquisition of Western Power Distribution](#)

¹⁰⁴ Based on the analysis in our submission to Ofgem which showed that a MAR of 30% and a Cost of Equity of 4.2% would imply an expected level of out performance of 3.2% (ibid pages 45-46)

¹⁰⁵ Utility Week (2021): [Premium on WPD sale is big help to Ofgem](#)

¹⁰⁶ Ibid

155. Furthermore, in relation to National Grid's planned disposal of its gas transmission business, the article commented that Young "*estimate that National Grid could expect to command a 29 per cent premium over the forecast regulatory asset value (RAV) of its gas transmission business in March 2022*".¹⁰⁷

156. In our submissions to Ofgem we explained why we considered that the evidence on historical outperformance (of 3.2%) would support an Outperformance Wedge of at least 1.6% and that Ofgem's proposed adjustment of 0.5% was therefore far too low¹⁰⁸. In its Final Determination, Ofgem appears to have accepted that 0.25% was an underestimate of the expected level of outperformance but then considered that the Outperformance Wedge should be lower than the evidence would justify:

*"We see rationale in the arguments and evidence submitted by Citizens Advice (CA) and the RIIO-2 Challenge Group (CG) on this. We agree that some level of outperformance can be expected, and believe that it should be recognised in order to strike a fair risk and return balance, as described in the RIIO-2 SSMC. In principle, CA and CG have strong arguments that higher levels of outperformance can be expected, and therefore captured in baseline allowed returns. However, whilst we recognise that higher levels might be justifiable, we believe that using a value of 0.25% in Step 3 achieves an appropriate overall balance, all things considered."*¹⁰⁹

157. Ofgem's Outperformance Wedge of 0.25% should therefore be considered very conservative and well within the bounds of any plausible expectation of future outperformance as evidenced by financial market data.

An explanation for historical and expected outperformance – Information Asymmetry

158. In an evidence-based regulatory regime, regulators estimate costs based on the information available to them (primarily by the regulated companies themselves). However, throughout the price control process, information asymmetry provides the companies with an absolute advantage over the regulator due to inherent advantages of better knowledge, greater financial resources, and the ability to make decisions to take advantage of the regulatory rules put in place.

¹⁰⁷ Ibid

¹⁰⁸ Citizens Advice (2020), [Submission to Ofgem consultation on RIIO-2 Draft Determinations Finance Section](#), Pages 38-46

¹⁰⁹ Ofgem (2020), [Final Determinations Finance Annex \(revised\)](#), paragraph 3.164.

159. Of course, it is necessary for Ofgem to do the best job it can of setting the costs and allowances at what it considers to be an efficient level. But critically, it is inevitable that the regulator cannot fully and fairly eliminate information asymmetry disadvantages through the setting of costs or other allowances *based on the information provided by the companies* (or otherwise available to it).
160. The financial resources advantage the companies have is particularly powerful: regulated companies can, and do, spend significant amounts employing consultancy firms to prepare submissions, which the regulator is simply not able to match. The benefit to the companies simply from being able to put forward very lengthy submissions with large amounts of data in an 'evidence-based' regulatory regime should not be underestimated. Resource constraints will mean that the regulator is unable to match that volume and quality of information and, in the 'evidence-based' regime, this means that the regulator is forced to make decisions based on evidence that is systematically biased in favour of the companies.
161. A US study looking at information asymmetry in the US electric utility industry found that where regulators were better placed to address information asymmetry (in terms of experience, available resources and access to precedent) they were more likely to reduce prices than raise them:
- "we find that regulatory agencies were more likely to implement rate reductions and/or less likely to implement utility requests for rate increases, when (a) agency commissioners had longer experience in office, (b) agency staff were relatively larger in number, and (c) other agencies had enacted similar rate changes, or assessed operational penalties, for the same utility. These results are consistent with improved informational flows reducing the evidentiary costs to regulators of implementing rate reductions and contesting utility rate increase requests."*¹¹⁰
162. Given that the regulator cannot expect to fairly address the causes of information asymmetry (in particular, the lack of financial resources to prepare evidence) by arbitrarily adjusting information provided by the companies, it must instead address the effect of the information asymmetry – an incorrect and inefficiently high allowed return on equity.

¹¹⁰ Fremeth and Holborn (2010) [Information Asymmetries and Regulatory Decision Costs: An Analysis of U.S. Electric Utility Rate Changes 1980–2000](#), Journal of Law, Economics, and Organization

163. By incorporating the real-world limitations of the CAPM resulting from information asymmetry, using evidence of historical outperformance (in the same way the CAPM uses historical market data to inform estimates of future returns), the Outperformance Wedge represents a significant methodological improvement in the calculation of the allowed return on equity.
164. Citizens Advice requests that the CMA considers the information asymmetry problem as a point of principle and provides guidance for regulators on how to address this issue in future price controls.
165. In the following sections we consider the companies grounds for appeal:

Companies argue that Ofgem should not have made a deduction from allowed returns after the price control had been calibrated

For example:

166. National Grid refers to the Outperformance Wedge as *“an overlay to Ofgem’s totex allowances and performance benchmarks that stretches a set of already carefully and deliberately calibrated targets to an even more demanding level”*.¹¹¹
167. Northern Gas say Ofgem has failed to demonstrate *“why a final deduction off revenues in the form of the outperformance wedge is justified over and above its calibrated cost allowances and incentive mechanisms”*¹¹²
168. In their arguments, the companies are attempting to characterise the Outperformance Wedge as an arbitrary deduction from already ‘correct’ calculation of allowed returns. It is no such thing.
169. Ofgem undertook a significant amount of work to calibrate their Cost of Equity based on the CAPM (the CAPM ROR), but it should be obvious that that calibration exercise should *not* then be applied to the allowed return on equity including the Outperformance Wedge. To do so will overstate the allowed return on equity by the expected level of outperformance.
170. In addition, the overall allowed return on capital is subject to numerous checks as part of Ofgem’s financeability work.

Companies argue that the existing regulatory tools are sufficient to address information asymmetry

¹¹¹ Ibid, paragraph 4.3.5

¹¹² Northern Gas Networks Limited (2021) [Notice of appeal](#), paragraph 230 (ii)(a)

171. The companies argue that the Outperformance Wedge is not needed because existing regulatory tools, and new measures introduced by Ofgem can address the problem of information asymmetry. For example:
- Northern Gas argues that *“Regulators have alternative mechanisms available to ensure that they can set a “fair bet”*.¹¹³
 - Wales & West Utilities argues that: *“the appropriate policy response would be to identify areas in which this was a result of the price control setting inappropriately low targets which require to be tightened, and use targeted means to address them rather than imposing a blanket reduction to the Cost of Equity”*¹¹⁴
 - National Grid argues that Ofgem already has a *“an extensive range of ‘tried and tested’ regulatory tools which it has used to address information asymmetry”*¹¹⁵ and that Ofgem *“has bolstered its established toolkit by adding a significant number of new tools in RIIO-T2 designed to address information asymmetry”*.¹¹⁶
172. As discussed above, the argument that the ‘regulatory tools’ of benchmarking, incentives and information gathering powers are sufficient fails to recognise that a key aspect of information asymmetry is that it reflects the absolute advantage the regulated company has over the regulator and cannot be addressed by conventional tools aimed based on matching information resources.

As noted by the National Infrastructure Commission in a 2019 report:

*“The regulatory system was designed so that companies would have to reveal their information advantage in order to benefit from it, so that the benefits could be eliminated over time. However, the true Cost of Capital is never fully revealed, whilst with rapid technological change new information asymmetries can arise faster than regulators can offset them with the traditional approach. In future price controls, **regulators should therefore seek to take direct account of the fact that their best estimate of costs, based on the information available to them, is likely to be biased** in the interests of the companies, and ‘aim off’ for this effect. **If regulators overlook these***

¹¹³ Ibid, paragraph 3.2.3

¹¹⁴ Wales & West Utilities (2021) [Notice of Appeal](#), paragraph B6.6.

¹¹⁵ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraph 4.45.

¹¹⁶ ibid, paragraph 4.48.

asymmetries, they cannot regulate efficiently to reduce costs for consumers. [emphasis added]¹¹⁷

173. Moreover, there is an argument that increasing the complexity of the price control structure by adding more adjustments can make the problem of information asymmetry worse. As noted by leading academic experts on regulation Dieter Helm and Jon Stern:

*“More complexity increases the asymmetry between the companies and the regulator: for every new tweak and rule, there are more games to play. This asymmetry of information, which the original Littlechild model addressed with its simplicity, has not gone away. It remains a defining feature of the water industry.”*¹¹⁸

*“Repeat regulation, necessary for the reasons outlined above, acutely raises the problem of information asymmetry. Given the inevitable superiority of knowledge by companies of their own costs and potential efficiency, this is a major problem for forward looking regulation - the companies (but not the regulator) know “where (and why) the bodies are buried”. This makes repeated regulation into a strategic game between the regulator and the regulated company. More specifically, regulation with regular repeat price resetting becomes a non-zero sum repeated game”*¹¹⁹

174. As Ofgem explains:

*“We considered in detail in the DDs the issue of information asymmetry and remedial mechanisms within the price control. We continue to believe that there is an information asymmetry between the regulator and the regulated companies, and that other mechanisms in the price control do not fully compensate for this.”*¹²⁰

175. The companies also argue that the adjustment is wrong because it is new and that it does not agree with generally accepted regulatory principles:

¹¹⁷ [National Infrastructure Commission](#) (2019), Strategic Investment and Public Confidence, Section 2.1.

¹¹⁸ Dieter Helm (2020), [Thirty years after water privatization - is the English model the envy of the world?](#) The Oxford Review of Economic Policy, vol. 36 no. 1.

¹¹⁹ Jon Stern (2014) [The British utility regulation model: Its recent history and future prospects](#) Utilities Policy, 31 (2014)

¹²⁰ National Grid Electricity Transmission PLC (2021) Notice of Appeal, paragraph 4.52. (quoting Ofgem, Final Determination, Finance Annex, Revised, page 63, paragraph 3.163.

- Northern Gas says: *"The outperformance wedge has no basis in regulatory precedent"*¹²¹
- National Grid states: Ofgem's *"action in introducing and applying the outperformance wedge was contrary to its overarching statutory duty to have regard to the "principles under which regulatory activities should be transparent, accountable, proportionate, consistent and targeted only at cases in which action is needed" (emphasis added)." ¹²²*

176. It is wrong to argue that a regulator cannot introduce new approaches or methodologies in deciding how to achieve its objectives. As discussed above, Citizens Advice's view is that action is needed to include the impact of information asymmetry in the Cost of Capital, and that other regulatory tools are not able to do this. On that basis, Ofgem's use of the Outperformance Wedge is clearly in line with regulatory principles.

177. We note that one of the tools listed by National Grid, the Return Adjustment Mechanisms (RAMs) do have the potential effect of constraining overall *ex post* returns. As stated by Ofgem, the purpose of the RAMs are to: *"provide protection to consumers and investors in the event that network licensees' returns are significantly higher or lower than anticipated at the time of setting the price control"*¹²³

178. Whether or not RAMs apply in practice will be determined by *ex post* outcomes relating to costs, revenues and capex – they will not be impacted by *ex ante* variances between investors expected and allowed returns. In contrast, the purpose of the Outperformance Wedge is to set an *ex ante* efficient Cost of Capital (by recognising that investors may expect a different set of outcomes from those expected by investors). Further, the fact that the RAMs only apply above or below threshold levels of 300bps of the baseline allowed return on equity which means that investors could benefit from 300bps of outperformance driven by information asymmetry before it would be constrained by the RAMs (and then only be 50% of any outperformance above that level). Clearly such an outcome is not efficient or in consumers' interest.

Companies argue that Ofgem's decision to introduce the Outperformance Wedge is not based on evidence and arbitrary

¹²¹ Northern Gas Networks (2021) [Notice of Appeal](#), paragraph 3.4.1

¹²² National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraph 4.60.

¹²³ Ofgem (2020), [RIIO-2 Final Determinations – Finance Annex](#), Revised, page 102.

179. The companies disagree with Ofgem's assumptions and evidence to support the Outperformance Wedge. For example:

- Southern Gas says: *"Ofgem's decision to introduce the outperformance wedge is not supported by adequate evidence or analysis"*¹²⁴
- SP Transmission says: *"The outperformance wedge undermines the rigour of the process undertaken to assess costs and set incentives. It is arbitrary and unprecedented."*¹²⁵
- National Grid states that *"the size of the outperformance wedge is arbitrary"*.¹²⁶

180. The core of the companies' case is that actual historical outperformance does not mean companies that companies will outperform in future:

- Wales & West Utilities argues that: *"Past outperformance is no guide to the future"*¹²⁷

181. However, this argument is wrong for 2 reasons:

Firstly, as we describe earlier, the evidence on historical outperformance is compelling and that whilst it is inevitable that not every single strand of evidence will point in the same direction, the overall conclusions are clear – companies have significantly outperformed on a persistent basis across multiple price controls, and that given the underlying strength of information asymmetry in an evidence-based regime, they will continue to do so. In our response to Ofgem's consultations on its Draft Determinations we explained why we considered that the evidence on historical outperformance would suggest actual levels of expected outperformance by investors of 3.2%, and that a reasonable adjustment to include in the allowed return on equity would be 1.6%. Ofgem's adjustment of 0.25% is clearly significantly lower than would be justified by the evidence.¹²⁸

182. At each setting of a price control regulators will seek to learn the lessons of previous settlements and address the information asymmetry. This has not been successful as demonstrated by companies' ability to continually outperform. There is no reason to believe that the new tools employed by Ofgem on this occasion will be wholly successful. Indeed, for the RIIO-1 price controls Ofgem

¹²⁴ Southern Gas Networks PLC and Scotland Gas Networks PLC (2021) [Notice of Appeal](#), paragraph 5.6.

¹²⁵ SP Transmission PLC (2021) [Notice of Appeal](#), paragraph 55.

¹²⁶ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraphs 4.87.

¹²⁷ Ibid, Paragraph B6.4.

¹²⁸ Citizens Advice (2020), [Submission to Ofgem consultation on RIIO-2 Draft Determinations Finance Section](#), Pages 38-46

introduced a tool specifically to address information asymmetry, the Information Quality Incentive (IQI), but network companies still generally underspent against expenditure allowances. In fact, the removal of the IQI may have a detrimental impact on information asymmetry for RIIO-2.

183. Given the evidence on historical outperformance and current evidence company values revealed through share prices and MARs, it is not credible for the companies to argue that investors do not expect companies to outperform in the period of the next charge control. Of course, there is a degree of uncertainty around the level of that future outperformance but Ofgem's assumption of 0.25% is clearly below the minimum of any plausible range actually expected by investors (as revealed by the financial markets).
184. Of course, any view of expected outperformance will only ever be an estimate and that actual outcomes will be at variance with this. Given that the Outperformance Wedge of 0.25% compares to evidence supporting expected outperformance of up to 3.2%, it is clear that the risk of actual outperformance falling below this should be considered remote. Moreover, as discussed below the companies appear to be rejecting Ofgem's ex post adjustment which 'makes good' any shortfall of actual outperformance below this level, presumably on the basis they do not think it is needed.
185. We note that in its Final Determinations Ofgem explains that, if viewed as an exercise in discretionary judgment, its Outperformance Wedge of 0.25% is reasonable given the CMA's provisional determination adjustment of 0.5% based on an aiming up rationale.¹²⁹ We do not agree that the Outperformance Wedge should be viewed as an exercise in discretionary judgment (on the basis that in contrast to the aiming up rationale, there is a strong evidential base of historical outperformance demonstrating the need and amount of adjustment). Nevertheless, we do consider that the fact that the amount of the adjustment falls within the range within which the regulator has discretion should be considered by the CMA in its assessment.
186. Secondly, the purpose of the Outperformance Wedge is to address the gap between *expected* returns and the *allowed* return. The best measure of expected returns is revealed by MARs which as explained earlier continue to reveal that investors expect companies to significantly outperform against an efficient CAPM-based measure of average returns.

¹²⁹ Ofgem (2021) [Final Determinations Finance Annex \(revised\)](#), paragraph 3.166.

187. The Outperformance Wedge does not eliminate the incentives or the ability of companies to generate additional returns to shareholders over and above the Allowed Rate of Return, rather it simply reflects the fact that investors expect companies to beat the cost 'targets' set by the regulator.

188. We note that National Grid states that Ofgem *"has produced very limited evidence on the effects of the outperformance wedge (including the backstop mechanism), and has failed to conduct any appropriate impact assessment, despite the novelty and importance of the outperformance wedge as a regulatory tool and, as indicated by the UKRN Report and in the Wedge Survey, the "fierce debate" it has provoked"*.¹³⁰

189. Citizens Advice does not consider the arguments made by National Grid to be well founded. Ofgem did conduct a thorough impact assessment as part of its financeability assessment, and the impact of the Outperformance Wedge can only sensibly be judged as part of the impact of the Allowed Rate of Return.¹³¹ It was not necessary, or feasible, for Ofgem to attempt to separately consider the impact of the Outperformance Wedge.

Companies argue that the Outperformance Wedge is a discriminatory tool

190. The companies consider that the Outperformance Wedge is unnecessarily and unfairly discriminatory:

- Southern Gas argues: *"The outperformance wedge applies at an aggregate level to allowed returns (rather than in a targeted manner to the building blocks giving rise to concerns over perceived asymmetries) and to all companies indiscriminately."*¹³²
- National Grid considers that *"A 25 bps deduction from the allowed return on equity is applied equally at RIIO-2 to all licensees, across different sectors, even though the extent to which companies can outperform must logically depend on factors specific to each company. There is no clear evidence on which to base an expectation that companies will outperform their regulatory settlements in RIIO-2 due to information asymmetry"*.¹³³

191. These arguments fail to recognise that the Outperformance Wedge is not an adjustment to individual building blocks of allowed revenue, rather it is an

¹³⁰ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraphs 4.93.

¹³¹ Ofgem (2021) [Final Determinations Finance Annex \(revised\)](#), pages 73 to 86.

¹³² Southern Gas Networks PLC and Scottish Gas Networks PLC (2021), [Notice of Appeal](#), paragraph 329

¹³³ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraphs 4.69.

adjustment to the allowed Cost of Equity, to recognise outperformance generally. Cost of Equity is calculated for a notionally efficient company, and is not calibrated for individual companies. On that basis, it is sensible for the same adjustment to be calculated at an aggregate level and applied to all companies.

Companies argue that the Outperformance Wedge will cause harm to consumers

192. The companies attempt to argue that the Outperformance Wedge will cause harm to consumers. For example:

- National Grid states that: the adjustment will *"cause direct and enduring harm to existing and future consumers"*¹³⁴
- Northern Gas says the *"The outperformance wedge dampens incentives to invest and improve efficiency and service, which ultimately harms consumers"*¹³⁵

193. Citizens Advice is the statutory consumer body for energy and we disagree with the companies' assertions that the Outperformance Wedge is not in consumers' interest.

194. The rationale behind the companies' arguments is that the Outperformance Wedge undermines:

- incentives to improve efficiency
- incentives to invest
- companies' ability to finance their operations ('financeability')

We explain why these arguments are flawed below:

Incentives to improve efficiency

195. For example, National Grid argues that that the Outperformance Wedge will mean companies are *"dis-incentivised to innovate and (out)perform"* and that this undermining of incentives will be *"directly detrimental to the interests of consumers"*.¹³⁶

196. The use of incentive-based regulation always provides a potential dilemma for companies: if they improve efficiency and reduce costs today, there is an immediate benefit in terms of increased profit, but future price controls are likely

¹³⁴ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), page 93.

¹³⁵ Northern Gas Networks Limited (2021) [Notice of appeal](#), paragraph 3.22.

¹³⁶ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraph 4.109.

to be tougher as the achieved level of lower costs is then used as the new benchmark against which further cost reductions are incentivised.

197. We believe it is implausible that companies will not seek to operate efficiently in the current price control period for fear that the regulator will set a tougher target next time round. If for no other reason, shareholders would be unlikely to accept such an approach which would lead to reductions in profit. All the evidence indicates that incentive-based regimes do work and that in practice the fact that future prices will be lower as a result of making improvements today does not mean that companies do not continue to seek out opportunities to reduce costs and improve profits in the short term.

Incentives to invest

198. For example, National Grid states that *"in reducing the allowed equity return by 25bps, Ofgem's outperformance wedge damages incentives to invest"*.¹³⁷

199. Ofgem's task in setting an allowed rate of return is to set an efficient rate that allows companies to finance their activities, not to maximise returns to shareholders. Of course, there is a link between a company's level of profit and ability to attract new funding, and that if shareholders were offered unnecessarily high returns, it would be 'easier' for the companies to raise additional equity, but it is not the job of the regulator to make the job of the company easy; it is to try and set up a structure that reflects efficient outcomes in a competitive market.

200. Furthermore, the companies in fact raise very little by way of new equity, most funding of capital expenditure comes from self-generated funds. For example, as Citizens Advice noted in its submission to Ofgem, this point is illustrated by considering National Grid's financing between 2007 and 2019:

- In all but one year (2011 when there was a rights issue), equity funding was a cash outflow to the business (i.e. shares were purchased back by the company). Indeed, over the period, net funding from equity was negative overall.¹³⁸

201. We have reviewed the companies' business plans and they appear to show that no new equity funding is required or assumed over the period of the price

¹³⁷ National Grid Electricity Transmission PLC [Notice of Appeal](#) (2021), paragraphs 4.116.

¹³⁸ HMK Advisory (2020), [RIIO-2: Cost of Capital, A Report for Citizens Advice](#), paragraph 2.4.12

control (all new funding is via self generated funds or new debt).¹³⁹ This demonstrates that the companies' claims that Ofgem's unfairly low allowed return on equity means they will not be able to attract new equity finance are not valid arguments against the Outperformance Wedge - if there is no new equity finance to be jeopardised.

202. Companies can decide to pay out dividends rather than finance new investments but as explained by National Grid, the price controls are not expected to impact on its dividend policy:

*"The Board has reaffirmed the existing dividend policy for this financial year ... To grow the dividend at least in line with UK RPI inflation"*¹⁴⁰

203. We have not seen evidence that the allowed rate of return set by Ofgem will not enable the required level of investment to be financed.

204. National Grid states that *"the outperformance wedge causes harm by damaging investor confidence and increasing the Cost of Capital in the long run, contrary to the interests of existing and future consumers"*.¹⁴¹ National Grid refers to a Frontier Economics report which says the Outperformance Wedge will have a *"chilling effect on the appetite for investment in the sector"*. This is an assertion with no supporting evidence.

205. In contrast, evidence from actual and proposed market transactions indicates that investors' appetite to invest in UK energy network companies remains strong. In particular, the Market to Asset Ratios of current transactions indicates that the available rates of return are more than adequate (as discussed above)

206. In addition to this evidence on market values of network companies, public comments from National Grid, for example, suggest that it considers it is well placed to both meet its regulator objectives and provide shareholders with an attractive return. In its presentation on 2 March 2021 to investors titled *RIO-T2 Final Determination, National Grid Response*, National Grid stated that:¹⁴²

¹³⁹ We note that some companies assume that some shareholders elect to reinvest dividends via a scrip dividend

¹⁴⁰ Ibid page 12.

¹⁴¹ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraphs 4.119.

¹⁴² National Grid (2021) [RIO-T2 Final Determination National Grid response](#)

“Looking ahead to the next 5 years we expect:

- to invest around £10bn*
- higher than average annual investment levels in RIIO-T1*
- 60% of investment focused on asset health”¹⁴³*

207. It expected to retain its investment grade status of Baa1 for Moody’s and BBB+ for S&P¹⁴⁴

- *“We expect our rating metrics to remain stable, with sufficient headroom above the next thresholds”¹⁴⁵*
- *“The Board has reaffirmed the existing dividend policy for this financial year ... To grow the dividend at least in line with UK RPI inflation”¹⁴⁶*
- *“We remain:*
 - committed to a strong, investment grade credit rating*
 - well placed to deliver investment to deliver strong asset growth towards the top end of our 5-7% range*
 - enabling the energy transition in the years ahead”¹⁴⁷*

208. These comments contrast with the picture National Grid attempts to paint in its appeal notice of a company which may struggle to finance itself on the basis that the regulator has set prices at a level which does not enable it to earn a reasonable level of profit.

209. It should also be noted that the discretion network companies over whether to invest is limited. The price control sets clear deliverables and the licence sets clear obligations. The network companies generally do not have the choice over whether to invest or not.

Financeability

210. For example, National Grid states that *“the outperformance wedge will undermine equity financeability in RIIO-2 contrary to the interests of existing and future consumers and Ofgem’s duty to have regard to the need to secure that licensees can finance their licensed activities”*.¹⁴⁸

¹⁴³ ibid page 6.

¹⁴⁴ Ibid page 10.

¹⁴⁵ Ibid page 10.

¹⁴⁶ Ibid page 12.

¹⁴⁷ Ibid page 12.

¹⁴⁸ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraphs 4.124.

211. The companies' arguments appear to be confusing financeability with maximising shareholder returns. As a regulatory concept, financeability requires Ofgem to:

"have regard to... the need to secure that licence holders are able to finance the activities which are the subject of obligations imposed".¹⁴⁹

212. We do not accept the suggestion that the Outperformance Wedge per se means that the companies are not financeable. Moreover, the allowed rate of return allowed for by Ofgem is clearly sufficient for the companies to finance current and future activities (as demonstrated by the observed MARs, for example). The fact that shareholders may not earn as much as they could if prices were higher does not mean the companies are not financeable.

Companies argue that Ofgem's ex post adjustment mechanism creates further problems

213. The companies seek to argue against the Outperformance Wedge by arguing that the ex post adjustment (which they characterise as a safeguard against the assumptions behind the Outperformance Wedge proving wrong) is itself flawed. For example:

214. For example, National Grid states that *"the backstop mechanism exacerbates the harmful properties of the outperformance wedge by creating perverse incentives for companies to no longer seek to outperform" and that "contrary to Ofgem's assertions that the backstop mechanism will "protect investors" and "reinforce stakeholder confidence in the regulatory regime", investors can take no comfort in the backstop mechanism"*¹⁵⁰

215. It is obvious that, *if the companies concerns about the unreasonableness of their expectation to outperform were real*, the ex post adjustment is beneficial to the companies and shareholders: if the company fails to do well the company receives an additional top-up allowance which will offset the effect of the Outperformance Wedge.

216. As such, the ex-post adjustment clearly effectively counters many of the companies' (in Citizens Advice's view invalid) arguments against the Outperformance Wedge relating to financeability and impact on investment incentives.

¹⁴⁹ Section 3A, [Electricity Act 1989](#), Section 4AA [Gas Act 1986](#).

¹⁵⁰ National Grid Electricity Transmission PLC (2021) [Notice of Appeal](#), paragraphs 4.132.

217. The reason the companies are apparently so willing to argue against a mechanism that is clearly in their interest may be that they simply do not believe that they will fail to outperform by at least 25bps, and so in practice they think the ex post adjustment is highly unlikely to be applied in practice. In this light it is easy to understand why the companies would prefer to 'sacrifice' this advantageous measure in their argument to secure a higher allowed rate of return.

218. Notwithstanding that the ex post adjustment clearly offsets the claimed disadvantages of the Outperformance Wedge, Citizens Advice remains of the view that it is not necessary. This is because the claimed disadvantages of the Outperformance Wedge are not valid and do not need correcting against. In addition, as we pointed out in our submission to Ofgem:

"Firstly, Ofgem presents no evidence to suggest that any reinforcement of the regulatory regime is needed. Market reactions to Ofgem's previous views on the expected outperformance adjustment which did not include the ex post adjustment, clearly show that the market does not need such safeguards as Ofgem seems to think. Rather current company values and the MARs they reveal indicate that investors expect companies to do significantly better than any targets the regulators set. Secondly, an ex post adjustment to "keep shareholders whole" as Ofgem puts it significantly reduces the risks investors face, and if applied should also be reflected in a lower Cost of Equity than that derived from the CAPM framework. Thirdly, Ofgem does not explain why consumers should bear this risk. Ofgem states:

"the ex-post mechanism can only increase returns as highlighted in Table 28. This means that the underlying risk of Step 3 is borne by consumers, such that if we are mistaken about information asymmetry, or if (on average) licensees do not beat RIIO-2 targets, equity investors are kept whole."¹⁰⁵

"This analysis generally supports expected outperformance levels above 0.25% for RIIO-2"¹⁰⁶

Ofgem is effectively saying: "here is a target which, based on all the evidence, we think is reasonable, but don't worry if you miss the target because we'll increase prices and consumers can pay for it". Such an approach is not

reflective of the competitive market which Ofgem is striving to mimic, and risks setting an unnecessary precedent.”¹⁵¹

219. In addition to our specific comments relating to the Outperformance Wedge, we provide the following comments:

Importance of considering the allowed rate of return in aggregate

220. Citizens Advice is concerned that the appeal process risks Ofgem’s approach of providing a balanced calculation of the overall Allowed Return on Capital to be damaged by the ‘cherry-picking’ nature of the companies’ appeals.

221. Accordingly, if the CMA does not consider it appropriate to include the Outperformance Wedge in the Allowed return on Capital, it should consider how other assumptions in the Allowed Return on Capital and related adjustments to the ex post calculation of allowed revenues should be adjusted to ‘rebalance’ Ofgem’s calculation.

¹⁵¹ Citizens Advice (2020), [Submission to Ofgem consultation on RIIO-2 Draft Determinations Finance Section](#), Page 46

STATEMENT OF TRUTH

The Intervenor believes that the facts stated in this Notice of Appeal are true

Signature of Authorised Representative

Date: 23/4/21

Andy Manning, Principal Economic Regulation Specialist,

for and on behalf of Citizens Advice