



Assessment of the Competition Commission's Provisional Determination on the WACC for Northern Ireland Electricity and its implications for the water sector.

A Paper prepared for Anglian Water

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Executive Summary

Anglian Water (AW) has asked NERA Economic Consulting to provide an expert analysis of the Competition Commission's (CC) provisional determination on the cost of capital for Northern Ireland Electricity (NIE), published on 12 November 2013, and its implications for the water sector.

As part of this provisional decision the CC departed from its long-standing practice of estimating the range for total market returns (TMR) with a focus on long-run averages and instead chose to narrow the range, and lower its point estimate of the TMR, referring to more "forward looking" market evidence.

We consider the CC's reasons for lowering its estimate of the TMR to be flawed because of a number of methodological failings. The following points support this:

- First, and perhaps most importantly, we do not agree with the CC's logic that there is good recent evidence to change the established UK regulatory methodology of using long term historical data to estimate equity returns. The CC's argument (para 13.144 (b)) that a decline in the RFR should correspond to "lower (equity) returns" is not supported by any new academic evidence and is completely contrary to the work of academics such as Smithers (2006) on whom the Competition Commission and Ofwat have previously relied on.¹
- Second, we believe that the CC have used contemporary evidence on the RFR for their estimate of NIE's cost of equity but they have not used contemporary evidence on the ERP. For example, they have ignored Bloomberg and Bank of England estimates of the ERP based on forecast dividend growth rates, but have instead relied on estimates of the ERP by e.g. Fama and French (2002) and DMS (2013) which are largely based on long run historical data.
- Third, the CC's argument that "*the long-term decline in RFRs (...) should correspond with an increased demand for equities and thus increased prices and lower returns*" is an assertion and no evidence is offered to support this position.

Moreover, even if the CC's provisional determination for NIE does have some merit, we do not believe that it can be directly translated to the water sector. The NIE price control period runs from 2013 to 2017, compared to 2015 to 2020 for AMP6. The regulatory period for water companies therefore starts two years later and ends three years after the NIE regulatory period, and the most recent market evidence - especially on the risk free rate where the unwinding of QE is likely to lead to higher rates - has even less relevance for water companies.

In addition, we note that the CC in its decision for NIE was arguably more generous on the beta assumption than would be justified by empirical evidence, and arguably compensated for this by setting a very low TMR. Thus, other regulators, including Ofwat, should not take the

¹ For example See http://www.ofwat.gov.uk/publications/commissioned/rpt_com_costofcapital130203.pdf

CC's decision on the TMR in isolation, and should consider it alongside its decision on the beta.

Overall, we do not think that Ofwat should deviate from its own previous approach of estimating the TMR using long-run data. There is considerable methodological and judgemental uncertainty in assessing contemporary market evidence, and we believe that the CC made a number of errors in their economic analysis that underlies their Provisional Determination.

Ofwat should not depart from its prior belief that history gives a better and a more objective basis for a stable and longer-term forward-looking view of the regulatory cost of capital. Any departure from this approach would impose substantial financing risks on water companies and may negatively impact on the investment incentives of long-term infrastructure funds, which have significant stakes in the companies.

1. Introduction

Anglian Water (AW) has asked NERA Economic Consulting to provide an expert analysis of the Competition Commission's (CC) provisional determination on the cost of capital for Northern Ireland Electricity (NIE), published on 12 November 2013, and its implications for the water sector.

As part of this provisional decision the CC departed from its long-standing practice of estimating the range for total market returns (TMR) with a focus on long-run averages and instead chose to narrow the range referring to more "forward-looking" and current evidence.

Ofwat's approach to TMR has consistently been based on a long-term assessment of historical data. Recognising there is considerable methodological and judgemental uncertainty in assessing contemporary market evidence, Ofwat has considered that history gives a better and a more objective basis for a longer-term forward-looking view. This has been broadly consistent with other regulators' practice and with the recommendations of a 2003 study commissioned by the economic regulators (Smithers report).

In its provisional determination for NIE, the CC sets out a different approach to estimating TMR. The CC's approach gives greater weight to contemporary market evidence. The CC, or its successor the Competition and Markets Authority, is the appeal body for PR14 settlements.

Given that last few years have seen a serious global financial crisis, and unprecedented reaction from policy makers in terms of monetary policy measures such as Quantitative Easing (QE), we seriously doubt that this is the right time for regulators to be making a change to established methodologies for estimating the WACC, especially when there is a complete absence of academic support for the arguments that have been put forwards by the Competition Commission. We strongly advocate that more research is needed and/or a longer time series of data in more "normal" market conditions to justify a change in methodology.

In this report, we consider the CC's draft determination on the cost of capital and in particular on the low TMR. Ofgem has recently published² a consultation on the direct translation of the CC's proposed approach in determining the Cost of Equity for RIIO price controls and Ofwat is currently considering its position on risk and reward, including the Cost of Capital, with its assessment to be published on 27 January 2014. It is not clear the extent to which Ofwat will reflect the CC's draft TMR estimate in its own assessment but for the reasons set out in this paper we believe there are fundamental errors in the CC's approach and, in any case, direct translation of the CC's TMR estimate is not appropriate. We also note the significant negative risks on financing and investment incentives if Ofwat adopts the CC's approach on the TMR.

The report is structured as follows:

² Ofgem (6 December 2013): "Consultation on our methodology for assessing the equity market return for the purpose of setting RIIO price controls"

- In Section 2, we describe the methodological errors in the CC's determination;
- In Section 3, we discuss whether the CC's estimate of the TMR for NIE's price control can be directly translated to PR14;
- In Section 4, we consider the CC's beta estimate in the context of the overall decision; and
- In Section 5, we consider the risks that may arise from adopting the CC's approach of placing greater weight on current market evidence.

2. The CC's Decision Contains a Number of Methodological Errors

We consider the CC's reasons for lowering its estimates of the TMR to be flawed because of a number of methodological failings. Our view is driven by the following four considerations:

- First, and perhaps most importantly, we do not agree with the CC's logic that there is good recent evidence to change the established UK regulatory methodology of using long term historical data to estimate equity returns. The CC's argument (para 13.144 (b)) that a decline in the RFR should correspond to "lower (equity) returns" is not supported by any new academic evidence and is completely contrary to the work of academics such as Smithers (2006) on whom the Competition Commission and Ofwat have previously relied on.³
- Second, we believe that the CC have used contemporary evidence on the RFR for their estimate of NIE's cost of equity but they have not used contemporary evidence on the ERP. For example, they have ignored Bloomberg and Bank of England estimates of the ERP based on forecast dividend growth rates, but have instead relied on estimates of the ERP by e.g. Fama and French (2002) and DMS (2013) which are largely based on long run historical data.
- Third, the CC's argument that "*the long-term decline in RFRs (...) should correspond with an increased demand for equities and thus increased prices and lower returns*" is only an assertion and no evidence is provided to support this view.
- Fourth, the CC's use of current market returns is inconsistent with the theory that markets tend to mean revert. There is substantial academic and empirical evidence of mean reversion, and the CC has previously noted this in its determination for Bristol Water.

We discuss these in turn. We also present some additional analysis at the end of this chapter to show why Ofwat should not lower the TMR.

2.1. The CC's Methodology Contains a Number of Flaws

2.1.1. Instability with previous regulatory methodologies

We do not agree with the CC's logic that there is good recent evidence to change the established UK regulatory methodology of using long term historical data to estimate equity returns.

The CC's argument (para 13.144 (b)) that a decline in the RFR should correspond to "lower (equity) returns" is not supported by any new academic evidence and is completely contrary to the work of academics such as Smithers (2006) on whom the Competition Commission and Ofgem have previously relied on.

³ For example See http://www.ofwat.gov.uk/publications/commissioned/rpt_com_costofcapital130203.pdf

The CC's new approach removes the original logic for using TMR on the basis of its stability and predictability, even though Smithers recognised that TMR were not totally stable but for regulatory purposes best approximated by an *assumption* of stable returns⁴, a finding the CC fails to discuss.

2.1.2. The CC's use of historic dividend growth rates is inconsistent with "forward-looking" evidence

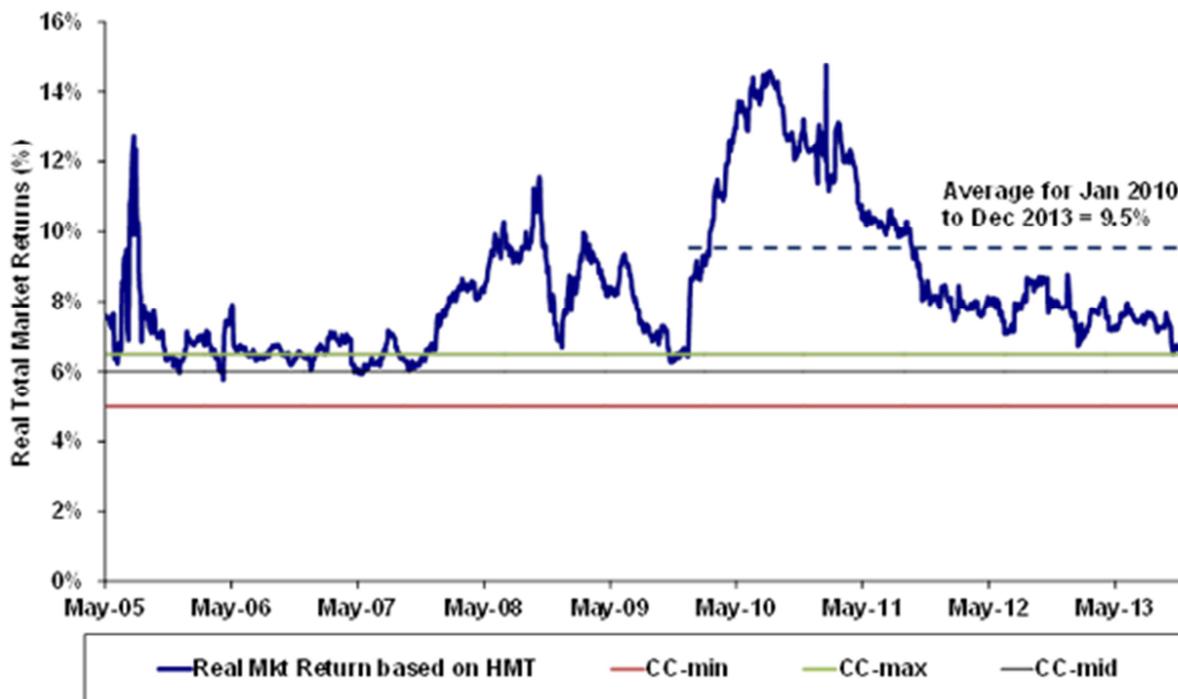
The CC combines forward-looking methods with historic dividend growth rates, which is internally inconsistent when the aim is to derive a forward-looking estimate. Models that consistently use forward-looking projections of dividend growth rates, such as the one produced by Bloomberg show significantly higher TMR than the 6% mid-point used by the CC for NIE (see Figure 2.1). NIE's response to the CC consultation quotes a number of other papers that also confirm a significantly higher current required rate of return.⁵ Figure 2.1 shows that after spiking in 2010/2011, Bloomberg's estimate of required market returns has returned to levels more in line with the top end of the CC's previous range at around 6.75%, while at no point since the beginning of the financial crisis has purely forward-looking data supported the CC's current central estimate.

If the CC wants to rely on recent evidence of the RFR for the cost of equity, then there is a good argument that Bloomberg is the most established source for recent contemporary evidence on the ERP and TMR. Based on the last four years of data, Bloomberg evidence on TMR shows an average level of 9.5%, way above the CC's estimate of 6%.

⁴ Smithers and Co (2003): "A Study into Certain Aspects of the Cost of Capital for Regulated Utilities in the U.K., A report commissioned by the U.K. economic regulators and the Office of Fair Trading", p. 49.
"Given our preferred strategy of fixing on an estimate of the equity return, any higher (or lower) desired figure for the safe rate would be precisely offset by a lower (or higher) equity premium, thus leaving the central estimate of the cost of equity capital unaffected."

⁵ Northern Ireland Electricity (2013): "*Response to the Competition Commission's Provisional Determination*"

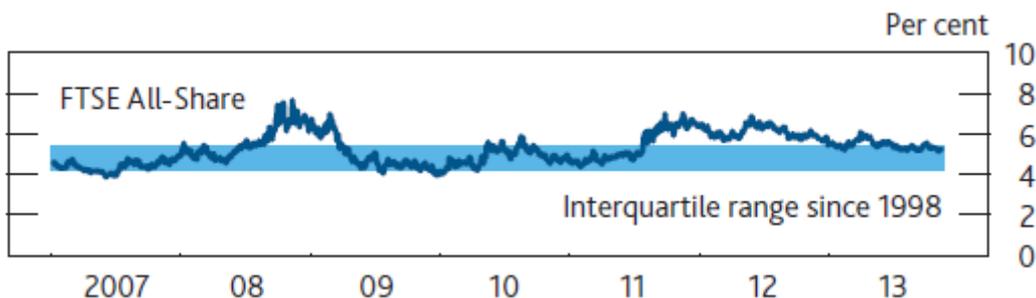
Figure 2.1
Bloomberg Estimates of Real Market Returns



Source: NERA analysis of Bloomberg and HMT data and CC decision

We note the CC provisional determination has considered implied equity risk premium calculated by the Bank of England until 2010.⁶ As shown in Figure 2.2, evidence from the 2013 Bank of England study⁷ suggests the ERP is significantly above the CC's implied estimate of the ERP. In fact for much of the period from mid-2011 to the end of 2013 the ERP alone is towards the top end of the CC's revised TMR range from 5.0% to 6.5% calling into question the viability of the CC's assumptions even at zero interest rate levels.

Figure 2.2
BoE Estimate of the ERP



Source: NERA adaptation of BoE data

⁶ Competition Commission (2013): "Northern Ireland Electricity Ltd Price Determination", para. 13.138.

⁷ Bank of England (2013): "Financial Stability Report 11/2013".

Instead of using Bloomberg and Bank of England estimates of the ERP based on forecast dividend growth rates, the CC have instead relied on estimates of the ERP by e.g. Fama and French (2002) and DMS (2013) which are largely based on long run historical data. This is completely inconsistent.

The Fama and French study was commissioned in 2002, and used long-run historical series on the dividends and earnings from 1972 to 2000. Similarly, the DMS data that the CC quotes is from 1900 to 2012. This historical data is not appropriate for estimating a forward-looking equity risk premium because it fails to capture any expected changes in market returns. If the CC uses current market evidence to estimate the risk-free rate, then using estimates of the TMR based on very long-run data are inappropriate because of inconsistent time periods. The implication is that the CC has essentially estimated too low an equity risk premium because current market evidence (Bloomberg and Bank of England estimates) predicts a higher equity risk premium than estimates based on dividend growth models that use long-run historical data (Fama and French).

We also note that the equity risk premium estimate based on the DMS data has a very large standard error, as the CC itself notes: “*The standard error around these historical estimates is substantial, implying a 95 per cent confidence interval of around 3 to 11 per cent for the market return and around 3 to 9 per cent for the ERP*”.⁸ Thus, we believe Ofwat should not place any weight on this evidence, both because of the inaccuracy of the estimates and the inconsistency with the methodology for estimating the risk-free rate.

2.1.3. Sustainability of the Decline in the Risk-free Rate

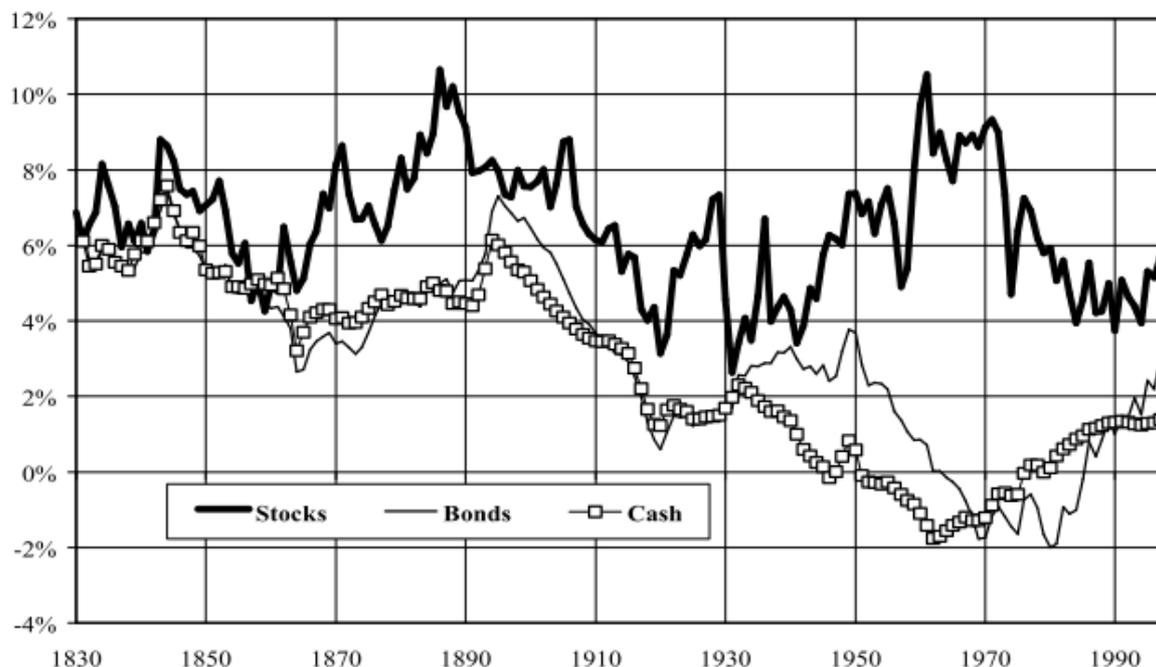
The CC's assertion about the link between the falling RFR and equity returns is not backed up by any substantial evidence and fails to consider alternative explanations. While a clear driver for the lower risk-free rates observed since the start of the financial crisis has been the purchase of financial assets by central banks, this has been in response to higher risks observed in the financial markets and a desire to stave off financial recession. In this context the CC does not discuss more up-to-date Bank of England research that shows that the ERP has been well above its long-term average for the post-2008 period (albeit decreasing slightly recently), which offsets the lower risk free rates over this period.⁹

Moreover, the Smithers report, on which the Competition Commission and Ofwat has previously relied, finds no evidence of a long-run relationship between the TMR and the risk-free rate. The report presents 200 years of data and shows that there is no robust evidence to show the real return on stocks and bonds are related over the period. Indeed, there appears to be evidence of an inverse relationship at times between real return on stocks and the real return on bonds.

⁸ CC (November 2013): “*Northern Ireland Electricity Price Limited Price Determination – Provisional Determination*”, para 13.133, p13-39.

⁹ Bank of England (2013): “*Financial Stability Report 6/2013*” and “*Financial Stability Report 11/2013*”

Figure 2.3
Smithers Report Shows No Relationship Between TMR and RFR



Source: Calculations using data from Siegel (1998)

Source: *Smithers & Co (February 2003): "A Study into Certain Aspects of the Cost of Capital for Regulated Utilities in the UK"*

During the recent Ofgem workshop on its consultation on the equity market return, Ofgem presented a more up-to-date data series and found that three years of additional data does not change the conclusion. There is still no evidence to suggest that the TMR is related to the risk-free rate, based on long-run data.

Further, it is far from clear whether lower risk-free rates will be sustainable throughout PR14 when central banks are expected to withdraw their asset purchase programmes, which will reduce excess demand for assets.¹⁰

In summary, we do not agree with the CC's logic that there is good recent evidence to change the established UK regulatory methodology of using long term historical data to estimate equity returns. The historical data approach based on DMS (2013) suggests a real total market return estimate above 7%, consistent with Ofwat's determination at PR09. In case of considering up to date forward-looking evidence, the implied TMR would be even higher. We believe that the CC has somewhat "cherry picked" those bits of recent market evidence that show lower numbers such as the RFR but have not looked consistently at contemporary evidence on other aspects of equity returns such as the ERP.

¹⁰ E.g. Reuters (18 Dec 2013): Fed cuts bond buying in first step away from historic stimulus

2.1.4. CC's use of current market evidence is inconsistent with mean reversion

The CC argues in its provisional determination for NIE that market returns will return to their long-run level:

“a forward-looking expectation of a return on the market of 7 per cent does not appear credible to us, given economic conditions observed since the credit crunch and lowered expectations of returns.”¹¹

However, there is substantial academic and empirical evidence of mean reversion of returns. This is a market phenomenon in which the market tends to move to its long-term fundamental value over time. Equity markets are known to experience this phenomenon, as noted by DMS:

“Sharply lower (or higher) stock prices may have an impact on immediate returns, but the effect on long-term performance will be diluted. Moreover volatility does not usually stay at abnormally high levels for long, and investor sentiment is also mean reverting. For practical purposes, we conclude that for forecasting the long run equity premium, it is hard to improve on extrapolation from the longest history that is available at the time the forecast is being made.”¹²

This would imply that an estimate of the total market return based on short-term data is inappropriate for a price control where the market is expected to mean revert. Although the mean reversion argument is generally thought of as a statistical phenomenon, there is additional evidence in this case that the market will return to its long-run value. The evidence in section 3 shows that the market is expected to return to its long-run level in PR14 as the economy recovers, and therefore there is economic evidence to support the mean reversion theory.

We also note that the CC has previously supported the view that market returns revert to their long-run level during the Bristol Water determination:

“Asset prices and/or yields may have a tendency to revert to a longer-run mean value and, if so, past levels are relevant to estimating the expected level over the relevant period.”¹³

Given the CC has previously taken this stance, it would have to provide strong evidence to show why the theory of mean reversion is no longer applicable. Without such evidence, we do not believe the CC can justify using current market evidence to estimate the TMR, and Ofwat should not lower the TMR on this basis.

¹¹ CC (November 2013): “Northern Ireland Electricity Price Limited Price Determination – Provisional Determination”, para 13.144, p13-45.

¹² Dimson, E, Marsh, P, Staunton, M (February 2013): “Credit Suisse Global Investment Returns Sourcebook 2013”, p38.

¹³ CC (February 2010): “Bristol Water plc – Final Determination”, para 6, N2.

In summary, we see a number of questionable methodological choices and further issues with the CC's provisional decision that have also been picked up upon and heavily criticised by investors responding to the CC's provisional decision. E.g. Hastings Infrastructure Fund stated:

“In our opinion as an equity investor this determination if finalized would appear to introduce a new level of uncertainty into UK regulatory practice.”¹⁴

The CC may therefore have to adjust its final estimate to correct some of these issues suggesting that Ofwat should not adjust its own methodology based on a provisional decision that may yet be revised.

2.2. Additional Reasons why Ofwat should not lower the TMR

We do not think there is any evidence that the TMR is significantly lower than Ofwat's allowance of 7.4% in PR09.

Figure 2.4
UK Total Market Returns Against Regulatory Precedent

Figure 1: UK expected total equity returns



Source: Ofwat

Figure 2.4 shows that there was a decline in the TMR between December 2008 and December 2009, at which Ofwat made its PR09 determination. At the PR09 determination, Ofwat preferred using long-run averages of the risk-free rate and the equity risk premium to

¹⁴ Hastings (2013): “Northern Ireland Electricity Price Control Review (RP5) (2012-2017) – Hastings Fund Management Submission in Response to Provisional Determination”, p.2

account for the market uncertainty.¹⁵ Ofwat essentially considered the short-term decline in the TMR to not be an important consideration in the context of a five-year price control in an uncertain economic climate.

We do not see any reason why these arguments are less relevant now. Current market conditions remain uncertain, particularly in relation to the unwinding of QE, and any use of short-term market evidence is more likely to lead to an inaccurate estimate of the TMR during PR09. Moreover, Figure 2.4 shows that the TMR has been higher than 6% in the last year. This is in direct contradiction to the CC's view that the lower bound on the TMR is below 6%. Even based on current market evidence, which is in any case an inappropriate way to set the TMR, the TMR is higher than 6%.

¹⁵ Ofwat (December 2009): "Future water and sewerage charges 2010-15: final determinations", Chapter 5.

3. The CC's Decision Cannot be Directly Translated to the Water Sector

In the NIE provisional determination the CC lowered its estimate of the range for total market returns (TMR) to 5%-6.5%. This compares with a previous estimate of 5%-7% used e.g. in the Bristol Water price determination. The CC's main arguments for the change are reproduced below:

“The interpretation of the evidence on market returns remains subject to considerable uncertainty. The CC has said in recent regulatory inquiries that 7 per cent is an upper limit for the expected market return, based on the approximate historical average realized return for short holding periods. We think that it may be appropriate to move away from this upper limit based on historical realized returns and place greater reliance on forward-looking estimates which tend to support an upper limit of 6.5 per cent. We note the following points in support of setting an upper limit for the market return of 6.5 per cent:

- *(a) We consider that the return on the market is a more stable parameter than the ERP. However, it remains the case that it exhibits considerable volatility and cannot therefore be regarded as fixed over time.*
- *(b) We consider that there is logic to the proposition that a long-term decline in RFRs, as we discuss above, should correspond with an increased demand for equities and thus increased prices and lower returns.*
- *(c) We note research conducted by DMS suggesting a clear relationship between real interest rates and real returns on equities and bonds in the subsequent five-year period.*
- *(d) A forward-looking expectation of a return on the market of 7 per cent does not appear credible to us, given economic conditions observed since the credit crunch and lowered expectations of returns.”¹⁶*

The CC's reasons for lowering the top end of its estimate of total market returns are mostly based on considerations about current “forward looking” market data, e.g. points (a), (c) and (d) in the CC explanation either explicitly refer to current conditions / volatility or a five-year period beyond these. We note that five years from now the PR14 period will still have more than a year left till its end.

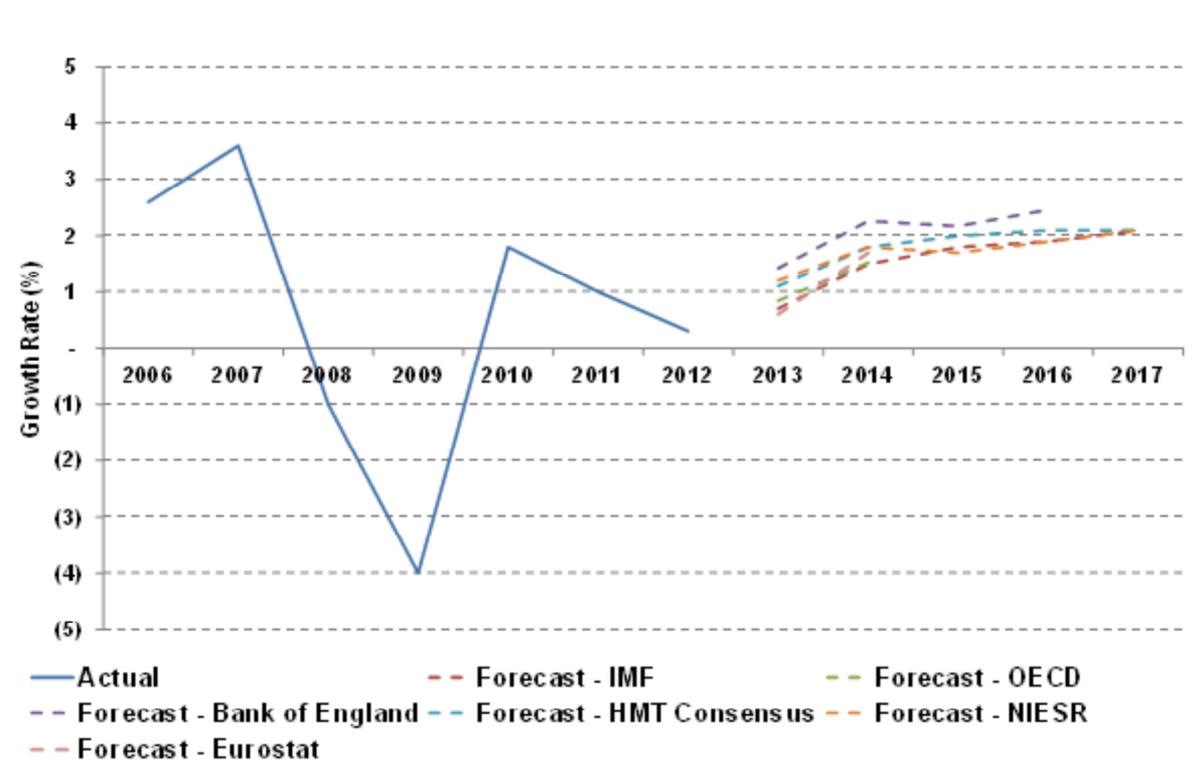
Ofwat will therefore need to assess whether these “forward looking” considerations, which reflect the current period of low interest rates following the Global Financial Crisis (GFC) will also hold for the PR14, which ends in 2020. **We note that the PR14 period ends three years later than the end of the NIE price control period.** Ofwat will need to take a view

¹⁶ Competition Commission (2013): “Northern Ireland Electricity Ltd Price Determination” para. 13.144.

on the likely financing conditions that will prevail over the PR14 period, which may be very different from current conditions. It is far from clear that the current market conditions of low interest rates and expansive monetary policy will still be in place for the majority of PR14.

- E.g. we note that the available indicators actually predict a significant change in macroeconomic and financial conditions over the next 10 years, casting doubt on the assumption that expected market returns over the PR14 period are best described by current exceptionally low returns.
- **Figure 3.1** shows GDP growth for the UK economy is expected to normalise at a level of around 2.0%, significantly above most “current” forecasts for this year and more in line with pre-crisis average growth rates.
- It is also worth noting that macro-economic forecasts do not typically extend to the entire PR14 period.

Figure 3.1
GDP Growth Forecasts for the UK Economy

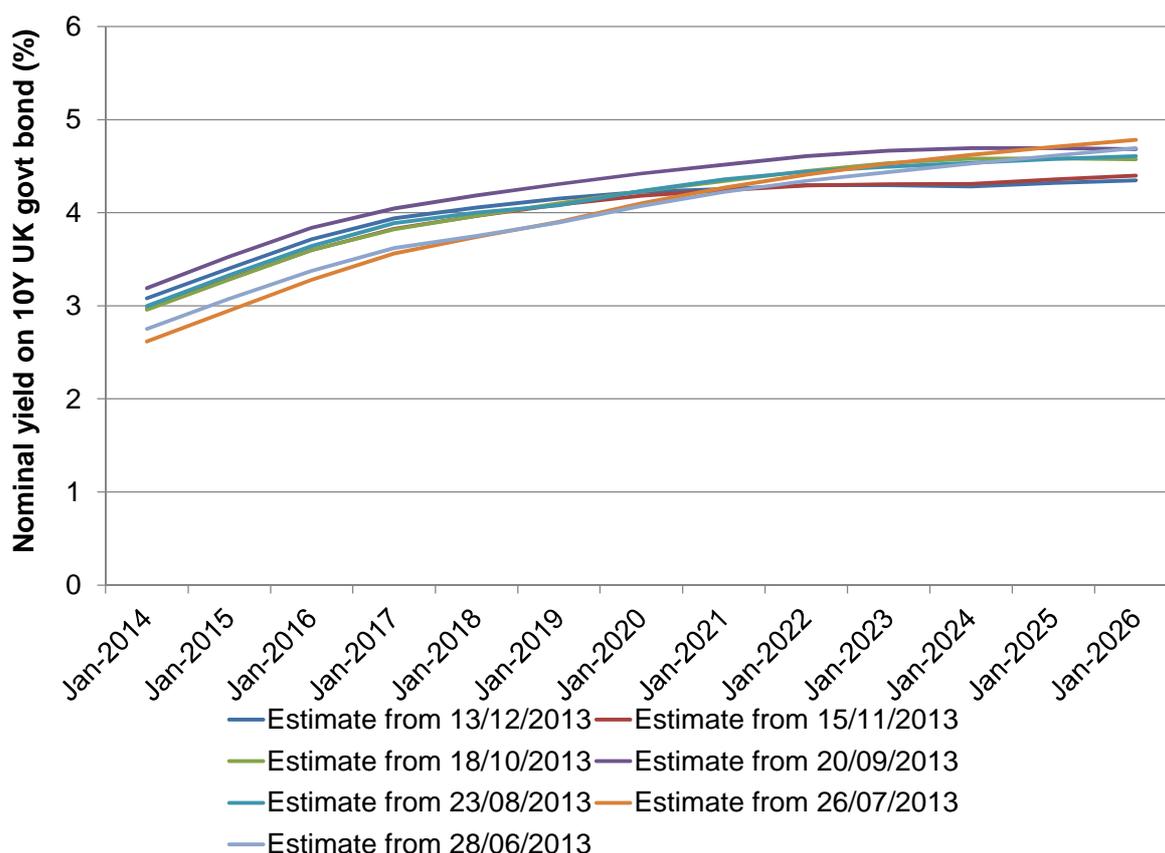


We also observe a strongly upward-sloping forward curve for UK nominal gilts (shown in Figure 3.2) suggesting that the current situation of very low government bond yields is expected to come to an end with very low further downside potential and high upside potential.

Depending on which cut-off date is used the difference between the risk-free rate expected to be prevailing on 31 March 2020 when the PR14 price control is going to expire and the forecast rate for April 2015, i.e. close to today, is between 82 and 115 bps. Averaged over the respective periods from today to 2017 and 2015 to 2023 respectively the average difference in expected risk-free rate for PR14 and the NIE RP is in excess of 40bps or over 10% of the risk-free rate expected to prevail over the NIE RP.

Moreover, we note that the expected increase in the risk-free rate is even greater for RIIO-ED1, which begins in April 2015 and ends in March 2023. Ofgem has launched a consultation on the CC's approach on the equity market return, and our arguments are also applicable to RIIO-ED1. The CC's estimate of the TMR for NIE cannot be directly translated because the RIIO-ED1 periods begins much later and is much longer than the NIE price control. The CC's estimate would not account for the expected in the risk-free rate over RIIO-ED1.

Figure 3.2
Forward Curve on UK 10Y government bonds



Source: NERA analysis of Bloomberg data

The above considerations suggest that the CC's points (c) and (d) may not be applicable for PR14 because of the expected significant increase in bond yields early in the PR14 period suggesting **it is far from clear that the currently observed low yield environment will prevail during the relevant period.**

We also note that the theoretical literature shows that total equity market returns (equity risk premium + risk free rate) have been generally quite stable over a long period of time.¹⁷ In this context, the recent period of low interest rates should be regarded as an exception and we believe that there is little evidence that equity investors have permanently lowered their expectations of returns from both risk-free and risky assets as the CC asserts above in (b):

“We consider that there is logic to the proposition that a long-term decline in RFRs, as we discuss above, should correspond with an increased demand for equities and thus increased prices and lower returns.”

We do not think that there is good evidence to support this statement especially when central banks have not yet fully withdrawn their asset purchase programmes.¹⁸

Limited Macro-Economic Forecasts for PR14 period

We further note that it is generally much harder to forecast over longer horizons, e.g. HMT inflation forecasts are only available for four years, analyst forecasts of dividends for between three and five years and most macro indicators are also available for a forecast period of five years at most. Given the significantly more limited availability of forecast data for the duration of the PR14 period, it is much harder for Ofwat to ascertain an unbiased forecast of expected returns during the PR14 period. As Dimson, Marsh and Staunton (2013) point out:

“for forecasting the long-run equity premium, it is hard to improve on extrapolation from the longest history that is available...”¹⁹

The above statement casts significant doubt on Ofwat's ability to predict expected equity market returns for PR14 any better than by using the long-run historic average. This finding puts into question the applicability of the CC's argument (a).

In summary, for the PR14 period which is very different from the NIE price control period, we do not see justification solid justification for moving away from previous Ofwat and CC practice of relying on long-run market returns and selecting a point estimate of around 7% for total market returns.

¹⁷ See e.g. Smithers and Co (2003): “A Study into Certain Aspects of the Cost of Capital for Regulated Utilities in the U.K., A report commissioned by the U.K. economic regulators and the Office of Fair Trading”, Bollerslev, T. and Zhou, H. (2006): “Volatility puzzles: a simple framework for gauging return-volatility regressions”, *Journal of Econometrics.*; Cochrane, J. in Mehra, R., (2008): “Handbook of the Equity Risk Premium”

¹⁸ E.g. Reuters (18 Dec 2013): Fed cuts bond buying in first step away from historic stimulus

¹⁹ Credit Suisse Global Investment Returns Sourcebook 2013, p. 38.

4. Other Regulators Should Consider the CC's Estimate of Individual Parameters in the Context of the Overall Decision

In this section, we consider the CC's beta estimate for NIE, and whether this is consistent with its approach on the equity market return in the context of the overall cost of equity decision. Arguably, in its decision for NIE, the CC was more generous on the beta assumption than would be justified by empirical evidence, and compensated for this by setting a very low TMR. Thus, other regulators, including Ofwat, should not take the CC's decision on the TMR in isolation, and should consider it alongside its decision on the beta.

4.1. CC Empirical Evidence on the Beta

In order to estimate NIE's beta, the CC looks at empirical estimates of utility company betas. The CC's empirical estimates are presented in Figure 4.1.

Figure 4.1
CC Utility Company Betas

	Two years, daily data			Five years, monthly data		
	Mean	95% interval*		Mean	95% interval*	
SSE	0.45	0.27	0.62	0.43	0.20	0.70
National Grid	0.34	0.26	0.44	0.48	0.33	0.69
United Utilities	0.33	0.23	0.48	0.37	0.28	0.51
Severn Trent	0.31	0.12	0.45	0.34	0.20	0.46
Pennon	0.27	0.05	0.48	0.27	0.08	0.48
Portfolio	0.35	0.26	0.47	0.42	0.33	0.58

Source: CC calculations based on Bloomberg data.

*Over the period, 95 per cent of the observations fell within this range.

Source: CC (November 2013): NIE Provisional Determination, Table 8, p13-51.

Figure 4.1 shows that the 95% confidence interval for the 2-year daily asset beta for GB utilities is in the range 0.26-0.47. The confidence interval for the 5-year monthly asset beta is slightly higher at 0.33-0.53. The CC argues that these empirical estimates do not adequately capture the systematic risk of NIE, and concludes that a range of 0.4-0.45 for NIE would be more appropriate. This clearly represents the upper end of the empirical evidence, particularly on short-term data and suggests that the CC considers short-term GB comparator data to be unrepresentative of the risk for a Northern Irish electricity company.

4.2. CC View of NIE's Risk Relative to GB Comparators

The CC argues that NIE may face greater systematic risk than GB comparators, and thus the empirical estimates for GB comparators would not remunerate investors for the risk of investing in NIE. In particular, the CC argues the "the Northern Ireland regime may be less

well understood by investors".²⁰ This leads to the CC's final beta range of 0.4-0.45 for NIE, which is at the upper end of the empirical estimates of the beta for GB comparators.

We do not find any evidence that the Northern Irish regulatory regime is any less well understood than the regulatory regime for GB utility comparators. The regulatory regime for Northern Ireland has been in existence since 1992, and the CC's provisional determination for NIE is for the fifth price control, RP5. There were no substantial changes to the regime from the previous price control, RP4, and therefore investors are likely to have a full understanding of the regulatory practices within the regime.

By contrast, the regulatory regimes for the GB comparators in the CC's comparator set have seen major changes. UK water companies, three of which are in the CC's comparator set, have seen substantial changes to the regulatory regime as Ofwat has introduced competition in the retail sector.²¹ We note in section 5.3 that S&P considers the upcoming changes in regulatory parameters to be a credit negative for the water sector.

Moreover, for the GB energy comparators, Ofgem has introduced the RIIO framework, which is three years longer than the previous price control, and creates substantially greater uncertainty for investors. In addition, the RIIO framework introduced a number of new incentive mechanisms, particularly for electricity transmission and distribution, which again increases the systematic risk that investors face.²²

We therefore consider that the regulatory regimes for the GB comparator set have seen significant changes. In comparison, the NIE regulatory regime appears to have been relatively stable and there is no evidence that the Northern Ireland regime is less well understood by investors. This implies that the CC's beta estimate for NIE should lie closer to the mid-point of the empirical estimates of the beta for GB comparators.

Thus, the CC's beta estimate is generous to NIE, and would lead to an overestimate of the cost of equity. However, it appears the CC compensates for this by setting an equity market return below the long-run expected levels. As argued in section 2, we believe the CC's estimate of the TMR is too low, but if this is considered in conjunction with the CC's estimate of the beta, the net effect on the cost of equity is minimal.

4.3. Conclusion on CC Beta Estimate

Given the CC's high beta estimate, we believe Ofwat should not simply translate the CC's TMR decision across to the UK water sector. Ofwat should consider the TMR estimate in the context of the CC's entire decision on the cost of equity, particularly the fact that the beta is higher than empirical estimates. The CC notes in its provisional determination for NIE that NIE faces similar systematic risks to GB regulated utilities, with the exception that the

²⁰ Competition Commission (2013): "*Northern Ireland Electricity Ltd Price Determination*" para. 13.168, p13-52.

²¹ Ofwat (July 2013): "Setting price controls for 2015-20 – final methodology and expectations for companies' business plans".

²² Ofgem (March 2013): "Strategy decision for the RIIO-ED1 electricity distribution price control – Overview".

Northern Irish regime is less well understood. However, given we believe the Northern Irish regime is just as well understood by investors as the GB regime, Ofwat should also consider applying a beta close to the CC's estimate of 0.4-0.45 for NIE.

5. The CC's Determination has Significant Implications for Risk and Financing

5.1. The Impact of the CC's Proposals

The immediate impact of the CC's decision of giving greater weight to current data is mirrored in Fitch's downgrade of NIE's credit rating. Fitch quotes the significantly reduced revenues allowed under the lower return framework as the main driver of higher default risk:

Fitch Ratings says that it would likely downgrade Northern Ireland Electricity's (NIE) senior unsecured rating to 'BBB+' from 'A-' if the proposal included in the Provisional Determination published by the Competition Commission (CC) on 12 November 2013 materialised in the Final Determination (FD). (...)

We expect the reduction in cash flow generation, mainly driven by the lower regulatory allowed revenues proposed by the CC of GBP69m (6.4% lower than in UReg's FD), to negatively affect NIE's post-maintenance and post-tax interest cover ratio as calculated by Fitch and limiting the company's financial flexibility.²³

We discuss the impact of a similarly low return allowance on the water companies in the next section.

Beyond the immediate impact on NIE the CC decision contains a number of aspects that have the potential to increase perceived regulatory and systematic risk of the sector as a whole. Specifically, the CC's proposition of using more short-term evidence and changing methodology by giving more weight to forward-looking data introduces three additional risks into the regulatory process that are likely to increase regulatory perception of risk:

- Using more short-term data to estimate the cost of capital will lead to a more volatile cost allowance that is not in line with a long-term investor's approach to assessing required returns. This increase in volatility is likely to lead to a higher asset beta (as the WACC allowance – and therefore company's profits - would become “cyclical” and volatile);
- Using more short-term data to estimate the cost of capital allowance for a long regulatory period also increases the risk of the regulator using an allowance that is not representative of *average* conditions over the regulatory period or the investment horizon (which tends to be longer); and
- Using forward-looking data, which is by definition more subjective and open to interpretation than historical data, increases regulatory discretion, which in turn increases regulatory risk.

We discuss these points in turn.

²³ Fitch (2013): Press release regarding NIE downgrade, <http://www.reuters.com/article/2013/11/27/fitch-competition-commissions-provisiona-idUSFit67800820131127>

5.1.1. Short-term data leads to a more volatile allowance over time

By giving more weight to short-term data the CC's approach introduces additional volatility into the setting of the allowed rate of return as historical averages are more stable and designed to "smooth out" for short run volatility.

Long-term investors are unlikely to be adjusting their required hurdle rates significantly in response to short-term events unless they are convinced that a change in the available rates of return is permanent. This is set out e.g. in Hastings' response to the CC provisional determination:

*"Hastings takes what we believe is a relatively widely shared view that infrastructure assets are long-term investments. We therefore believe that a long-term view is appropriate when estimating key parameters such as the risk free rate and market risk premium (...) The compression of short term market returns due to excess market liquidity does in no way mean that investors will be willing to invest in long-term regulated businesses with illiquid capital at the same low short term realised returns. Investors will continue to require regulated assets to deliver long-term returns consistent with their long-term benchmarks for assets with comparable long-term risk profiles."*²⁴

Against this context of stable return requirements by long-term investors any approach that transfers fluctuating short-run rate risk onto the utility will affect adversely the perceived riskiness of an investment. E.g. Moody's writes:

*"[In the "cost and investment recovery" category] Moody's will thus assess a regulator's willingness to keep the volatility and the uncertainty associated with operating and financial costs with the company or to pass these on to consumers"*²⁵

Moreover, introducing volatility runs counter to the main investment rationale according to the Water UK investor survey, which is "stability and reliability."²⁶ This increase in volatility is also likely to lead to a higher asset beta (as the WACC allowance – and therefore company's profits - would become "cyclical" and volatile). Even if there was good evidence that recent data on TMR showed lower market returns, the likelihood that a switch to a regulatory methodology that relied on more current market data could increase beta should, by itself, be sufficient for regulators to be very cautious about changing their methodologies. At the very least, more research needs to be undertaken between the overall WACC methodology ("historic" versus "current" market data) and beta before a decision is made to change approaches.

²⁴ Hastings (2013): "Northern Ireland Electricity Price Control Review (RP5) (2012-2017) – Hastings Fund Management Submission in Response to Provisional Determination", p.3

²⁵ Moody's (2009): "Regulated Electric and Gas Networks", p.10

²⁶ Indepen (2013): "Water UK Investor Survey", p.13

5.1.2. Short Run Forecasts have a larger margin for error

A second aspect related to the use of short-run data is an increased risk of choosing a spot estimate that is unrepresentative of *average* conditions over the regulatory period. Using an estimate of TMR based on short-run, forward-looking data viewed at a single point in time runs the risk of selecting a point estimate that reflects a transitory position in the tail of the distribution of the required cost of capital. This severity of this risk is increased when the regulatory period is long and still some way into the future as reliable forecast data will only exist for a comparatively small part of the regulatory period and there will be a long period for which allowed returns and required returns will be out of line.

This is less of an issue in the US where both the regulator and the regulated company can call a re-determination at any time if the allowed parameters have become too far removed from actual parameters. The same is not true in jurisdictions with long, fixed regulatory periods such as the PR14 period.

5.1.3. Increased regulatory discretion

A third risk element introduced by the use of short-term and forward-looking data is the introduction of additional regulatory discretion and subjectivity. While there are established databases for historic returns there is considerably more uncertainty around forward-looking estimates with a number of competing data providers and assumptions having a strong effect on the eventual estimate, a fact the CC itself noted as part of the Bristol Water decision.²⁷ In selecting its preferred method, data provider and assumptions there is considerably more room and requirement for the regulator to choose a point estimate from a wide range that is by nature not verifiable.

The use of forward-looking data therefore inevitably introduces an additional element of subjectivity into a sector where according to the Water UK investor survey “*the top ranked risk for all investment types [is] regulatory risk*” already.²⁸ As such any increase in regulatory discretion is likely to lead to increased perceived risk by investors.

The UK water license reform debate provides an applied example of increased regulatory discretion having a direct negative impact on perceived risk in a sector. As Moody's wrote:

Continuing uncertainty around key features of their licences is credit negative for water and sewerage companies in England and Wales. (...) Ofwat's new proposals to modify water companies' licences follow draft licence changes published in December 2011. These earlier proposals were rejected by all of the incumbent water companies, largely on the grounds that the changes were unnecessarily broad and created uncertainty which would undermine the stability and predictability of the regulatory regime to the detriment of operators' ability to raise capital. (...) It appears that the biggest area of

²⁷ Competition Commission (2010): “*Water Price Limits Determination*”

²⁸ Indepen (2013): “*Water UK Investor Survey*”, p.20.

*dispute between the companies and the regulator is around future flexibility.
(...) The degree of flexibility that Ofwat is seeking is surprising...²⁹*

Ofwat will likely want to avoid any increase in risk associated with the move to more short-term data, especially as it runs counter to Ofwat's stated aim of ensuring long-term financeability as set out in the run-up to the PR14 price control.³⁰

5.2. Acceptability to Equity Markets

The CC's provisional determination for NIE is likely to have led to less demand from equity market investors in a free and open market because of the low allowance on the cost of equity. However, NIE is indirectly owned by the Irish government, and thus we have not been able to see the acceptability to equity markets thus far following the CC's provisional determination.

The risk that equity market investors sell the stock would be a clear indication that the CC's allowance on the cost of equity is too low. We have argued that the CC has set a TMR lower than the long-run level, and investors are likely to view this as a significant risk not only now, but also for future price controls. A focus on current market data is a departure from previous CC reviews and would lead to uncertainty at future price control reviews, because of the volatility of current market data. Thus, equity market investors, particularly long-term investors, are likely to display less interest in the stock in a free and open market.

However, NIE has been owned by ESB since December 2010,³¹ and the Irish government has a 95% share in ESB.³² Therefore, the equity investors do not operate in free and open market conditions. The reaction to the CC's NIE determination cannot be seen in equity markets, and thus it would be wrong for Ofwat to conclude that there is no risk that equity market investors will leave the market.

In a CAPM framework, the cost of equity should be set such that it is agnostic to the nature of ownership, and just because NIE is effectively owned by the State, does not mean that there is no long-term risk of low equity market investment. Ofwat should consider the strong likelihood that if investors operated freely, the CC's determination would lead to substantial uncertainty for equity market investors.

5.3. Financing Issues

As set out above the CC's proposed approach would lead to increased volatility and reduced predictability in setting allowed returns for UK water companies.

²⁹ Moody's (29 Oct 2012): Continuing uncertainty for UK water sector with proposed licence changes - Announcement

³⁰ Ofwat (July 2013): "Setting price controls for 2015-20 – final methodology and expectations for companies' business plans", p141.

³¹ ESB Press Release (December 2010): "Joint Statement from ESB and Viridian – ESB concludes NIE acquisition". Source: <http://www.esb.ie/main/press/pressreleaseWS.jsp?id=444>.

³² ESB: Annual Report and Accounts 2012, p2.

The UK regulatory framework is currently rated “Aaa” against this criterion, which makes up 15% of the total Moody’s rating grade. It remains to be seen how rating agencies would react to any change in the long-established methods applied in the UK but a downgrade of the stability and predictability criterion cannot be completely ruled out.

Independent of the rating agencies’ view on the “stability and predictability” criterion the significant reduction in allowed revenues would likely lead to significant pressure on company credit ratings as noted by Moody’s recent credit negative guidance on the UK water sector. Moody’s notes that Ofwat has suggested that the allowed rate of return for PR14 should “start with a 3”, which would be a significant reduction from the vanilla WACC for PR09 of 5.1%.³³ In addition, Moody’s believes an allowed rate of return significantly below the level proposed by companies in their business plans would be a credit negative for the UK water sector:

“A reduction in allowed returns, below the levels proposed by companies for AMP6, will be credit negative, and will result in downward rating pressure for those that are weakly positioned within their rating category and/or have limited flexibility to adjust their dividend and financial policies.”³⁴

S&P also shares this view and considers any reduction in the allowed rate of return may increase financial risk profiles:

“We see potentially greater downside to the financial risk profiles of the companies what we rate, which are currently “significant” or “aggressive”. We base this opinion on the regulator’s current emphasis on affordability, which will likely result in no real tariff increases, and the lower anticipated cost of capital.”³⁵

The immediate consequences of not allowing companies to earn a rate of return commensurate with a competitive risk-return trade-off can also be gleaned from Fitch (projected) downgrade of NIE’s credit rating in reaction to the CC proposals (set out above) and investor commentary such as e.g. provided by Hastings in response to the CC provisional decision for NIE:

“We believe there is a danger that regulated businesses, faced with an increased uncertainty of regulatory approach and aggressive reductions in allowed returns without compensating reductions in risk, may not be able to attract capital in today’s competitive and liquid global financial markets. Debt or equity investors may simply choose to redirect capital to other investments with superior risk-adjusted returns.

³³ Moody’s (December 2013): “Ofwat announcement on change of price review process credit negative for UK water sector”.

³⁴ Moody’s (December 2013): “Ofwat announcement on change of price review process credit negative for UK water sector”.

³⁵ S&P (December 2013): “What Ofwat’s Price Review For 2015-20 Could Mean For Rated Water and Wastewater Companies in England and Wales”, p2.

Although, in the near term, such moves [lowering allowed returns and moving to a more short-term view] may hold down regulated returns, the outcomes will also have longer term negative consequences due to reduced capital attractiveness, increased pricing for the sector and discouraged necessary investment. Under-investment can cause cascading negative implications for UK regulated businesses, system reliability, safety and consumer costs in general.”³⁶

In addition Moody's also picks up on the significant negative rating impact that lower allowed returns in the water sector would have on regulated companies.

A reduction in allowed returns, below the levels proposed by companies for AMP6, will be credit negative and will result in downward rating pressure³⁷

From the above results and positioning it is clear that there would likely be a significant impact on financing costs that would have to be reflected in Ofwat's modelling of financing costs and that would potentially necessitate a change in assumptions underlying the cost of debt index.

5.4. Investment Incentives

With regard to investment incentives, we do not believe that a short-term view on the equity market return is entirely supportive of the long-term investment in the UK water sector.

Recent years have seen an increase in long-term investors in the UK utilities sector. As set out above these tend to be interested in stable long-term returns and less concerned about short-run changes to the rate of return. One factor that has often been quoted as a driver of their interest has been the long-run and stable regulatory model towards remunerating assets that has been the norm in the UK.

Moving to short-run data would be more reflective of the investment horizon of more short-run oriented PE investors and likely change investment incentives for the two sets of investors for the following reasons:

- Potentially re-setting total market returns in line with current market data at every review has the effect of only giving investors certainty about their returns for a single regulatory period, after which returns will be reset and there is little predictability over future returns.
- Ownership of UK DNOs has seen a trend from ownership by corporates (e.g. United Utilities, E.ON, EDF) towards more long-term oriented private owners (including infrastructure investors who explicitly state their long-term ambitions such as CKI.)

³⁶ Hastings (2013): “Northern Ireland Electricity Price Control Review (RP5) (2012-2017) – Hastings Fund Management Submission in Response to Provisional Determination”, pp.4-5

³⁷ Moody's (20 Dec 2013): Ofwat announcement on change of price review process credit negative for UK water sector

The OFT database on Infrastructure Ownership and Control stock-take (2010) confirmed this general trend towards the involvement of longer horizon infrastructure funds across a broader range of utilities finding that:

“Forms of infrastructure ownership have changed markedly in recent years, with infrastructure funds playing an increasingly prominent role. (...)

Physical infrastructure investments typically take a long time and require long pay-back periods, so these investments are more suited to investors with matching long-term time horizons. This is indeed one of the main arguments made by infrastructure funds, and a stated reason for their recent growth”³⁸

As set out at the start of this section the importance of long-term stability and returns for investors in the UK utilities sector is also confirmed by e.g. Hastings' recent response to the CC's provisional decision. This investor focus on long-run stability is also confirmed by responses to Water UK's investor survey:

“The most frequently mentioned objectives of investment in the water sector were: stability and reliability (68% of holders of unlisted equity and 53% of bond holders); and the long term nature of the investment (52% of listed equity holders).”³⁹

On the other hand the consequences of falling short of these investor expectations are illustrated in Hastings' response to the CC NIE decision:

“We believe there is a danger that regulated businesses, faced with an increased uncertainty of regulatory approach and aggressive reductions in allowed returns without compensating reductions in risk, may not be able to attract capital in today's competitive and liquid global financial markets. Debt or equity investors may simply choose to redirect capital to other investments with superior risk-adjusted returns.

Although, in the near term, such moves [lowering allowed returns and moving to a more short-term view] may hold down regulated returns, the outcomes will also have longer term negative consequences due to reduced capital attractiveness, increased pricing for the sector and discouraged necessary investment. Under-investment can cause cascading negative implications for UK regulated businesses, system reliability, safety and consumer costs in general.”⁴⁰

A second issue raised by Ofgem in its recent consultation on the CC's provisional determination for NIE is that:

³⁸ OFT (2010): Infrastructure Ownership and Control Stock-take, Final report: Main findings, pp. 4 & 43.

³⁹ Indepen (2013): Water UK Investor Survey, p. 4.

⁴⁰ Hastings (2013): *ibid*, pp.4-5.

“A potential problem with using a relatively stable measure of equity market return is that it might create incentives for over-investment when the market anticipates lower returns, and deter investment when the market anticipated higher returns.”⁴¹

However, over a long regulatory period for which there is a lack of robust forecast data (like for PR14) there is a comparable problem, even when using current data. In particular, there is a risk of providing insufficient investment incentives based on current data when the forecast is for required yields to trend upwards (also see section 3). As such the use of current market data does not provide any major advantage over the use of long-run averages in this realm of investment incentives.

In addition to potentially limiting the attractiveness of the sector by not allowing companies to earn the appropriate rate of return once market rates pick up again during the next six years (until the end of the PR14 price control period), the move towards a more current approach to setting the allowed rate of return introduces volatility and uncertainty about the long-term returns available to an investor. One impact of uncertainty on investment incentives is noted by the CC itself:

“One consequence of this uncertainty is that NIE has restrained its capital expenditure as outlined in Appendix 2.5, paragraph 52. It said that this was maintained at the minimum level consistent with compliance with its statutory and Licence obligations. This level is likely to be different from levels of efficient capital expenditure which we would consider to be in the public interest. For example, reduced investment might lead to higher risks of supply failure, less network development, inefficient long-run investment decisions and so on.”⁴²

While the uncertainty introduced by the CC decision is more long-term rather than immediate in nature, the general issue about the negative impact of uncertainty on investment remains a pertinent feature that is amplified by the CC decision.

⁴¹ Ofgem (December 2013): “Consultation on our methodology for assessing the equity market return for the purpose of setting RIIO price controls”, p10.

⁴² Competition Commission (2013): “Northern Ireland Electricity Ltd Price Determination” para. 3.63.

Appendix I. Inconsistency with International Precedent

In its provisional determination for NIE, the CC sets a post-tax cost of equity of 4.4%-5.2%,⁴³ at NIE's actual gearing of 50%.

However, we do not believe that the CC's allowance for the cost of equity is in line with international precedent. In New South Wales in Australia, the regulator IPART has recently set out its methodology for setting the cost of equity.⁴⁴ In its final report, it decides to estimate the cost of equity using a combination of long-term average and current market data. IPART argues that target rates of return are influenced primarily by long-term averages and expectations:⁴⁵

“The assumptions they [independent experts] use in assessing companies commonly reflect long-term views but are adjusted when there are more sustained variations from current rates. Similarly, we understand that target rates of return that firms typically use in evaluating investment decision are relatively stable. While they may be adjusted from time to time in response to current rates, they are strongly influenced by long term averages and expectations.”

This focus on long-term averages is significantly different from the CC's approach, which adopts a short-term averaging approach on the TMR. It is particularly at odds with the CC's view that the current market approach is required following the financial crisis. IPART argues that the market uncertainty following the financial crisis means there should be greater emphasis on long-term market data instead of current market data, in order to ensure the methodology is robust to all types of market conditions.⁴⁶ Therefore, the CC's methodology for NIE is in direct contradiction to this Australian precedent.

Moreover, in the US, electricity utilities have an average return on equity of 9.6%, which support a cost of equity of 8.0%, at 50% gearing. This is shown in Table I.1 below.

⁴³ Competition Commission (2013): “Northern Ireland Electricity Ltd Price Determination” Table 13.11, p13-56.

⁴⁴ IPART (December 2013): “Review of WACC Methodology – Research – Final Report”.

⁴⁵ IPART (December 2013): “Review of WACC Methodology – Research – Interim Report”, p11.

⁴⁶ IPART (December 2013): “Review of WACC Methodology – Research – Final Report”, p5.

Table I.1
US Electric Utility Return on Equity

Utility	S&P LT Credit Rating	Authorised Return on Equity (%)	Debt/Total Cap (%)
Maui Electric Company, Limited	BBB-	9.0	42
United Illuminating Company	BBB	9.15	49
Niagara Mohawk Power Corporation	N/A	9.3	40
Potomac Electric Power Company	BBB+	9.36	51
Cross Texas	N/A	9.6	N/A
Wind Energy Transmission Texas	N/A	9.6	N/A
Baltimore Gas and Electric Company	BBB	9.75	51
Atlantic City Electric Company	BBB+	9.75	57
Avista Corporation	BBB	9.8	51
Puget Sound Energy, Inc.	N/A	9.8	53
Tucson Electric Power Company	N/A	10.0	59
Consumers Energy Company	BBB	10.3	48
Average		9.6%	50%
Real Cost of Equity		8.0%	

Source: NERA analysis of Bloomberg and US utility company data, Consensus Economics (October 2013); Note: To calculate the real cost of equity, we assume an inflation assumption of 1.5%, from the Consensus Economics estimate for the US for 2013. We apply the Fisher formula to calculate the real cost of equity from the nominal return on equity. In our analysis, we exclude all companies with generation assets accounting for more than 50% of total assets, in order to compare with the CC NIE determination.

Table I.2 shows that the average real cost of equity for US electric utilities is 8.0% at 50% gearing. This is substantially above the cost of equity allowed by the CC if compared at the same gearing, as shown below.

Table I.2
Comparison of US Utilities Cost of Equity to CC Decision

	Cost of Equity at 50% Gearing
US Electric Utilities	8.0%
CC NIE Provisional Determination	4.4% - 5.2%

Source: Bloomberg, CC NIE Provisional Determination (November 2013)

The real cost of equity for US electric utilities is substantially higher than the CC's allowance for NIE, if compared at a consistent gearing level. Given the CC's provisional determination has assumed a very low TMR, we believe this is the driver for why there such a large dispersion.

Ofwat should take into account this US precedent alongside the Australian IPART precedent, which suggests that the CC's view on the TMR is not shared by US or Australian regulators and would lead to an unprecedented low allowance on the cost of equity.

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