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Regulated water utilities - UK

Covenanted financing structures help mitigate growing risks

» **A tough regulatory price review in 1999 led companies to seek financing outperformance by increasing leverage, although with wide-ranging restrictions.** Lower cost allowances and tougher efficiency targets prompted a number of companies to increase gearing, in the hope of maintaining equity returns while accommodating increasing investment requirements. Since then, companies with close to 60% of the industry's regulatory capital value (RCV) have adopted highly covenanted financing structures, which - in most cases - allowed them to increase leverage to up to 85% of their RCV. More recently, Ofwat voiced concerns that companies with higher levels of gearing may have lower financial resilience as the "impact of cost shocks or poor performance is magnified to a smaller equity base". However, the restrictions imposed on the companies and additional creditor rights associated with highly covenanted financial structures mitigate a range of risks, including those associated with higher leverage.

» **Highly leveraged companies have not underperformed peers.** While companies in highly covenanted structures have been accused of focusing on financial engineering rather than operational performance, some have been consistently among the strongest performers in the sector. Operational performance will be more important post 2020, with stronger incentives increasing the possibility of greater cash flow volatility.

» **Lower returns and evolving regulation are likely to drive a reduction in gearing for operating companies, but covenanted financing structures continue to support credit quality.** Lower allowed returns create pressure on companies' interest cover ratios, with many highly leveraged companies having to reduce gearing as they seek to maintain covenant headroom and/or credit quality. Even as gearing falls, financing structures continue to have value, with business restrictions, liquidity reserves and creditor step-in rights, among others, providing credit enhancement.

» **The use of derivatives has introduced additional risks for some highly leveraged companies, which are hard to rectify.** Synthetic securities created through swaps carry particular risk for creditors, including (1) potentially sizeable mark-to-market movements, which may become payable if the swap carries early termination clauses; and (2) swap payments ranking super-senior to other senior lenders, which can reduce recovery prospects for the latter. However, the risks vary and are not present to the same degree in all highly covenanted financing structures.

A tough regulatory price review in 1999 led companies to seek financing outperformance by increasing leverage, although with wide-ranging restrictions

Across the UK water sector, the first highly covenanted transactions debuted in 2001, with the majority of existing financing arrangements put in place in the five-year period to 2005.

Exhibit 1
Timeline of highly covenanted transactions and gearing levels

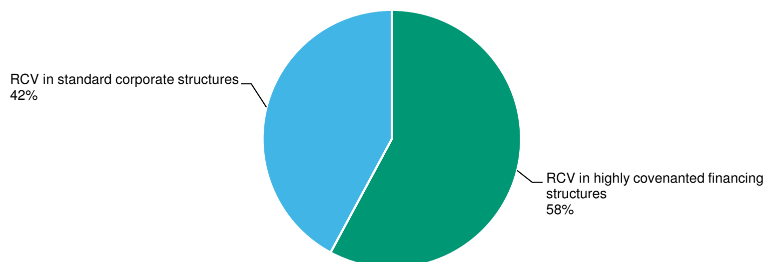
Company	Timing of financial restructuring	Regulatory gearing prior to restructuring	Regulatory gearing after restructuring	Moody's adjusted gearing at March 2018
Sutton & East Surrey	15-Mar-01	4.3%	46.9%	73.6%
Welsh Water	10-May-01	66.7%	87.9%	56.7%
Anglian	23-Jul-02	51.9%	82.0%	77.9%
Southern	23-Jul-03	57.4%	85.5%	78.5%
South East	19-Jul-04	34.3%	78.8%	78.2%
Thames Water	24-Aug-07	49.8%	67.9%-74.1%	82.4%
Yorkshire Water	15-Jul-09	65.5%	65.6%-72.8%	75.6%
Affinity	18-Jan-13	55.4%	77.1%	79.6%
Artesian I				
Portsmouth	26-Jun-02	7.0%	75.9%	63.0%
Dee Valley (now Severn Trent Water)	22-Aug-02	n/a	48.9%	n/a
South East (Mid Kent)	09-Dec-02	35.8%	76.7%	78.2%
Bristol	7 May 2003 & 12 Feb 2004	40.8%	67.4%	61.8%
	13-Jun-05	58.1%	75.6%	
Southern	05-Jul-04	85.5%	85.6%	78.5%
Artesian II				
Bristol	7 May 2003 & 12 Feb 2004	40.8%	67.4%	61.8%
Southern	23-Jul-03	57.4%	85.5%	78.5%
Bournemouth (now South West Water)	20-Apr-05	18.2%	52.3%	n/a
South East (Mid Kent)	24-Jun-05	78.1%	77.4%	78.2%
Artesian III				
South Staffs	20-Dec-05	66.8%	80.5%	66.1%

Source: Companies' financing documentation, annual performance reports and financial statements, Ofwat's reporting on financial performance, Moody's Investors Service

The financing structures remained popular with equity investors over the following price review periods and further M&A activity within the sector resulted in Thames Water Utilities Limited (CFR: Baa1 negative), Yorkshire Water Services Limited (CFR: Baa2 negative) and Affinity Water Limited (CFR: Baa1 negative), opting for higher gearing at the price of tighter business restrictions in 2007, 2009 and 2013, respectively. As a consequence, to date, UK water companies with close to 60% of the industry's RCV exhibit highly covenanted financing structures.

This publication does not announce a credit rating action. For any credit ratings referenced in this publication, please see the ratings tab on the issuer/entity page on www.moodys.com for the most updated credit rating action information and rating history.

Exhibit 2
UK Water March 2018 RCV split by capital structure



Source: Ofwat, Moody's Investors Service

The structures largely evolved in response to the 1999 regulatory price review, which saw the UK water (and energy network) sector's first major regulatory challenge since its privatisation in 1989.

While ultimately supporting an increase in leverage to, inter alia, support high acquisition debt as well as maintain equity returns in a difficult environment, the covenant restrictions embedded in these financing structures were first and foremost designed to mitigate credit risk, by (1) removing the exposure to event risk at the wider group (similar to many licence conditions); and (2) bolster creditor protection and step-in rights (largely in addition to the protection that licences can provide).

Today, most UK water companies' licences include specific terms that provide some protections against business and financial risk factors, including restrictions on the activities of the licenced business, the requirement to maintain an investment-grade credit quality and limitations on distributions or other support to affiliated companies. However, the detailed restrictions vary across companies and many of these terms were introduced into individual licences only recently. In an effort to equalise licence terms, the Water Services Regulation Authority (Ofwat) intends to implement additional credit-enhancing features into licences that appear quite similar to those found in highly covenanted financing structures.

Although these 'ring-fencing' features are important in protecting credit quality, they do not by themselves enhance credit quality. Therefore, to support a strong investment-grade credit quality despite higher gearing, all of the highly covenanted financing arrangements in the regulated utilities space provide additional creditor protection, for example, restrictions on distributions and associated step-in rights in the event of a covenant breach as well as designated liquidity reserves or facilities. These features aim to reduce the probability of default and/or improve the recovery prospects for senior creditors in an event of default, and typically enhance credit quality by around one to two notches.

Exhibit 3 illustrates the interaction between ring-fencing and credit-enhancing features; the appendix provides additional detail on evolving licence conditions as well as a comparison with existing financing arrangements (please also see "Regulated water utilities and energy networks - UK: Increasingly complex group structures create diverging opco and holdco credit risk", October 2018).

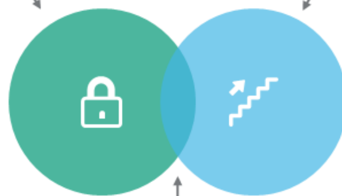
Exhibit 3

Examples of ring-fencing and credit-enhancing features

Features that provide ring-fencing

Insulate credit quality from credit and event risk of wider group

» Arm's-length transactions with affiliates
» No financial assistance for affiliates
» No cross default
» Insulation from parental distress/insolvency
» Business independence
» Independent directors



Features that provide credit enhancement

Mitigation against risks inherent to the business, financial structure and/or related to management failure

» Security
» Designated liquidity
» Intercreditor arrangements & standstill
» Limitation on maturity concentration or amortising debt structure
» Step-in Rights at certain trigger levels

Features that provide both ring-fencing and credit enhancement

» Financial covenants; restricted payment test
» Restriction on business activities
» Restriction on additional indebtedness
» Independent review of financial model and forecast

Source: Moody's Investors Service

While the covenanted financing structures allowed companies to significantly increase leverage, with a large portion funding shareholder's acquisitions costs, the monies raised also supported new investment requirements under EU environmental obligations, such as the Urban Wastewater Directive, which was adopted in 1991. It might also be argued that, to some extent, dividend payments compensated shareholders for the restrictions and loss of flexibility resulting from the covenant package.

The covenant protections and reduced event risk also helped to address:

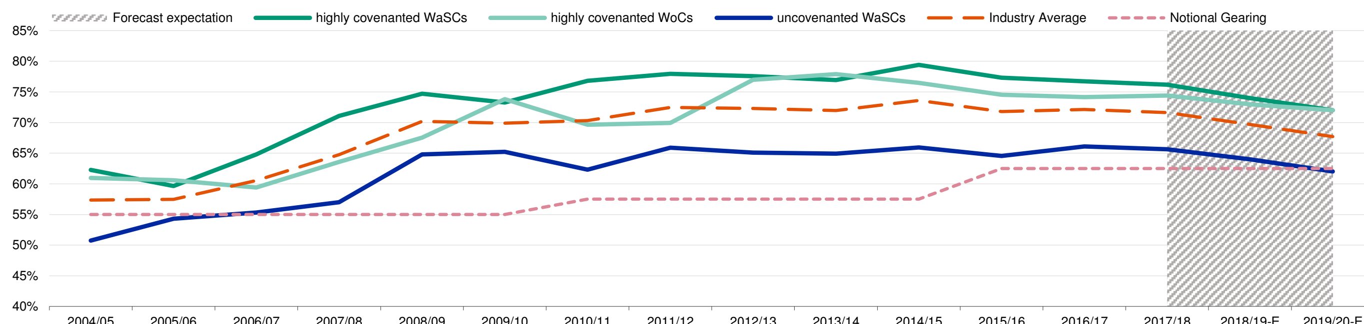
» **Perceived regulatory risk:** The 1999 review resulted in an overall 12% cut in allowed revenue, compared with the prior period, comprising a 14% reduction to claw back past underspend, a 10% reduction for expected future efficiency savings, plus a 12% increase to allow for higher environmental expenditure.

» **Limited track record of shareholders' financial policies:** New shareholders may have ventured into different business opportunities to the detriment of overall credit quality.

» **Managing the cost of long-term funding:** The highly covenanted structures created greater clarity and certainty around the business set up and its minimum financial profile, allowing companies to access very long-dated funding at relatively favourable terms in the then prevailing market conditions. In addition, the tranching of debt into classes with different priority of claim against the business's cash flow facilitated access to a wider range of investors.

Overall, the UK water sector's aggregate gearing increased to around 70% over the 10 years following the 1999 price review, where it has broadly remained since (see Exhibit 4).

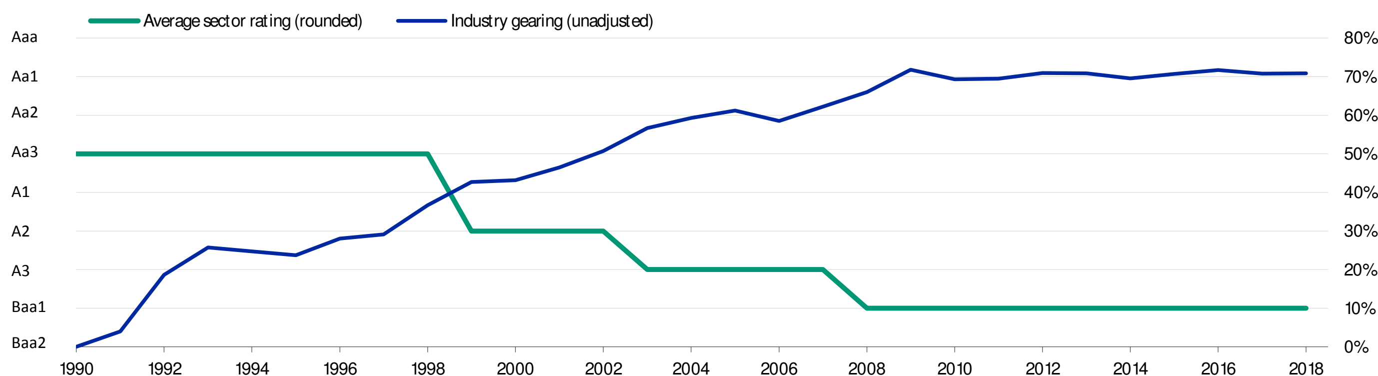
Exhibit 4
Weighted average (by March 2018 RCV) gearing of UK water companies has remained on average around 70% over the last 10 years



Note: Gearing as adjusted by Moody's for pension obligations and operating leases.
Source: Companies' financial statements, Moody's Investors Service

Average ratings in the sector have largely moved in line with sector gearing, with the credit quality of more highly geared companies being supported by the additional creditor protections afforded through business and financial restrictions embedded within the highly covenanted financing structures.

Exhibit 5
Average sector credit quality remains solid investment-grade



Note: (1) Average rating reflects the credit quality of the corporate family, where different debt tranches have been issued. (2) Regulatory gearing as defined by Ofwat, excluding Moody's standard adjustments.
Source: Ofwat (until 2014/15), companies' annual performance reports, Moody's Investors Service

The debt tranching incorporated into the highly covenanted structures, with the majority of debt issued as part of a more senior class, also means that most of our rated debt within the sector currently remains at A3 level, albeit with more than 70% of issuers having a negative outlook.

Highly leveraged companies have not underperformed peers

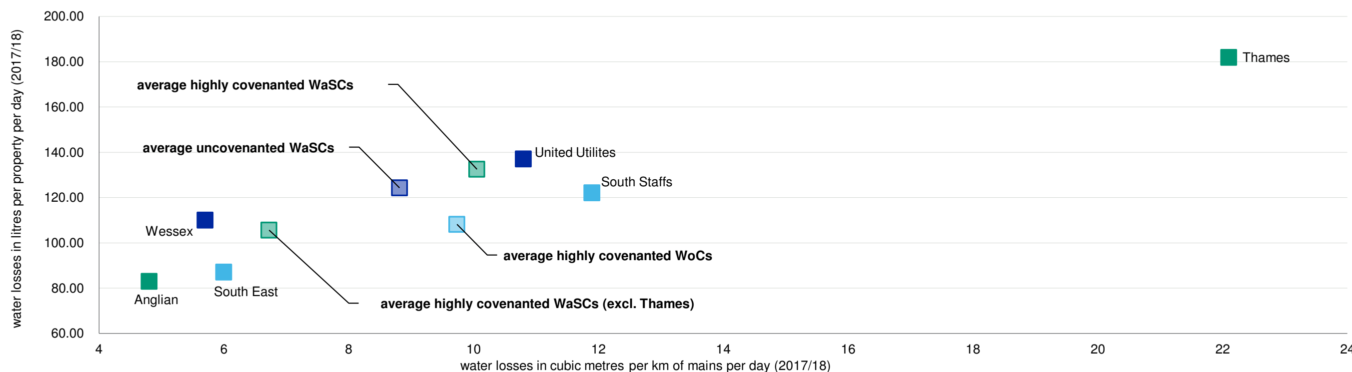
Recent political and press commentary on the sector has accused companies in highly covenanted financing structures of being more focused on financial engineering than on operational performance. While it is true that some highly leveraged companies have underperformed, others, including Anglian Water Services Ltd. (CFR: Baa1 negative) and Yorkshire Water, have been consistently among the strongest performers in the sector, even though the latter's credit quality has been weakened by its exposure to inflation-linked derivatives and the associated high cost of embedded debt.

Below, we focus on some key performance measures, including leakage, outcome deliveries and customer service, over the current 2015-20 regulatory period, to illustrate this point:

Leakage: Anglian Water exhibits lowest leakage levels across the sector by a number of measures

Based on the industry's core leakage measures, which take into account the length of the network as well as the number of properties connected, Anglian Water remained the top performer in 2017/18, whereas Thames Water was the weakest. On a weighted average basis, companies' performance remains relatively similar, regardless of funding choices and, if Thames Water was excluded as an outlier, the highly covenanted WaSCs outperformed their peers on average.

Exhibit 6
Highly-covenanted companies (excl. Thames) have outperformed the sector on average
UK water's leakage performance for FY2017/18, based on the latest industry definitions

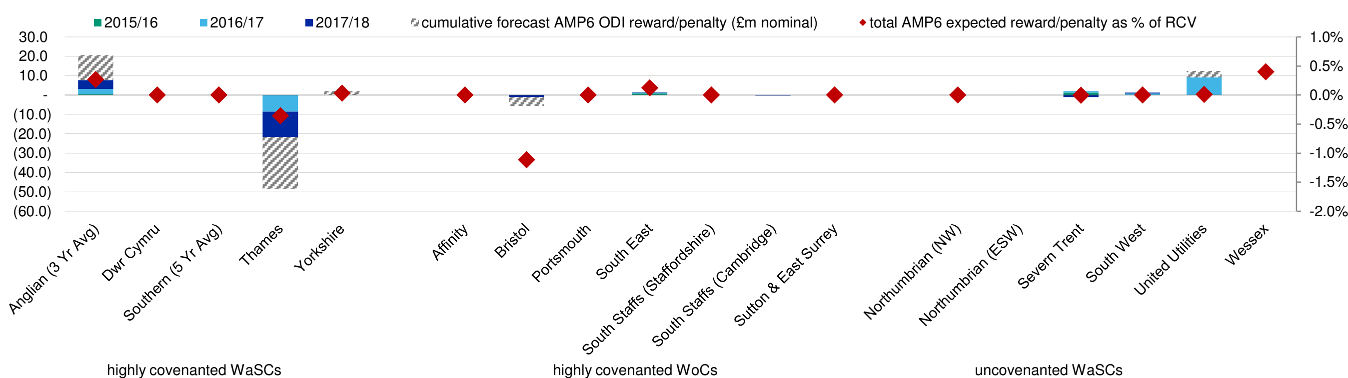


Note: Averages weighted by number of properties and total km of mains, respectively. For each group, the best and worst performers are also shown.
Source: discoverwater.co.uk

The recently submitted business plans and ongoing work to reduce leakage would improve the overall industry position on both measures, but we expect Anglian Water to remain the best performer.

Current leakage performance will also result in rewards and penalties under each company's outcome delivery incentives (ODIs), which have been set in accordance with key performance commitments promised to customers. As at March 2018, companies forecast aggregate leakage performance incentives over the current five-year period to broadly range between +/-0.5% of the RCV.

Exhibit 7
UK water's leakage ODI rewards/penalties to date as well as cumulative forecast for the entire five-year period 2015-20
As reported at March 2018



Source: Companies' performance reports

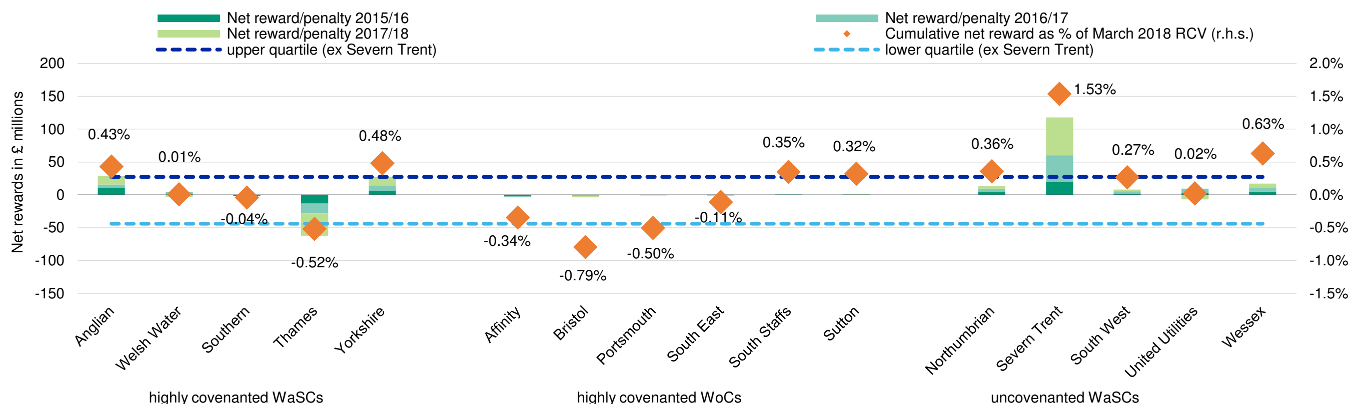
Overall ODI performance: Severn Trent remains ahead, but Anglian Water and Yorkshire Water show strong reward potential

On aggregate ODI performance over the current regulatory period, Severn Trent Water Limited (A3 negative) has accumulated the largest rewards to date, primarily linked to its performance to reduce sewer flooding. Excluding Severn Trent, two of the highly covenanted WaSCs as well as two of the highly covenanted WoCs are among the best performers, achieving upper quartile rewards.

Exhibit 8

UK water's cumulative ODI performance over the first three years of the current 2015-20 period

As reported at March 2018 (in 2012/13 prices)



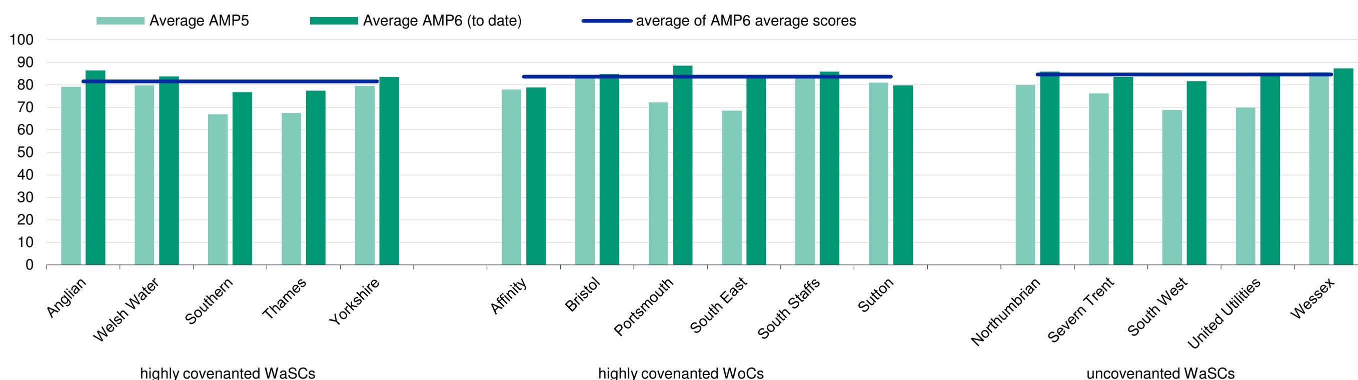
Source: Companies' performance reports

SIM: Customer performance has improved across all companies, with most companies now reporting scores well above 80 (out of 100)

Customer service has significantly improved across all companies since the service incentive mechanism (SIM) measure was introduced. SIM reflects a qualitative assessment of customer survey responses and a quantitative measure of unwanted customer calls or complaints. There appears to be no material difference in performance based on capital structure, with average SIM scores over the current regulatory period to date at 82 for the highly covenanted WaSCs, 84 for the highly covenanted WoCs and 85 for the uncovenanted WaSCs (see Exhibit 9).

Exhibit 9

UK water's average SIM performance



Note: Average scores exclude Dee Valley Water (85) and Bournemouth Water (87), which are now part of Severn Trent Water and South West Water, respectively.
Source: Companies' performance reports

While the two highly-geared companies Thames Water and Southern Water Services Limited (CFR: Baa2 negative) have continuously exhibited the lowest SIM scores, Anglian Water has consistently performed above average.

Lower returns and evolving regulation are likely to drive a reduction in gearing for operating companies, but covenanted financing structures continue to support credit quality

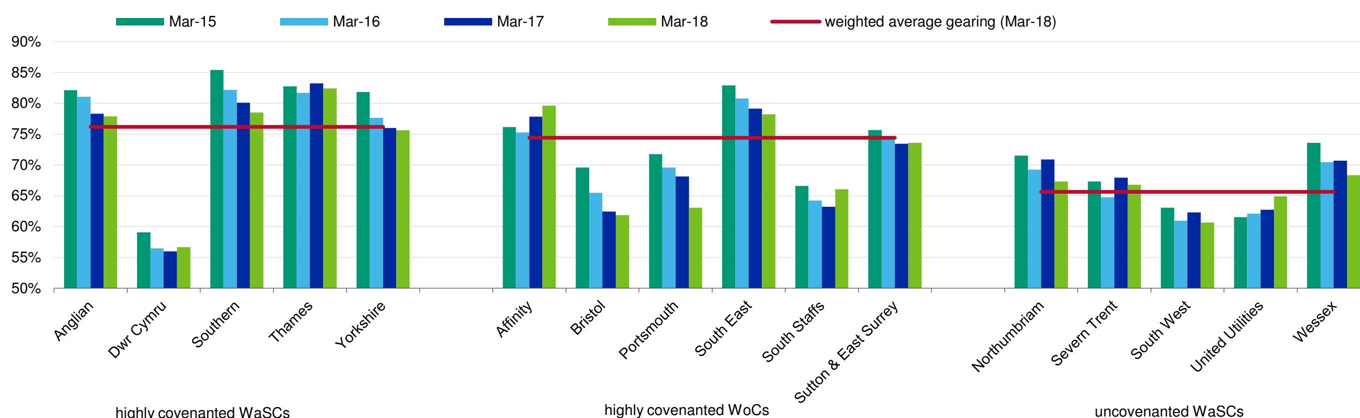
In its final methodology for the 2019 price review, published in December 2017, Ofwat indicated a significant cut in allowed returns under an assumption that the current low interest-rate environment will persist. While the overall cut will be partially offset by a switch in indexation measures, we expect that, in cash terms, returns will still fall from 3.6% currently for the wholesale activities to around 2.9% on average from 2020 (please see "Regulated water utilities - UK: 2018 outlook changed to negative as tough price review outweighs current performance", January 2018, for further details).

Moreover, in July 2018, Ofwat concluded on a consultation that will require companies to share perceived outperformance from gearing above 70% and clearly justify their dividends in the context of operational performance. The first of these new measures, which will apply from April 2020, will primarily penalise highly leveraged companies, further curbing their earnings in an already tough regulatory environment.

With the likely cut in allowed returns being flagged well in advance, companies have tried to position themselves to face the additional operational pressures from increasing efficiency and performance requirements. The highly covenanted WaSCs, for example, have reduced their average gearing from around 80% at the beginning of the current period in April 2015, to nearer 75% at March 2018, remaining only 10% more levered than the uncovenanted WaSCs (whose average gearing remained flat over the same period).

Exhibit 10

Evolution of UK Water OpCo Leverage (as per Moody's adjusted metrics)



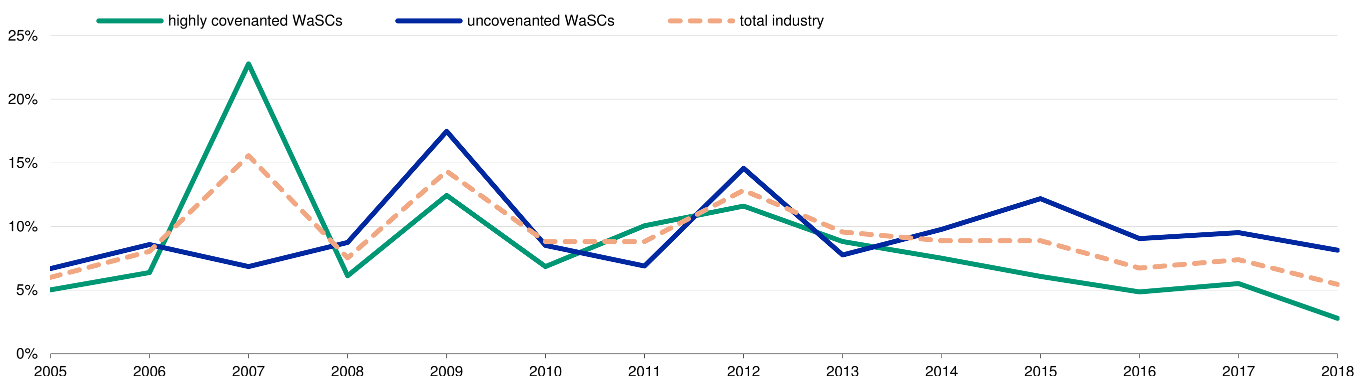
Source: Companies' annual reports, Moody's Investors Service

To date, the modest de-gearing has largely been achieved by curtailing dividend distributions as interest coverage metrics have moved closer to covenant and/or rating trigger levels.

As illustrated in Exhibit 11, we estimate that the RCV-weighted average dividend yield over the actual equity portion of the RCV has been around 4% for the highly covenanted WaSCs (5% excluding Welsh Water) since the start of the current regulatory period in 2015, approximately half of the yield paid by uncovenanted WaSCs.

Exhibit 11

UK water's dividend yields are reducing for highly covenanted companies



Source: Companies' annual reports, Moody's Investors Service

We expect this trend to continue to allow companies to maintain covenant headroom and support credit quality as allowed returns keep falling.

However, even as gearing declines with pressure on interest coverage metrics increasing, covenanted financing arrangements continue to have value.

Examples of key creditor protections that we consider valuable include, but are not limited to:

» **Restrictions on business activities**, designed to allow the company to fulfill its licenced obligation but reduce the likelihood of other, non-regulated activities influencing the business risk profile;

» **Restrictions in relationship with and support of affiliates**, which reduce the risk of contagion in relation to other group companies' credit quality;

» **Strong governance principles and independent directors** to ensure that high standards of governance are followed, regardless of ownership;

» **Maintenance of sufficient financial resources, including designated liquidity reserves**, with companies being required to maintain sufficient cash to support operating and capital expenditure on a 12-months forward-looking basis, as well as additional debt service reserves in the form of restricted cash or specified liquidity facilities;

» **Restricted payment conditions and step-in rights** to reduce the risk of excessive cash withdrawals and ensure a minimum financial profile can be maintained, with step-in rights upon breach of certain covenant levels allowing creditors to take corrective action to address potential problems early on;

» **Limitations around maturity concentration** to reduce refinancing risks;

» **Detailed hedging policies**, aimed at reducing exposure to interest rate fluctuations, as well as limiting the potential risk of material super-senior credit exposure as well concentration towards individual counterparties;

» **Cash flow waterfall**, which provides for an orderly enforcement of the priority of claim among different creditors either pre- and/ or post-enforcement; and

» **Security and intercreditor agreements**, which underpin the rights and obligations of creditors, including a standstill requirement in the event of default, designed to improve senior lenders' recovery rates.

While certain protections have been weakened over time as the industry and its regulations have evolved, changes have had limited credit implications in the context of the companies' current underlying credit quality.

Most common changes to financing arrangements in the UK water sector relate to:

» **Hedging counterparties, liquidity facility providers and account banks:** Originally very strict rating requirements, which were designed to completely remove counterparty risk exposure, have been softened in the wake of banks' declining credit quality, but with limited credit implications for the affected issuers. However, changes to the terms and conditions of liquidity facilities have also created less clarity around their long-term availability.[1]

» **Cash lock-ups:** The test to lock up cash may have become weaker or less valuable, for example, through changes in the regulatory regime, where new definitions do not fully capture the additional complexity, thereby allowing companies much more flexibility to prevent a lock-up event occurring and/or providing less creditor protection in the event of credit deterioration. The shift to totex in the UK water sector is one example, where a company's ability to choose the portion of expenditure it wants to receive remuneration for through revenue may endanger the usefulness of the interest cover covenant.[2]

In comparison with the evolution of financial structures in other infrastructure sectors,[3] creditor protections embedded in the UK water financing transactions remain, on balance, rather strong and continue to support credit uplift. Nevertheless, individual companies, for example, Southern Water or Yorkshire Water have experienced additional challenges to their credit quality linked to an extensive use of inflation-linked derivatives.

The use of derivatives has introduced additional risks for some highly leveraged companies, which are hard to rectify

The availability of inflation-linked bonds at attractive rates subsided with the dawn of the financial crisis in 2008/09, and since then many highly-geared companies have been looking for other means to achieve the benefits that inflation-linked debt can provide.

UK regulated utilities' real model creates a cash flow mismatch with nominal fixed rate debt

The regulators setting the tariffs for the UK's utility sectors tend to calculate revenue requirements and returns on the regulated assets on a "real" basis (i.e. before adjusting for inflation), while a significant portion of the utility companies' debt usually remains on conventional nominal fixed-rate terms. This results in a mismatch over the short-term as companies earn a real return on an asset base that is only growing with inflation over time, whilst having to pay a nominal coupon that includes an embedded inflation expectation upfront. It can also result in a longer term mismatch in cash flow, if outturn inflation differs materially from the inflation expectation embedded in the nominal interest rate.

Index-linked debt instruments allow borrowers to link the coupon and principal repayment of a debt obligation to an inflation index, usually the UK Retail Prices Index (RPI). The real coupon on an index-linked debt instrument excludes any inflation assumptions and is, thus, lower than for conventional fixed-rate debt of the same tenor.

Over the life of the index-linked debt instrument, only the interest calculated on the basis of the real coupon rate over the indexed principal is paid out in cash, whilst the principal amount grows annually with actual RPI inflation. Consequently, the cash interest payments in the earlier years of an index-linked debt instrument will be lower than those for a conventional fixed-rate debt instrument. However, over the life of the index-linked instrument, interest payments will increase as the principal amount grows with inflation, and could exceed conventional fixed-rate interest payments, depending on actual inflation versus the inflation expectation embedded in the fixed-rate coupon, as well as the overall tenor of the debt instrument. Furthermore, the principal repayment due on the index-linked instrument at maturity (usually a bullet repayment) will be larger than that of a conventional fixed-rate instrument, reflecting the indexation accrual.

In summary, the benefit of inflation-linked debt in a real return regulatory environment is that ongoing cash flow for interest payments as well as final principal repayment at maturity match the profile of, and provide a hedge for, the real allowed returns linked to an asset base growing with inflation.

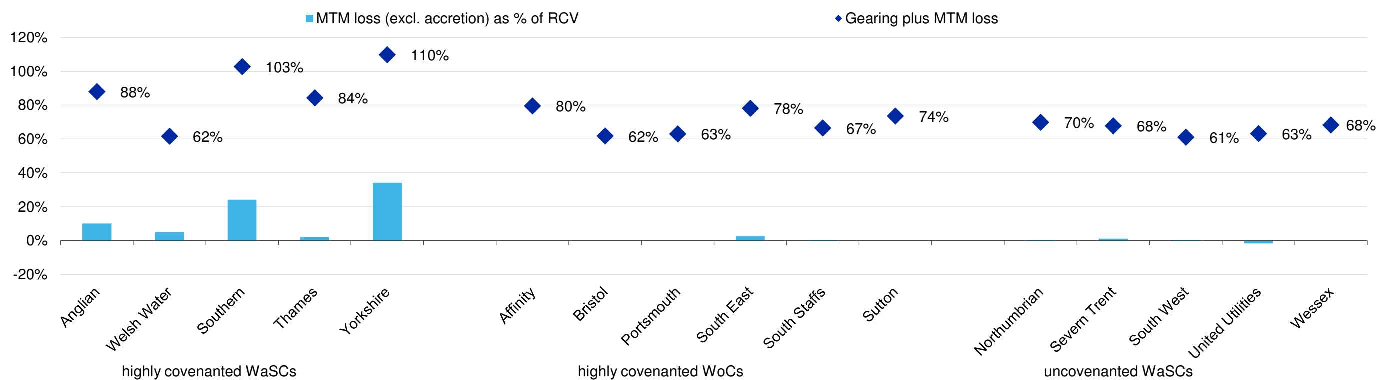
While long-dated inflation-linked securities match a UK regulated company's cash flow profile, synthetic securities created through swaps carry particular risks for creditors, including (1) potentially sizeable mark-to-market (MTM) movements, which may become payable if the swap carries early termination clauses; (2) a (partial) loss of the economic hedge in the event of frequent pay-down of inflation accretion and/or swap termination; and (3) swap payments ranking super-senior to other senior lenders in the cash flow water fall, which can reduce recovery prospects for senior lenders.[4]

The detailed terms of individual swaps can also mask financial obligations similar to loans without appearing in the company's reported debt, and derivatives have been executed to provide a short-term boost to financial ratios, thus reducing the value of protective financial covenants. For example, swaps with a requirement for frequent accretion pay-down may result in relatively strong interest coverage ratios over the period of interest deferral, as only cash interest is counted for the financial covenant calculation. Thus, covenants would be improved, even if the deferral period was only three or five years. By contrast, the underlying position, reflected by, for example, treating the inflation accretion as annual interest cost, could be significantly weaker.

As interest coverage ratios have come under increased pressure from lower returns and, in some cases, weaker operational performance, companies are increasingly looking at alternative financial solutions, albeit usually only achieving temporary relief.

However, as illustrated in Exhibit 12, the risk exposure to derivatives varies and, while concentrated on the highly covenanted companies, does not affect all of them to the same degree.

Exhibit 12
MTM loss can be substantial for companies with high derivative exposure



Note: MTM values in companies' annual performance reports may not have been reported on a consistent basis. MTM loss calculated excluding accretion element, which is already reflected in the underlying gearing ratio. The above gearing plus MTM loss excludes FV of debt calculations.
Source: Companies' annual performance reports

The companies, whose credit quality is most constrained by the use of inflation-linked swaps, including Southern Water and Yorkshire Water, have typically hedged significant amounts at a single point in time and very long into the future. For these reasons, the associated risk exposure is likely to continue to hurt the companies' credit quality for the foreseeable future, given that complete removal of the derivatives would - at least in current market conditions - be prohibitively expensive.

Appendix — Licence conditions versus transaction documentation

The licence conditions of the UK water companies already include certain restrictions related to the appointed water and sewerage activities, transactions with associated companies, asset disposals and a requirement to maintain an investment grade credit quality, where failure to comply with the latter would lead to a cash lock-up.

Exhibit 13

Standard UK water ring-fencing conditions

Standard ring-fencing conditions		Notes re application
Accounts and accounting information - Condition F		
F 6. 1	transactions with associated company on arm's length basis, without any cross-subsidies in either direction	
F 6. 8	not make payments to associated company in excess of prices determined by market-testing	not covererd under the new condition P, and, thus, does not apply to Severn Trent, South West and Hafren Dyfrdwy (ex Dee Valley)
F 6. 10	no transfer of assets to associated company to which Condition K(3) applies, unless approval by Ofwat	
F 6. 11 (1)	no guarantees for liabilities of associated companies or intercompany loans, unless approved by Ofwat	
F 6. 11(1A)	no cross-default with respect ot associatd companies' obligations, unless Ofwat consent	
F 6. 12	board-approved dividend policy to allow dividends only if appointed business not negatively impacted and payment would be expected to reward efficiency and management of economic risk	
F 6A. 1	maintain adequate financial and managerial resources, and adequate system of planning and internal control to ensure secure carrying out of its functions	financial and managerial resources only for Wessex, Bristol, Portsmouth and Sutton & East Surrey
F 6A. 2A	certificate that adequate resources are availabel for the next 12 months	
F 6A. 2B	provide information taken into account in giving certificate, and inform Ofwat as soon as practicable if conditions arose that would have resulted in certificate not being repeated	
F 6A. 3	directors to inform Ofwat if appointee or any group company embarks on activity that could endanger financing appointee's function	
F 6A. 4	certificate to be signed by directors and accompanied with auditor's opinion	
F 6A. 5A	business of appointee to be run as if it was a standalone business; in line with good industry practice	
F 6A. 5B	comply with reporting requirements of companies listed on LSE	
F 6A. 5C	maintain listing of financial instruments, unless market conditions make it inappropriate to maintain such listing	
F 6A. 6(1)	the appointee or any associated company as an issuer of corporate debt maintains at all times an issuer credit rating which is an investment grade rating	
F 6A. 7(1)	except with Ofwat's permission, the appointee shall not transfer, lease, licence or lend any sum, asset, right or benefit to an associated company, if (i) the appointee does not hold an investment grade rating; (ii) if one or more ratings held are not investment grade; or (iii) one of the ratings has been placed on review for downgrade (or equivalent) with the potential of losing investment grade level or is gaining a negative outlook at the lowest level of investment grade; expcept in the context of arms' length services, costs/ fees for a financing subsidiary or surrender of corproate tax/payment of group relief	does not apply to Welsh Water, Wessex, Bristol and Portsmouth
Procurement of services - Condition F1		
F1. 1	all procurement to comply with law and follow competitive tendering procedures	only Anglian Water and Welsh Water
Further strengthening of financial ring-fence - Condition F2		only Welsh Water; Anglian Water suspended
F2. 2	restriction in acquiring shares and investments, except with Ofwat consent, unless in relation to regulatory activities, linked to a financign subsidiary or as part of treasury transaction	
F2. 4	de-minimis business allowed if aggregate annual turnover of all these activities does not exceed 2.5% of appointed business turnover	
Ring-fencing and protected land - Condition K in latest version of the licence		
K 3 (1)	if a special administration order were made, the Appointee would have available to it sufficient rights and assets (other than financial resources) to enable the administrator to manage the affairs, business and property as required by the special administration order	
K 4 and K 6	restriction on sale of protected land with a value > £1 million or transfer to asscoiated companies if value > £0.5m	
The role of the appointee's ultimate controller and UK holding company - Condition P		
P 1(1)	legally enforceable undertakings in favour of the appointee	
P 1 (2)	provide appointee information to maintain compliance with licence obligation; refrain from activities that could cause non-compliance; board should contain no less than three independent directors	Welsh Water's licence includes requirement for majority of independent directors; new condition P3. 2 does not include requirement for independent directors but, Ofwat's governance principles do, which have to be complied with
P 3	immediately inform Ofwat, if undertaking no longer legally enforceable or binding, or its conditions are no longer met	
P 4	except with Ofwat consent, no direct contract with ultimate controller or associated company if any of condition P is not complied with	

Source: Companies' licences, Ofwat, Moody's

Historically, licence conditions and restrictions have not always applied universally across all appointed licensees, but Ofwat is currently consulting on strengthening and aligning the ring-fencing provisions under a new Condition P, which already applies to Severn Trent Water, South West Water and Hafren Dyfrdwy (ex Dee Valley Water, now owned by Severn Trent).

Exhibit 14

Updated UK water ring-fencing conditions

Updated ring-fencing conditions		Notes re application
New Condition P - Ring-fencing		currently only Severn Trent Water, South West and Hafren Dfyrdwy (ex Dee Valley)
P 2	conduct the appointed business as if it was the sole business, meet Ofwat's corporate governance principles and demonstrate how it is doing so	
P3. 1	legally enforceable undertakings by ultimate controlling party in favour of the Appointee	
P3. 2	provide appointee information to maintain compliance with licence obligation; refrain from activities that could cause non-compliance	
P3. 3	except with Ofwat consent, no direct contract with ultimate controller or associated company if any of condition P is not complied with	
P3. 5	immediately inform Ofwat, if undertaking no longer legally enforceable or binding, or its conditions are no longer met	
P4. 1	maintain adequate financial and managerial resources, and adequate system of planning and internal control to ensure secure carrying out of its functions	
P4. 2	if a special administration order were made, the Appointee would have available to it sufficient rights and assets (other than financial resources) to enable the administrator to manage the affairs, business and property as required by the special administration order	
P5. 2	maintain listing of financial instruments, unless market conditions make it inappropriate to maintain such listing (if ultimate controller not listed in LSE, P5. 1)	
P6. 1	transactions with associated company on arm's length basis, without any cross-subsidies in either direction	
P6. 3	no guarantees for liabilities of associated companies, intercompany loans or cross-defautl obligations, unless approved by Ofwat	
P6. 5	no transfer of assets to which Condition P4. 2 applies to associated company, unless approval by Ofwat	does not apply to South West Water
P7. 2	the Appointee or any associated company as an issuer of corporate debt maintains at all times an issuer credit rating which is an investment grade rating	
P7.3	where Ofwat agreed that no investment-grade rating required, certificate by appointee that in view of board the appointee is of investment grade credit quality, and the reasons supporting that view	only South West Water and Hafren Dfyrdwy (ex Dee Valley)
P 7. 3/4 or P7. 4/5 (if P 7. 3 above is used)	except with Ofwat's permission, the appointee shall not transfer, lease, licence or lend any sum, asset, right or benefit to an associated company, if (i) the appointee does not hold an investment grade rating; (ii) if one or more ratings held are not investment grade; or (iii) one of the ratings has been placed on review for downgrade (or equivalent) with the potential of losing investment grade level or is gaining a negative outlook at the lowest level of investment grade; expcept in the context of arms' length services, costs/ fees for a financing subsidiary or surrender of corproate tax/payment of group relief	
P8	board-approved dividend policy to allow dividends only if appointed business not negatively impacted and payment would be expected to reward efficiency and management of economic risk	
P9. 2	submit ring-fencing certificate together with financial statements	
P9. 3	appointee to inform Ofwat if appointee or any group company embarks on activity that could endanger financing appointee's function	
P9. 4/5	provide information taken into account in giving certificate, and inform Ofwat as soon as practicable if conditions arose that would have resulted in certificate not being repeated	
P9. 6	certificate to be signed by directors and accompanied with auditor's opinion	
P10	immediately inform Ofwat of circumstances that could have a material adverse effect on fulfilling regulatory functions	

Source: Companies' licences, Ofwat, Moody's

Exhibit 15 compares the above common ring-fencing provisions from companies' licences with relevant covenants on the financing structures of the more highly leveraged companies.

Exhibit 15

Purpose and practical application of licence conditions and contractual covenants

Licence Conditions	Highly-Covenanted Financing
Restriction on Business Activities	
Purpose: To enable the regulated business to be run on an independent basis in a manner which permits it to meet its obligations as a provider of water and sewerage services and does not expose it to the different risk profile of non-regulated activities.	
Licence	**Covenants**
Condition F2, which currently only applies to Welsh Water (it has also been agreed by Anglian, but is currently suspended), prohibits a water company from carrying out activities other than those required of, or connected with, the regulated water and sewerage business (except for the "de-minimis business", defined as non-regulated activities whose aggregate turnover does not exceed 2.5% of the total turnover of the water company). The licence condition also prohibits the regulated business from holding or acquiring investments of any kind (unless it obtains the prior written consent of the Regulator), except for investments in companies that carry on one or more of the activities permitted to the regulated business, finance subsidiaries, or investments acquired in the ordinary course of treasury management operations (provided the company has appropriate risk controls and other governance procedures in place).	Activities of the regulated business are limited to carrying out the water and sewerage operations. Any subsidiaries are subject to restrictions on their activities and non-regulated businesses are transferred out of the regulated company. The regulated business has its own staff and support functions. The companies are prohibited from merging with or taking over a lower-rated entity or being dissolved. All existing and new debt of the regulated business should be separated from debt of the non-regulated businesses.
Practical application	**Practical application**
Compliance with this condition is monitored by Ofwat through the financial reporting requirements of the relevant water companies. Furthermore, Condition F6A.3(1) (or the new Condition P9.3) requires the directors of the water company to notify Ofwat whenever they become aware that the water company or any group company is proposing to embark upon any activity which is not part of the regulated business and which may be material in relation to the water company's ability to finance the carrying out of its statutory functions.	Newly created special purpose entities, particularly for the issuance of debt, tend to be established before closing. The memorandum and articles of association of the SPVs provide limitations on their activities, including prohibition of debt outside the ring-fenced financing. Ownership of the SPVs is clearly established. There may be some limitations on separation of the regulated and non-regulated businesses, such as pension schemes, that must remain combined. There is typically no mechanism for independent review of compliance with certain of the ongoing measures, such as shared staffing.
Arm's-Length Transactions with Affiliates	
Purpose: To ensure that the regulated business conducts its affairs in a transparent and independent way from the rest of the group.	
Licence	**Covenants**
Condition F6.1 (or P2 and P6.1 in the updated standards) requires the water company to ensure that transactions with affiliates are at an arm's-length distance with no cross-subsidies. Condition F6.8 (which has no equivalent application under the new updated Condition P) prohibits the water company from making any payments to affiliates in respect of services rendered to the regulated business which exceed prices ascertained by the water company through market testing in accordance with the arrangements approved by Ofwat or, if market testing is inappropriate, the proportion of the affiliate's costs agreed by the Regulator.	All transactions with affiliated companies must be undertaken at fair market value on an arm's-length basis. No cross-subsidies are permitted between the regulated business and other activities in the company or group.
Practical application	**Practical application**
Conditions F6.2-4 require the water company to report in its regulated accounts transactions with affiliates (on an individual basis if the amount involved exceeds 0.5% of the company's turnover or £100,000).	The provisions should be included in the financing documents so that a breach is a technical default and permits remedy by the security trustee. It may be difficult to determine market prices for some contracts as the number of competitors is small. Enforcement is dependent upon the independent board members and possibly outside auditors.
Restrictions on Asset Transfers or Disposals	
Purpose: To ensure that the regulated business has control of the necessary assets to carry out its statutory functions and prevent the transfer of essential and valuable assets to other group companies.	
Licence	**Covenants**
Condition F6.10 (or the new Condition P6.5) prohibits a water company from transferring rights and assets required to conduct the regulated business to affiliated companies, without the consent of the Regulator and otherwise than in compliance with the Regulator's directions concerning the valuation of the asset and the treatment of the consideration in the regulatory accounts. Condition K requires companies to obtain prior consent from Ofwat for disposals valued over £500,000 to an affiliate and £1 million to a third party.	Restrictions typically limit disposal of assets to those that are no longer necessary for running the business and will not impact revenue generation. Assets must be disposed of at fair market value. Some financings specifically define Permitted Disposals to be those that do not result in a breach of the financial ratios. Proceeds from disposals should be subject to the same restrictions as other types of surplus cash (i.e. dividend distribution tests).
Practical application	**Practical application**
The water companies provide details of all transfers and disposals of assets in their annual performance reporting.	Fair market value may be difficult to ascertain for certain asset types in this industry. However, requirements linked to financial ratios will provide some protection for large-scale disposals.

<table>
<tr><th colspan="2">No Financial Assistance or Cross-Default Provisions with Affiliates</th></tr>
<tr><td colspan="2">Purpose: To insulate the regulated business from the credit risk of companies belonging to the same corporate group and prevent the transfer of financial resources from the water company to other group companies.</td></tr>
<tr><td>Licence</td><td>Covenants</td></tr>
<tr><td>Conditions F6.11 (or new Conditions P6.5 and P6.4) prohibits a water company from granting affiliated companies loans or guarantees and from entering into cross-default obligations (except with the consent of the Regulator).</td><td>All future debt of the regulated business must be issued by the financing SPV or the operating company for the purpose and under the terms of the highly covenanted financing structure. No cross-defaults are permitted (where default by a non-regulated business triggers a default by the water company or any of the ring-fenced SPVs). Covenants also typically preclude any guarantee by a ring-fenced entity of any obligation that falls outside the ring-fencing.</td></tr>
<tr><td>Practical application</td><td>Practical application</td></tr>
<tr><td>There are currently no specific regulatory reporting obligations covering this area.</td><td>Initial representations from the water company and its financing SPV address any outstanding financial assistance or cross-defaults. Any future borrowings or guarantees are permitted only if the creditors accede to the common intercreditor and security arrangements.</td></tr>
</table>

<table>
<tr><th colspan="2">Availability of Financial Resources</th></tr>
<tr><td colspan="2">Purpose: To ensure sufficient funds are available to the water company to properly carry out its statutory functions and finance the capital expenditure programme.</td></tr>
<tr><td>Licence</td><td>Covenants</td></tr>
<tr><td>Conditions F6A.1 – F6A.4 (new Condition P4.1 in conjunction with ring-fencing certificate under conditions P9.2-P9.6) impose on the directors of the water company the obligation to submit to the Regulator a certificate stating that, in their opinion, the company will have available to it sufficient financial resources and facilities to enable it to carry out, for at least the next 12 months, the regulated activities (including the investment programme). The directors need to indicate to the Regulator the main factors that they have taken into account in issuing the certificate.</td><td>Covenants typically require the water company to maintain, also through the financing SPV, sufficient funding to operate the regulated business and carry out maintenance and enhancement capital expenditure, also in order to ensure compliance with the parallel licence obligation. This requirement should be equal to at least 12 months' projected opex and capex and may be met through projected operating cash flows, O&M reserves and authorised loan facilities. Debt service reserve liquidity facilities should not be counted towards satisfaction of this requirement.</td></tr>
<tr><td>Practical application</td><td>Practical application</td></tr>
<tr><td>The water company submits the certificate to Ofwat annually together with its regulatory accounts. The company's auditors certify the consistency of the certificate with the company's audited accounts and other information they have obtained in the course of their audit. In addition, the directors must inform the Regulator as soon as they become aware of circumstances that would make them unable to re-issue the most recent certificate.</td><td>Certification that this requirement has been met should be included in the representations made regularly in the Investor Report, which is also sent to the bond/security trustee and the rating agencies.</td></tr>
</table>

<table>
<tr><th colspan="2">Availability of Managerial Resources</th></tr>
<tr><td colspan="2">Purpose: To ensure that adequate managerial resources are available to the water company to carry out its statutory functions properly and that the company has suitable internal control systems in place.</td></tr>
<tr><td>Licence</td><td>Covenants</td></tr>
<tr><td>As part of Conditions Conditions F6A.1 – F6A.4 (new Condition P4.1 in conjunction with ring-fencing certificate under conditions P9.2-P9.6) the directors of the water company must also submit annually to the Regulator a certificate stating that, in their opinion, the company will, for at least the next 12 months, have available to it management resources sufficient to enable it to carry out the regulated business.</td><td>There is typically no such requirement in highly covenanted financings, although the performance of management is monitored through satisfaction of key financial ratios. Failure to meet the financial ratios typically permits creditors to appoint independent experts to review the situation and make recommendations. Failure to correct or remedy the cause of the Trigger Event should eventually lead to enforcement.</td></tr>
</table>

Independent Directors	
Purpose: To ensure that the interests of the regulated business are protected within those of its corporate group and that a high standard of corporate governance is applied.	
Licence	**Covenants**
Condition F6A.5A requires the water company to conduct its regulated business as if it were substantially its sole business and as if the water company were a separate public limited company. Paragraphs (a) to (d) require the water company to have particular regard in the application of this condition to the following: a) the composition of its board of directors to ensure that the directors act independently of the parent company or controlling shareholder; b) each director discloses to the company and Ofwat any conflicts of interest; c) the directors have regard exclusively to the interests of the regulated business where potential conflicts exists with the interests of other group companies; d) no director votes on contracts or proposals in which he/she has an interest by virtue of other directorships. Condition P.1(2) (c) requires the ultimate controlling parent company to ensure that the board of directors of the water company has at least three independent non-executive directors. In the new format this requirement is no longer explicitly included, but under the newly proposed Condition P2, the requirement is to comply with Ofwat's governance principles and provide evidence of such compliance.	Covenants and constitutional documents typically require the appointment of independent non-executive board members at the WaSC and provide for the exclusion from voting of any conflicted board members. In the event of default or standstill, the security trustee is typically empowered to appoint additional independent directors to the board.
Practical application	**Practical application**
Condition F6A.5A(e) requires the water company to inform Ofwat without delay when a new director is appointed, the resignation or removal of a director takes effect, or there is an important change in the functions or executive responsibilities of a director. This condition does no longer apply, where the new Condition P has been introduced, but is embedded in Ofwat's governance principles.	Changes to the board are not typically reported to bondholders and the rating agencies. In addition, delays in filling board vacancies may limit the implementation of these provisions.

Restricted payments	
Purpose: To avoid excessive withdrawal of funds from the regulated business, to improve the ability of the business to function properly.	
Licence	**Covenants**
Condition F6.12 (and the new Condition P8) requires a water company to declare or pay dividends only in accordance with a dividend policy which has been approved by its board of directors and complies with the following principles: a) the dividends declared or paid should not impair the ability of the company to finance its regulated business; and b) under a system of incentive regulation dividends would be expected to reward efficiency and the management of economic risk.	Limitations on payment of dividends, customer rebates, management fees, intra-group loans and subordinated debt is linked to satisfaction of financial ratio tests and the absence of Trigger Events or Events of Default. Distributions should be limited to occur within a limited period of demonstrated satisfaction of the tests.
Practical application	**Practical application**
There is no formal approval by Ofwat of a company's dividend policy or its actual dividend payments for most water companies. However, under Condition 6A(7) (or the new Conditions P7.3 and P7.4 or P7.4 and P7.5, depending on the individual licence) that without prior written approval from the Regulator they shall not transfer, lease, license or lend any sum or sums, assets, rights, benefits to any Associate Company, if they are rated Baa3 (or equivalent) and the ratings have either been placed under review for possible downgrade (credit watch negative) or the outlook changed to negative. In addition, in the context of the business plan submission for the 2019 price review, companies will be required to adequately justify their dividend policies in the context of their performance.	Certification of satisfaction of the financial ratio tests and absence of Events of Defaults is typically made by the water company's directors to the security trustee and also noted in the Investor Reports.

Cash Flow Waterfall	
Purpose: To set out the order in which a company must pay its obligations in order to preserve the financial operation of the company and provide for orderly enforcement of the priority of claims among creditors.	
Licence	**Covenants**
Not applicable.	Covenants set out payment priorities reflecting business requirements and creditors' priority of claims among themselves and ahead of distributions. In standstill, by firstly providing for payment of fees to key participants, such as the bond and security trustees, the waterfall sustains operation of the financial structure following default. The next priority is any payment related to liquidity and other credit facility providers.
	Practical application
	The waterfall may be designed to go into effect only after a standstill event has occurred. In standstill, an independent cash manager assumes control of the cash flows. Prior to a standstill event, the company may serve as cash manager but should be required to make monthly deposits towards payment of debt service.

Disclosure	
Purpose: To ensure that the water company provides to investors and other interested constituencies adequate financial information, regardless of its corporate form or ownership.	
Licence	**Covenants**
Condition F6A.5B requires the water company to publish information about annual interim and final results as required by the Listing Rules of the Financial Services Authority applying to a company listed on the London Stock Exchange. This is not explicitly replicated in the new Condition P, but is likely part of Ofwat's governance principles, which need to be complied with under new Condition P2.	Borrowers are typically required to disclose quarterly or semi-annually information concerning the financial and operating performance. The information to be supplied and the relevant definitions are determined at the time of the initial closing.

Rating Requirements	
Purpose: To preserve the credit quality of the regulated business and provide a public signal of its financial strength.	
Licence	**Covenants**
Condition F6A.6 (and new Condition P7.2) requires the water company to use all reasonable endeavours to ensure that it, or any associated company as issuer of debt on its behalf, maintains at all times an investment grade credit rating. Potential carve-out under Condition P7.3 (applied to South West Water and Hafren Dyfrdwy only, to allow director's certificate of investment grade credit quality and rationale to replace actual rating requirement).	Failure to maintain a certain rating level is typically a Trigger Event or, at an even lower rating, an Event of Default.

Undertakings from Shareholders	
Purpose: To ensure that the water company's owners act in a manner consistent with the water company's own obligations and do not obstruct the fulfilment of such obligations.	
Licence	**Covenants**
Condition P1 (or new P3) requires the water company to procure from its immediate and ultimate controller(s) a legally enforceable undertaking providing that the owners shall: a) give the water company all necessary information it requires to comply with its licence; and b) refrain from any action which would cause the water company to breach its licence.	The water company's immediate parent company, the Holding SPV, is party to the finance documents and guarantees the water company's compliance with the terms and conditions of the bonds. These include an undertaking that the water company will continue to operate the business in compliance with its licence. The Holding SPV also commits to appoint a minimum number of independent non-executive directors at the water company.
Practical application	**Practical application**
The undertaking is in favour of the water company and must be in a form specified by Ofwat and remain in force as long as the ultimate controller retains control of the water company. The undertaker must inform Ofwat if the conditions no longer apply or the undertaking is no longer valid, and must refrain from any contracts with the ultimate controller or associated company, if the undertaking is invalid.	The representations and undertakings of the Holding SPV are given to the security trustee and can be enforced in accordance with the finance documents.

Step-in Rights	
Purpose: To enforce timely corrective actions to address problems emerged in the regulated business.	
Licence	**Covenants**
Ofwat has powers to enforce the conditions of a water company's licence. More generally, the statutory duties of the water company as a water and sewerage undertaker are enforceable by the UK Government (or the Welsh Assembly) or by Ofwat or both. Provisional or final enforcement orders are issued when a company is contravening, or has contravened and is likely to do so again, its licence or a statutory requirement, unless the contravention is trivial or the company has given an undertaking to secure compliance.	Upon the occurrence of Trigger Events, the security trustee typically has the right to request additional information and appoint an independent technical adviser to review operations and make recommendations. Following a Standstill Event, the security trustee has the right to appoint additional independent non-executive directors at the water company.
Practical application	**Practical application**
In the exercise of its enforcement powers, Ofwat acts to fulfil its duties under the industry's legal framework. Depending on the circumstances, Ofwat's actions may not be consistent with the interests of creditors.	Limited by virtue of the fact that problems will only be disclosed and subject to remedy when they have reached sufficient materiality to breach a trigger, which may be too late for effective corrective action.

Source: Ofwat, companies financial documentation

Moody's related publications

Sector Outlook:

- Regulated water utilities - UK: 2018 outlook changed to negative as tough price review outweighs current performance, January 2018

Sector Reports:

- Regulated Water Utilities and Energy Networks - UK: Increasingly complex group capital structures create wider divergence in opco and holdco credit risk profiles, October 2018
- Regulated Water Utilities - UK: Regulator's proposals undermine the stability and predictability of the regime, May 2018
- Regulated water utilities - UK: Ofwat's "call for change" may force companies to cut debt, March 2018
- Regulated water utilities - UK: Government letter evidences continuing political and regulatory scrutiny, February 2018
- GB Water and Regulated Energy Networks: FAQ on Labour's plans for renationalisation, October 2017
- UK Water Sector: Lower returns will pressure credit quality from 2020, October 2017
- UK Regulated Utilities: Low interest rate scenario is credit negative for water and energy networks, October 2016
- UK Transition to CPI: Redefining real: Wider Adoption of CPI Will Bring Change to Index-Linked Debt Markets, Risks to Regulated Industries, January 2016
- GB Water and Energy Networks: Transition to CPI Creates Risks for UK Water and Energy Networks, January 2016
- UK Water Sector: Upstream Reform Could Muddy UK Waters, October 2015
- UK Water Sector: Regulatory changes could weaken financial covenants for highly-leveraged structures, a credit negative, December 2014
- UK Water Sector: Key Ratios Used by Moody's in Assessing Companies' Credit Strength, March 2006

Rating Methodology:

- Regulated Water Utilities, June 2018

To access any of these reports, click on the entry above. Note that these references are current as of the date of publication of this report and that more recent reports may be available. All research may not be available to all clients.

Endnotes

1 Please see "UK Infrastructure and Utility Companies: Highly leveraged issuers largely insulated from weakened bank counterparty creditworthiness", July 2012.

2 Please see "UK Water Sector: Regulatory changes could weaken financial covenants for highly leveraged structures, a credit negative", December 2014.

3 Please see Moody's special comment "Evolving Financial Structures Leave More Credit Risk with Leveraged European Infrastructure Companies", published in November 2013, for details on the evolution of financing structures.

4 For further details, please see "UK Water Sector: Highly-Leveraged Financing Structures - An Update", June 2010 and "UK Regulated Utilities: Why Index-Linked Swaps May Not Provide the Same Cash Flow Benefit as Index-Linked Bonds" February 2012.

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