

Credit Opinion: Yorkshire Water Services Limited

Global Credit Research - 23 Mar 2015

United Kingdom

Ratings

Category	Moody's Rating
Outlook	Stable
Corporate Family Rating	Baa2
Yorkshire Water Services Bradford Finance Ltd	
Outlook	Stable
Bkd Senior Secured	Baa1
Bkd Subordinate -Dom Curr	Ba1
Yorkshire Water Services Odsal Finance Ltd	
Outlook	Stable
Bkd Senior Secured -Dom Curr	Baa1
Yorkshire Water Services Finance Limited	
Outlook	Stable
Bkd Senior Secured -Dom Curr	Baa1

Contacts

Analyst	Phone
Stefanie Voelz/London	44.20.7772.5454
Matthew Huxham/London	
Monica Merli/London	

Key Indicators

[1]Yorkshire Water Services Limited	3/31/2014	3/31/2013	3/31/2012	3/31/2011
Adjusted Interest Coverage	1.5x	1.4x	1.5x	1.5x
Net Debt / Regulated Assets Value	80.9%	82.8%	81.7%	74.6%
FFO / Net Debt	8.4%	7.7%	8.3%	9.3%
RCF / Capex	0.8x	0.5x	0.6x	1.5x

[1] All ratios are calculated using Moody's Standard Adjustments. Source: Moody's Financial Metrics TM

Note: For definitions of Moody's most common ratio terms please see the accompanying [User's Guide](#).

Opinion

Rating Drivers

- Stable cash flows generated from the provision of monopoly water and wastewater services under a well-established, transparent and predictable regulatory regime.

- High financial leverage constrains financial flexibility.
- Derivatives portfolio increases risks in current low-interest rate environment.
- Debt structural features, including distribution lock-up covenants, dedicated liquidity, intercreditor and security arrangements reduce event risk and enhance resilience in downside scenarios.

Corporate Profile

Yorkshire Water Services Limited (Yorkshire Water) is the fifth largest of the ten water and sewerage companies (WaSCs) in England and Wales by both Regulatory Capital Value (RCV) and number of customers served. Yorkshire Water provides drinking water to around 5 million people and around 130,000 local businesses over an area of approximately 14,700 square kilometres encompassing the former county of Yorkshire and part of North Derbyshire in Northern England.

Kelda Group Limited, the parent company of the Yorkshire Water group was acquired in February 2008 by Saltaire Water Limited (Saltaire), a special purpose vehicle formed by a consortium comprising Citi Infrastructure Investors, GIC Special Investments Pte Limited and Infracapital Partners LP.

SUMMARY RATING RATIONALE

Yorkshire Water's corporate family rating (CFR) of Baa2 is assigned to Yorkshire Water as if it had a single class of debt and was a single consolidated legal entity, and reflects an opinion on the expected loss associated with the financial obligations within the Yorkshire Water group. The CFR consolidates the legal and financial obligations of Yorkshire Water, its financing subsidiaries Yorkshire Water Services Bradford Finance Limited, Yorkshire Water Odsal Finance Limited and Yorkshire Water Services Finance Limited, and the two intermediate holding companies (Yorkshire Water Services Holdings Limited and Yorkshire Water Services Odsal Finance Holdings Limited) within the ring-fenced group. It also factors in the credit enhancements of the financing structure.

The Baa2 CFR reflects, as positives (1) Yorkshire Water's low business risk profile as the monopoly provider of essential water and sewerage services; and (2) the stable cash flows generated under a transparent and well-established regulatory regime. The rating is constrained by (1) the high level of gearing around 80% of Net Debt to RCV; and (2) the risk embedded within the company's derivative portfolio that included around GBP1.3 billion (notional) of inflation-linked swaps as at 31 March 2014. The Baa2 CFR also incorporates rating uplift from the additional creditor protections incorporated within the company's financing structure.

We note that Yorkshire Water is rated one notch lower than comparable transactions, such as Anglian Water or Thames Water due to the risks embedded in the company's derivatives portfolio. In that context, Yorkshire credit quality is more closely linked to Southern Water, which also holds a Baa2 CFR.

Yorkshire Water holds a portfolio of inflation-linked derivatives with a notional amount of approximately GBP1.3 billion, equivalent to approximately 23% of the company's regulatory capital value (RCV). The company's derivatives portfolio is very sensitive to movements in interest rates, and a fall (or rise) of rates can see the MTM of the portfolio increase (or reduce) significantly. In the continuing low interest rate environment, the MTM value of these inflation-linked swaps stood at GBP1.6 billion as at March 2014.

Moody's believes that this negative MTM has become a persistent feature within the company's capital structure. This high level of negative MTM is relevant also in the context of certain swaps that include near term breaks, thereby increasing the likelihood of a payout of the MTM under these swaps. Moody's understands that the company will be working on a restructuring that would see near-term breaks removed, thus eliminating immediate liquidity exposure. However, such restructuring will likely involve an increase in the interest rate paid by Yorkshire Water. This in turn would further increase the MTM value of the portfolio, albeit modestly in the context of the overall swap portfolio, reflecting (1) the long tenor of a number of the affected swaps; but also (2) the relatively small proportion of swaps with near-term breaks to be restructured. The overall comparably high rates locked in by Yorkshire Water over an extended period of time puts the company at a disadvantage in relation to its average funding costs when compared with its peers in the UK water sector.

Moody's does not expect the company to face significant pressures from its operations, taking into account that (1) Yorkshire Water's final price determination has been largely in line with the company's business plan submission; (2) the company has a solid operational performance track record; and (3) management took a prudent approach to financial policy, with gearing reduced to 80% of net debt to RCV. However, we believe that these positive aspects are not sufficient to fully offset the risk embedded within the company's derivatives

portfolio, particularly considering the very long tenor of a number of the inflation-linked swaps.

DETAILED RATING CONSIDERATIONS

STRONG REGULATORY ENVIRONMENT, AND CERTAINTY OF CASH FLOWS AFTER FINAL PRICE DETERMINATION

The UK water sector benefits from a very transparent, stable and predictable regulatory regime, which is based on clearly defined risk allocation principles and their consistent application in setting water tariffs by an independent regulatory body, the Water Services Regulation Authority (Ofwat).

Ofwat published the final price determination for the sector in December 2014, and Yorkshire Water accepted its final determination in February 2015. As part of the determination, Ofwat changed the way it sets tariffs for the water companies in England and Wales. For the five-year period commencing 1 April 2015 (AMP6), tariffs have been set to reflect (1) separate price controls for retail and wholesale activities; (2) increased customer involvement in companies' business planning and focus on long-term outcomes rather than short-term outputs; (3) more tailored outcome delivery incentives; and (4) a total expenditure (totex) cost assessment. The introduction of separate price controls for retail and wholesale services is in part to facilitate retail competition for non-household (NHH) customers. Competition, which the regulator expects to start in 2017, was enabled by new legislation - 2014 Water Act - which amongst other measures, also provides for further upstream competition with changes to the Water Supply Licensing regime to allow new entrants to supply water and wastewater services to NHH customers.

We view the changes introduced for AMP6 as being largely neutral for the UK water sector as a whole. Following the final determination, we expect Ofwat to continue developing its competition idea and will assess the wider implications for the credit quality of the sector, as and when more details become available. Overall, we view the introduction of competition into a previously fully regulated monopoly sector as credit negative.

Along with its peers, Yorkshire Water's final determination includes (1) an allowed return of 3.6% per annum on the wholesale RCV; (2) a net retail margin of 1% for household retail activities; and (3) a net retail margin of 2.5% for non-household retail activities. The overall allowed return, which for a notional company is around 3.74% per annum (vanilla, real), is significantly lower than both the 5.1% p.a. return allowed in the current period and the 4.2% p.a. proposed by the company in its initial business plan submitted in December 2013. However, Yorkshire Water managed to secure additional revenues to allow smoothing of customer bills over the next two periods, which will provide additional liquidity and partly offsets the reduction in allowed return.

GOOD OPERATIONAL PERFORMANCE TRACK RECORD SUPPORTS RATINGS

Yorkshire Water has historically been one of the more efficient performers in the sector. The company generally performed well under Ofwat's key performance indicators for 2011/12 and 2012/13, with none of the key performance indicators marked as 'Red' on the traffic light reporting matrix. However, performance in certain sewerage services, in particular for internal sewer flooding, has been below target expectation over the past few years, albeit somewhat affected by negative weather events.

Recent performance under the service incentive mechanism (SIM) positioned the company the upper mid-field of the sector, with scores in the range of 77-78 (out of 100) over the first three years of AMP5.

PROPOSED CAPEX PROGRAMME WILL RESULT IN FURTHER RCV GROWTH AND ADDITIONAL FUNDING NEEDS

As is the case for its peers, Yorkshire Water faces some risk in the execution of its significant capital programme and the associated financing and refinancing requirements. For AMP6, Yorkshire Water has been allowed total expenditure (totex), which included opex and capex, of around GBP3.5 billion (in 2012/13 prices) for the wholesale part of the business. Under the final determination, RCV will grow by around 9% in real terms over AMP6. Given the ongoing large investment requirements, Yorkshire Water will have to maintain good access to capital markets, with net funding requirements, (including refinancing needs) expected to be around GBP1.5 billion over the next five years.

HIGH LEVERAGE AND DERIVATIVES EXPOSURE CONSTRAIN RATING

Yorkshire Water's Baa2 CFR is constrained by the relatively highly leveraged financial structure adopted by the company. The terms and conditions of its bond programme allow Yorkshire Water to increase its indebtedness (on the basis of Net Debt to RCV) up to a maximum of 85% before distribution lock-ups come into effect. Failure to

maintain a level of Adjusted Interest Cover (Moody's Funds from Operations, or FFO, less regulatory depreciation divided by net interest) of at least 1.2x would also trigger the dividend lock-up mechanism. We note, however, that Moody's calculation of both ratios may differ slightly from the definition of the financial covenants in the financing documents due to Moody's specific adjustments.

Furthermore, the company's credit quality is impacted negatively by the additional risk that the inflation-linked derivatives portfolio poses for Yorkshire Water. Its GBP1.3 billion of inflation-linked swaps carried a MTM loss of around GBP1.6 billion as at March 2014. The persistently high MTM value of the overall swap portfolio is a function of primarily the current low interest rate environment. While an increase in interest rates could markedly reduce the company's MTM, the structure of Yorkshire Water's swaps mean that the MTM value will remain highly volatile with interest rate fluctuations, and the long tenor of a number of its swaps continue to expose the company to such volatility over the very long term. The long tenor also means that a certain interest rate structure has been locked in over a long period, which puts the company at a disadvantage compared with peers in the UK water sector.

DEBT STRUCTURAL FEATURES PROVIDE RATING UPLIFT FOR ADDITIONAL CREDITOR PROTECTION

Yorkshire Water's CFR also takes into account the covenant and security package agreed by the company, which is designed to insulate the company's creditworthiness from that of its ultimate shareholders and improve creditors' protection in a default scenario. The overall covenant and security package is similar to those seen for comparable highly-leveraged financing transactions, and results in a level of rating uplift incorporated in the Baa2 CFR.

Additional event risk protection provided by the bond covenant and security package, include, inter alia, restrictions on acquisition and disposals (subject to limited defined exceptions), a dividend lock-up coming into effect if gearing increases above 85% of RCV, and limitation on non-core activities. In addition, we consider creditor step-in rights if certain trigger events occur.

The highly-leveraged UK water companies, including Yorkshire Water, will propose a supplementary interest cover covenant, designed to reflect regulatory changes in the revenue building block approach for tariff setting purposes. We expect the definition of the supplementary covenant to be slightly different for Yorkshire than for its highly-leveraged peers, such that it may provide less flexibility to create additional financial headroom before a distribution lock-up is triggered. As has been the case in the past, Moody's calculation of the Adjusted Interest Cover Ratio (Adjusted ICR) will likely differ from the covenant definition, subject to additional disclosure provided in regulatory accounts and investor reports. Overall, we expect Yorkshire Water to continue to exhibit an Adjusted ICR, based on Moody's calculation, in line with the minimum guidance for its current ratings.

Recovery prospects in a default scenario can be improved by (1) a first-ranking fixed charge over the shares in the company, plus first-ranking fixed and floating charges over all the assets, rights and undertakings of Yorkshire Water, and (2) the agreement by financial creditors to give up their individual rights to petition for insolvency proceedings. We recognise that the benefit of the security provided to bondholders is limited due to the regulated and essential nature of the services provided by Yorkshire Water as governed by its licence and the Water Industry Act 1991.

We also rate the bonds issued by Yorkshire Water's finance subsidiaries under a GBP8.0 billion multicurrency bond programme (the Programme), guaranteed by Yorkshire Water. The bonds are issued either as part of a senior tranche (Class A Debt) or a junior tranche (Class B Debt) and are currently rated Baa1 or Ba1, respectively.

The Baa1 rating of the Class A Bonds issued under the Programme reflects the strength of the debt protection measures for this class of bonds and other pari passu indebtedness (together, the Class A Debt), the senior position in the cash waterfall and post any enforcement of security. The rating also, however, factors in the subordinated Class B Debt (Class B Bonds and other pari passu debt) which, whilst it is contractually subordinated, serves to reduce the operator's financial flexibility. Downgrade or default of the Class B Debt could have an impact on the viability of the company's funding model as a whole since the inability to raise additional Class B Debt in the future could undermine the capital structure and affect the credit quality of the senior debt.

The Ba1 rating of the Class B Bonds reflects the same default probability as factored into the Baa2 CFR but also Moody's expectation of a heightened loss severity for the Class B Debt following any default, given its subordinated position.

Other Considerations

Our assessment is based on Moody's global Rating Methodology for Regulated Water Utilities, published in December 2009. The methodology grid results in an indicative factor outcome of Baa1, one notch higher than the assigned CFR, because the grid does not reflect the risk associated with Yorkshire Water's derivative portfolio.

Whilst we expect financial headroom to reduce following implementation of the new regulatory tariffs from April 2015, we believe that Yorkshire Water's financial profile, including management's strategy of slightly reduced gearing below 80%, will provide some additional flexibility.

Liquidity Profile

Yorkshire Water exhibits a solid liquidity profile with its stable and predictable cash flows generated by its regulated activity, cash balances of around GBP38 million at 30 September 2014 and access to GBP490 million committed bank facilities to cover capex and working capital needs, available until October 2018, of which GBP336 million remained undrawn. In addition, under its financing structure, Yorkshire Water has access to debt service and operation & maintenance reserve liquidity facilities of altogether GBP292 million, renewed annually in April.

In April 2017, GBP450 million of Class B debt due 2025 is callable. The next significant debt maturity is in October 2018 when GBP490 million of committed revolving facilities expire.

Rating Outlook

The rating outlook is stable, reflecting Moody's view that Yorkshire Water's management will be able to manage the risks associated with its derivatives portfolio at the Baa2 CFR rating level. This view takes into account the company's strategy to (1) reduce the risk of potential MTM payments by removing breaks from the derivative contracts; and (2) maintain additional financial flexibility to offset comparably higher cost of debt than its peers through lower gearing that will not exceed 80% of net debt to RCV. The stable outlook also reflects Moody's view that the current low interest rate environment is unlikely to persist over the medium term.

What Could Change the Rating - Up

The ratings could be upgraded if (1) the risk exposure of Yorkshire Water's derivatives portfolio reduces over time, such that it no longer affects the company's financial flexibility in comparison with its peers, or (2) the company managed to create additional financial flexibility by reducing leverage below 75% of net debt to RCV. However, before considering any upgrade, Moody's will also consider the company's remaining derivatives exposure and ongoing risk in light of the then present market conditions.

What Could Change the Rating - Down

Conversely, the ratings could be downgraded in the event of unexpected, severe deterioration in operating performance that results in the company exhibiting financial metrics of net debt to RCV persistently above 80% and/or an Adjusted Interest Cover Ratio consistently below 1.2-1.3x. Further downward pressure could develop in case of (1) a material change in the regulatory framework for the UK water sector leading to a significant increase in Yorkshire Water's business risk; or (2) unfavourable market conditions that would affect the company's ability to refinance debt maturities when due, also in the context of future breaks under its existing swaps arrangements.

Rating Factors

Yorkshire Water Services Limited

Regulated Water Utilities [1][2]	CurrentAs at 3/31/2014		[3]Moody's 12-18 months forward viewAs at March 2015	
Factor 1: Regulatory Environment & Asset Ownership Model (40%)	Measure	Score	Measure	Score
a) Stability and Predictability of Regulatory Regime		Aaa		Aaa
b) Asset Ownership Model		Aa		Aa
c) Cost and Investment Recovery (Ability & Timeliness)		A		A

d) Revenue Risk		A		A
Factor 2: Operational Characteristics & Asset Risk (10%)				
a) Operational Efficiency		Baa		Baa
b) Scale & Complexity of Capital Programme & Asset Condition Risk	8%	A	6-8%	A
Factor 3: Stability of Business Model & Financial Structure (10%)				
a) Ability & Willingness to Pursue Opportunistic Corporate Activity		Aa		Aa
b) Ability & Willingness to Increase Leverage		A		A
c) Targeted Proportion of Op, Profit Outside Core Water and Wastewater Activities		Aa		Aa
Factor 4: Key Credit Metrics (40%)				
a) Adjusted Interest Coverage (3 year Avg)	1.5x	Ba	1.3-1.4x	Ba
b) Net Debt/ Regulated Asset Value (3 Year Avg)	81.8%	Ba	78-82%	Ba
c) FFO / Net Debt (3 Year Avg)	8.1%	Ba	6-8%	Ba
d) RCF / Capex (3 Year Avg)	0.6x	Ba	0.5-1.0x	Ba
Rating:				
a) Indicated Factor-Rating from Grid		Baa2		Baa2
+ Rating Uplift for Additional Creditor Protection		+1		+1
= Final Indicated Rating from Grid		Baa1		Baa1
b) Actual Rating Assigned				Baa2

[1] All ratios are calculated using Moody's Standard Adjustments. [2] As of 3/31/2014; Source: Moody's Financial Metrics [3] This represents Moody's forward view; not the view of the issuer; and unless noted in the text, does not incorporate significant acquisitions and divestitures

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 <http://www.moody's.com> for the most updated credit rating action information and rating history.



© 2015 Moody's Corporation, Moody's Investors Service, Inc., Moody's Analytics, Inc. and/or their licensors and affiliates (collectively, "MOODY'S"). All rights reserved.

CREDIT RATINGS ISSUED BY MOODY'S INVESTORS SERVICE, INC. AND ITS RATINGS AFFILIATES ("MIS") ARE MOODY'S CURRENT OPINIONS OF THE RELATIVE FUTURE CREDIT RISK OF ENTITIES, CREDIT COMMITMENTS, OR DEBT OR DEBT-LIKE SECURITIES, AND CREDIT RATINGS AND RESEARCH PUBLICATIONS PUBLISHED BY MOODY'S ("MOODY'S PUBLICATIONS") MAY INCLUDE MOODY'S CURRENT OPINIONS OF THE RELATIVE FUTURE CREDIT RISK OF ENTITIES, CREDIT COMMITMENTS, OR DEBT OR DEBT-LIKE SECURITIES. MOODY'S DEFINES CREDIT RISK AS THE RISK THAT AN ENTITY MAY NOT MEET ITS CONTRACTUAL, FINANCIAL OBLIGATIONS AS THEY COME DUE AND ANY ESTIMATED FINANCIAL LOSS IN THE EVENT OF DEFAULT. CREDIT RATINGS DO NOT ADDRESS ANY OTHER RISK, INCLUDING BUT NOT LIMITED TO: LIQUIDITY RISK, MARKET VALUE RISK, OR PRICE VOLATILITY. CREDIT RATINGS AND MOODY'S OPINIONS INCLUDED IN MOODY'S PUBLICATIONS ARE NOT STATEMENTS OF CURRENT OR HISTORICAL FACT. MOODY'S PUBLICATIONS MAY ALSO INCLUDE QUANTITATIVE MODEL-BASED ESTIMATES OF CREDIT RISK AND RELATED OPINIONS OR COMMENTARY PUBLISHED BY MOODY'S ANALYTICS, INC. CREDIT RATINGS AND MOODY'S PUBLICATIONS DO NOT CONSTITUTE OR PROVIDE INVESTMENT OR FINANCIAL ADVICE, AND CREDIT RATINGS AND MOODY'S PUBLICATIONS ARE NOT AND DO NOT PROVIDE RECOMMENDATIONS TO

PURCHASE, SELL, OR HOLD PARTICULAR SECURITIES. NEITHER CREDIT RATINGS NOR MOODY'S PUBLICATIONS COMMENT ON THE SUITABILITY OF AN INVESTMENT FOR ANY PARTICULAR INVESTOR. MOODY'S ISSUES ITS CREDIT RATINGS AND PUBLISHES MOODY'S PUBLICATIONS WITH THE EXPECTATION AND UNDERSTANDING THAT EACH INVESTOR WILL, WITH DUE CARE, MAKE ITS OWN STUDY AND EVALUATION OF EACH SECURITY THAT IS UNDER CONSIDERATION FOR PURCHASE, HOLDING, OR SALE.

MOODY'S CREDIT RATINGS AND MOODY'S PUBLICATIONS ARE NOT INTENDED FOR USE BY RETAIL INVESTORS AND IT WOULD BE RECKLESS FOR RETAIL INVESTORS TO CONSIDER MOODY'S CREDIT RATINGS OR MOODY'S PUBLICATIONS IN MAKING ANY INVESTMENT DECISION. IF IN DOUBT YOU SHOULD CONTACT YOUR FINANCIAL OR OTHER PROFESSIONAL ADVISER.

ALL INFORMATION CONTAINED HEREIN IS PROTECTED BY LAW, INCLUDING BUT NOT LIMITED TO, COPYRIGHT LAW, AND NONE OF SUCH INFORMATION MAY BE COPIED OR OTHERWISE REPRODUCED, REPACKAGED, FURTHER TRANSMITTED, TRANSFERRED, DISSEMINATED, REDISTRIBUTED OR RESOLD, OR STORED FOR SUBSEQUENT USE FOR ANY SUCH PURPOSE, IN WHOLE OR IN PART, IN ANY FORM OR MANNER OR BY ANY MEANS WHATSOEVER, BY ANY PERSON WITHOUT MOODY'S PRIOR WRITTEN CONSENT.

All information contained herein is obtained by MOODY'S from sources believed by it to be accurate and reliable. Because of the possibility of human or mechanical error as well as other factors, however, all information contained herein is provided "AS IS" without warranty of any kind. MOODY'S adopts all necessary measures so that the information it uses in assigning a credit rating is of sufficient quality and from sources MOODY'S considers to be reliable including, when appropriate, independent third-party sources. However, MOODY'S is not an auditor and cannot in every instance independently verify or validate information received in the rating process or in preparing the Moody's Publications.

To the extent permitted by law, MOODY'S and its directors, officers, employees, agents, representatives, licensors and suppliers disclaim liability to any person or entity for any indirect, special, consequential, or incidental losses or damages whatsoever arising from or in connection with the information contained herein or the use of or inability to use any such information, even if MOODY'S or any of its directors, officers, employees, agents, representatives, licensors or suppliers is advised in advance of the possibility of such losses or damages, including but not limited to: (a) any loss of present or prospective profits or (b) any loss or damage arising where the relevant financial instrument is not the subject of a particular credit rating assigned by MOODY'S.

To the extent permitted by law, MOODY'S and its directors, officers, employees, agents, representatives, licensors and suppliers disclaim liability for any direct or compensatory losses or damages caused to any person or entity, including but not limited to by any negligence (but excluding fraud, willful misconduct or any other type of liability that, for the avoidance of doubt, by law cannot be excluded) on the part of, or any contingency within or beyond the control of, MOODY'S or any of its directors, officers, employees, agents, representatives, licensors or suppliers, arising from or in connection with the information contained herein or the use of or inability to use any such information.

NO WARRANTY, EXPRESS OR IMPLIED, AS TO THE ACCURACY, TIMELINESS, COMPLETENESS, MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OF ANY SUCH RATING OR OTHER OPINION OR INFORMATION IS GIVEN OR MADE BY MOODY'S IN ANY FORM OR MANNER WHATSOEVER.

Moody's Investors Service, Inc., a wholly-owned credit rating agency subsidiary of Moody's Corporation ("MCO"), hereby discloses that most issuers of debt securities (including corporate and municipal bonds, debentures, notes and commercial paper) and preferred stock rated by Moody's Investors Service, Inc. have, prior to assignment of any rating, agreed to pay to Moody's Investors Service, Inc. for appraisal and rating services rendered by it fees ranging from \$1,500 to approximately \$2,500,000. MCO and MIS also maintain policies and procedures to address the independence of MIS's ratings and rating processes. Information regarding certain affiliations that may exist between directors of MCO and rated entities, and between entities who hold ratings from MIS and have also publicly reported to the SEC an ownership interest in MCO of more than 5%, is posted annually at www.moody.com under the heading "Investor Relations — Corporate Governance — Director and Shareholder Affiliation Policy."

For Australia only: Any publication into Australia of this document is pursuant to the Australian Financial Services License of MOODY'S affiliate, Moody's Investors Service Pty Limited ABN 61 003 399 657AFSL 336969 and/or

Moody's Analytics Australia Pty Ltd ABN 94 105 136 972 AFSL 383569 (as applicable). This document is intended to be provided only to "wholesale clients" within the meaning of section 761G of the Corporations Act 2001. By continuing to access this document from within Australia, you represent to MOODY'S that you are, or are accessing the document as a representative of, a "wholesale client" and that neither you nor the entity you represent will directly or indirectly disseminate this document or its contents to "retail clients" within the meaning of section 761G of the Corporations Act 2001. MOODY'S credit rating is an opinion as to the creditworthiness of a debt obligation of the issuer, not on the equity securities of the issuer or any form of security that is available to retail clients. It would be dangerous for "retail clients" to make any investment decision based on MOODY'S credit rating. If in doubt you should contact your financial or other professional adviser.

For Japan only: MOODY'S Japan K.K. ("MJKK") is a wholly-owned credit rating agency subsidiary of MOODY'S Group Japan G.K., which is wholly-owned by Moody's Overseas Holdings Inc., a wholly-owned subsidiary of MCO. Moody's SF Japan K.K. ("MSFJ") is a wholly-owned credit rating agency subsidiary of MJKK. MSFJ is not a Nationally Recognized Statistical Rating Organization ("NRSRO"). Therefore, credit ratings assigned by MSFJ are Non-NRSRO Credit Ratings. Non-NRSRO Credit Ratings are assigned by an entity that is not a NRSRO and, consequently, the rated obligation will not qualify for certain types of treatment under U.S. laws. MJKK and MSFJ are credit rating agencies registered with the Japan Financial Services Agency and their registration numbers are FSA Commissioner (Ratings) No. 2 and 3 respectively.

MJKK or MSFJ (as applicable) hereby disclose that most issuers of debt securities (including corporate and municipal bonds, debentures, notes and commercial paper) and preferred stock rated by MJKK or MSFJ (as applicable) have, prior to assignment of any rating, agreed to pay to MJKK or MSFJ (as applicable) for appraisal and rating services rendered by it fees ranging from JPY200,000 to approximately JPY350,000,000. MJKK and MSFJ also maintain policies and procedures to address Japanese regulatory requirements.