

MOODY'S

INVESTORS SERVICE

Credit Opinion: Erste Group Bank AG

Global Credit Research - 25 Jul 2013

Vienna, Austria

Ratings

Category	Moody's Rating
Outlook	Negative
Bank Deposits	A3/P-2
Bank Financial Strength	D+
Baseline Credit Assessment	(baa3)
Adjusted Baseline Credit Assessment	(baa3)
Senior Secured -Dom Curr	Aaa
Senior Unsecured	A3
Senior Subordinate -Dom Curr	Ba1
Jr Subordinate -Dom Curr	B1 (hyb)
Commercial Paper -Dom Curr	P-2
Other Short Term -Dom Curr	(P)P-2
Ceska Sporitelna, a.s.	
Outlook	Negative(m)
Bank Deposits	A2/P-1
Bank Financial Strength	C-
Baseline Credit Assessment	(baa1)
Adjusted Baseline Credit Assessment	(baa1)
Erste Bank Hungary Rt	
Outlook	Negative(m)
Bank Deposits	B2/NP
Bank Financial Strength	E
Baseline Credit Assessment	(caa1)
Adjusted Baseline Credit Assessment	(b2)

Contacts

Analyst	Phone
Swen Metzler/Frankfurt am Main	49.69.707.30.700
Michael Rohr/Frankfurt am Main	
Carola Schuler/Frankfurt am Main	
Mira Carey/Frankfurt am Main	

Key Indicators

ERSTE GROUP BANK AG (Consolidated Financials)[1]

	[2]3-13	[2]12-12	[2]12-11	[2]12-10	[2]12-09	Avg.
Total Assets (EUR million)	212,873.0	213,707.0	209,875.3	205,807.0	201,565.2	[3]1.4
Total Assets (USD million)	272,435.6	281,749.5	272,448.6	276,099.1	289,193.8	[3]-1.5
Tangible Common Equity (EUR million)	9,515.9	9,177.0	8,831.7	9,410.4	7,349.4	[3]6.7
Tangible Common Equity (USD million)	12,178.5	12,098.9	11,464.9	12,624.5	10,544.5	[3]3.7
Net Interest Margin (%)	2.3	2.5	2.7	2.7	2.7	[4]2.6
PPI / Average RWA (%)	2.6	2.7	2.8	3.1	3.2	[5]2.9
Net Income / Average RWA (%)	0.9	0.7	0.4	1.0	0.9	[5]0.8
(Market Funds - Liquid Assets) / Total Assets (%)	-25.5	4.7	8.1	7.4	10.5	[4]1.0
Core Deposits / Average Gross Loans (%)	142.2	92.0	88.8	89.4	87.6	[4]100.0
Tier 1 Ratio (%)	11.6	11.6	10.4	10.2	9.2	[5]10.6

Tangible Common Equity / RWA (%)	9.1	8.7	7.7	7.9	5.9	[5]7.9
Cost / Income Ratio (%)	60.6	58.9	56.0	52.0	52.6	[4]56.0
Problem Loans / Gross Loans (%)	9.4	9.2	8.5	7.6	6.6	[4]8.2
Problem Loans / (Equity + Loan Loss Reserves) (%)	61.3	60.9	59.8	50.6	50.8	[4]56.7

Source: Moody's

[1] All figures and ratios are adjusted using Moody's standard adjustments [2] Basel II; IFRS [3] Compound Annual Growth Rate based on IFRS reporting periods [4] IFRS reporting periods have been used for average calculation [5] Basel II & IFRS reporting periods have been used for average calculation

Opinion

SUMMARY RATING RATIONALE

Erste Group Bank AG's A3 global local-currency (GLC) debt and deposit ratings incorporate three notches of rating uplift from the bank's baseline credit assessment (BCA) of baa3. The uplift reflects our assumption of a very high probability of systemic support from Austria (Aaa negative) in case in need. This reflects the bank's sizeable domestic market shares, its critical role for Austria's payment system, and the relative importance of the savings bank (Sparkassen) sector to the country's banking system.

Erste's BCA of baa3 is equivalent to a standalone bank financial strength rating (BFSR) of D+. The BCA reflects the bank's overall satisfactory financial fundamentals, its leading retail and corporate franchises throughout Austria and the more mature economies in Central and Eastern Europe (CEE), and its solid deposit funding base. However, the BCA is constrained by the bank's (1) high level of problem loans, despite adequate coverage ratios of over 60%, which might negatively affect the bank's capital generation capacity; (2) concentration risk as a result of sizeable exposures to Hungary and Romania, thereby limiting Erste's geographical diversification; and (3) moderate capitalisation compared to its credit risk profile. We consider that the anticipated negative impact on the capital ratios from the planned full redemption of state capital (participation capital) remain consistent with our rating assessment and the exit from state support as credit positive.

Rating Drivers

- Leading domestic and CEE franchises but foreign activities geographically more concentrated than some of its peers
- Credit risk concentration might pose a challenge but the liquidity profile benefits from the bank's retail focus
- Domestic banking activities provide stable but lower margin earnings while CEE subsidiaries remain the important driver for the group's profitability but also account for high credit costs
- Deposit-rich balance sheet with moderate and declining reliance on wholesale funding
- Improved quality of capital but vulnerability to shocks remain
- Elevated problem loans constrain Erste's standalone credit strength

Rating Outlook

The negative outlook on Erste's ratings reflects our view that Erste's credit profile is vulnerable because of its sizeable exposure to Hungary and Romania, which could have a greater-than-expected negative impact on the bank's earnings profile and thus capital generation capacity.

What Could Change the Rating - Up

There is currently no upward rating pressure as reflected by the negative outlook. The bank's standalone credit strength could benefit from (1) a significant and persistent reduction in the stock of non-performing loans (NPLs); and (2) a further strengthening of its capital buffers to better reflect the higher risk-profile of the bank in an adverse economic scenario.

What Could Change the Rating - Down

Erste's BFSR could come under downward pressure following (1) an extended period of weak earnings and hence lower internal capital generation; (2) stalled economic recovery in Eastern Europe resulting in higher-than-anticipated additional substantial credit charges; and (3) weakened capitalisation levels as a result of accelerated credit losses or strong asset growth in Eastern Europe.

The bank's long-term ratings could come under downward pressure in case of a weakening in its intrinsic financial strength, as well as adverse changes in the systemic support assumptions we currently factor into Erste's ratings.

DETAILED RATING CONSIDERATIONS

LEADING DOMESTIC AND CEE FRANCHISES BUT FOREIGN ACTIVITIES GEOGRAPHICALLY MORE CONCENTRATED THAN SOME OF ITS PEERS

Erste's franchise is a supporting factor for the bank's credit quality and ratings. Erste, in conjunction with the Austrian savings banks, is the second-largest banking group in Austria and benefits from a deeply entrenched retail and corporate banking franchise. Erste has a 17% market share in terms of total banking system assets and 19% and 18% market share for domestic deposits and loans, respectively, and leading market positions in those CEE countries in which it is most active.

Over the past decade, Erste has very successfully built its presence in CEE countries, initially in what are now more mature markets and then with a growing emphasis on economies that are still at the beginning of a long-term convergence process. With a clear strategic focus on retail banking, Erste can claim market-leading positions in much of the CEE where it is represented. At the same time, we consider that Erste is geographically more concentrated than some of its major peers as operations in the Czech Republic, Slovakia and Croatia increasingly contribute the bulk of the group's CEE earnings, while Erste's activities in Hungary and Romania face specific challenges. To further develop its CEE-related banking franchises, the bank announced plans to put more emphasis on the corporate sector and raising local funding that should contribute to the longer-term balanced evolution of its franchises, while providing for a more balanced overall group funding profile.

CREDIT RISK CONCENTRATION MIGHT POSE A CHALLENGE BUT THE LIQUIDITY PROFILE BENEFITS FROM THE BANK'S RETAIL FOCUS

Erste is the main risk taker within the group, and risks within regional offices and subsidiaries are generally managed within tight parameters. We consider that credit risk concentrations, including those in the financial services sector, may pose a challenge to Erste's credit quality. The bank's liquidity profile benefits from the group's retail focus and significant sticky retail and corporate deposit volumes to which the bank and its subsidiaries have access domestically and in the respective local currencies. This stable and sizeable deposit base that accounts for 62% of the bank's funding somewhat limits the bank's wholesale funding reliance. However, a moderate wholesale funding dependence remains, rendering Erste susceptible to possible disruptions amidst the adverse and highly uncertain current environment but is mitigated by the bank's large liquidity portfolio.

Erste's market risk appetite is very moderate. The capital allocated to market risk at the end of 2012 was less than 4% of total required capital, which is low compared with that of its peers.

DOMESTIC BANKING ACTIVITIES PROVIDE STABLE BUT LOWER MARGIN EARNINGS WHILE CEE SUBSIDIARIES REMAIN THE IMPORTANT DRIVER FOR THE GROUP'S PROFITABILITY BUT ALSO ACCOUNT FOR HIGH CREDIT COSTS

Since 2009, the bank's financial performance is negatively affected by an increased level of credit costs that are to a large extent a result of Erste's CEE banking activities, predominantly from its Hungarian and Romanian sub-segments where the bank managed total loans of EUR16.9 billion at year-end 2012, representing 12% of total gross loans. The specific challenges from these subsidiaries and, as a consequence, on Erste's group-wide risk-adjusted profitability, are an important rating constraint.

Erste's CEE subsidiaries are traditionally the key driver for the group's profitability, accounting for 57% of pre-tax profit in 2012, while the bank's domestic operations contribute stable but lower margin business. However, besides the specific challenges Erste faces in Hungary and Romania, we note that the Czech Republic and Slovakia are now contributing a larger portion to the group's CEE earnings, which introduces an additional degree of concentration risk compared with Erste's previous years' profitability dispersion, rendering the bank more vulnerable to potential set-backs in these markets.

DEPOSIT-RICH BALANCE SHEET WITH MODERATE AND DECLINING RELIANCE ON WHOLESALE FUNDING

Erste primarily benefits from EUR123 billion customer deposits accounting for 56% of total liabilities at year-end 2012. Around 52% of this is generated from the bank's domestic operations while roughly two thirds of its CEE-related deposits (EUR50 billion) come from the Czech Republic and Slovakia. Erste's issued securities were EUR29.4 billion and accounted for 14.9% of total liabilities, which is relatively low compared with other banks but it demonstrates a moderate reliance on wholesale funding, not least because of its CEE activities. In our view, this renders the bank's funding susceptible to external shocks, which may emanate from their exposure to CEE markets or from the ongoing euro area debt crisis.

We view positively that the Austrian banking supervisors recommended in November 2011 to limit new lending in Eastern European markets to 110% of local deposits, plus funding in local capital markets and funding from supranational institutions as this limitation encourages Austrian banks to further improve the balance of assets and liabilities in its foreign markets.

During 2012, Erste raised EUR4.2 billion of new deposits (+3.5% year-on-year) while its gross loan portfolio declined by EUR2.8 billion (-2.1% year-on-year), thereby improving the bank's loan-to-deposit ratio to 107% from 113% in 2011. In addition, the bank has lowered its short-term funding needs to EUR20.5 billion, from EUR36 billion at year-end 2007 and, at the same time, increased its liquidity portfolio to EUR33.9 billion from EUR19 billion over the same period. We regard the size and quality of the bank's liquidity portfolio that is mainly invested in ECB and other central bank eligible assets as an important mitigating factor. Erste's annual long-term funding requirements will be around EUR3 billion over the next years, which we believe is manageable compared to the bank's balance sheet size.

IMPROVED QUALITY CAPITAL BUT VULNERABILITY TO SHOCKS REMAIN

Given the risks imbedded in Erste's business profile, we consider its financial flexibility constrained and vulnerable in a downside scenario as we assume relatively large losses from its CEE-related activities and, at the same time, a significant reduction of the bank's profitability. The latter assumption is applied uniformly to all banks under our stress tests. We consider the bank's capital base as sufficient in a mild downturn. However, given its concentration risk from its Hungarian and Romanian activities, the bank shows tail risks which may require additional capital strengthening. While we are confident that Erste's earnings power allows to further bolster its capital base, we caution that capital generation may be weaker than in the past, given a further transition to a more locally based funding model, a less favorable macro-environment in the region, as well as idiosyncratic risks (Hungary and Romania).

We view positively the bank's successful raising of EUR660 million of equity capital in July 2013 and the full repayment of EUR1.76 billion participation capital (of which EUR1.2 billion were provided by the Austrian government and EUR540 million from private investors), which is scheduled for August 7, 2013. These measures will allow the bank to exit state support and proactively address the declining regulatory capital eligibility of participation capital.

We consider the decline in the bank's capitalization from the smaller equity raise relative to the repayment of the participation capital to be manageable and probably temporary, given Erste's efforts to reduce risk over recent quarters and taking into account its capital generation capacity. These efforts include disposing of non-core assets, including credit default swaps, and changing its business mix towards a larger portion of mortgage loans. As a result, risk-weighted assets declined to EUR105 billion in first-quarter 2013 from EUR120 billion in December 2010. During the same period, Erste also increased its on-balance sheet loan-loss reserves to EUR 7.7 billion from EUR 6.1 billion, thereby improving its coverage ratio to 62.4% from 60.1%.

As of 31 March, Erste's reported Tier 1 ratio was 11.6%, the same level as at year-end 2012. Pro forma the capital increase and the related repayment of participation capital, the ratio should decline to 10.5% and continue to include approximately 40 basis points of hybrid capital components. As a result, Erste's capital will weaken relative to the ratios of other banks that have operations in Central and Eastern Europe, while the composition of its Tier 1 capital will improve.

ELEVATED PROBLEM LOANS CONSTRAIN ERSTE'S STANDALONE CREDIT STRENGTH

We consider asset quality as the main weakness of the bank's credit profile as the elevated level of problem loans are likely to have a continued negative impact on its risk-adjusted earnings, affecting Erste's ability to internally generate capital.

Erste's credit risk arises mainly because of its EUR131.9 billion gross loan portfolio as of 2012, which contains

EUR65.7 billion of loans originated from the Retail & SME Austria segment (50% of total), EUR47.8 billion from CEE subsidiaries (37%), and EUR17.9 billion from GCIB (the bank's corporate segment, 13%). However, this breakdown might underestimate the bank's CEE exposure as lending from domestic subsidiaries also includes direct lending to CEE (mainly from corporate lending).

At year-end 2012, the bank's NPLs stood at EUR12.1 billion (2011: EUR11.8 billion, 2010: EUR10.5 billion, and 2008: EUR5.8 billion). Erste's CEE segments, which are the key drivers for this increase, account for 59% of NPLs while domestic Retail & SME operations account for 30%, with the remainder coming from global commercial and investment banking (GCIB). At the same time, the group-wide NPL ratio has increased to 9.2% (2011: 8.5%; 2010: 7.6%, and 2008: 4.7%). The year-end 2012 NPL ratios ranged between 5.5% for Austria, 25.4% for Hungary, 28.3% for Romania, and 5.3% for the Czech Republic. We note positively that Erste's coverage ratios for domestic and foreign activities have improved on average to 63% in 2012 from 60% in 2010, reflecting EUR7.6 billion loan-loss-reserves (LLR) at year-end 2012, following EUR6.0 billion in 2010.

Global Local Currency Deposit Rating (Joint Default Analysis)

We assign a A3 GLC deposit ratings to Erste with negative outlook. The short-term GLC deposit rating is Prime-2.

The GLC deposit rating is supported by Erste's baa3 standalone BCA as well as three notches of systemic support uplift on the basis of our assessment of a very high probability of systemic support.

The systemic support assessment is based upon Erste's sizeable national market share, its critical role for the country's payment system and the relative importance of the savings bank (Sparkassen) sector to the country's banking system.

Notching Considerations

We assign a Ba1 local-currency debt rating for Erste's subordinated debt, which carries a negative outlook. The rating is one notch below the bank's baa3 adjusted BCA.

We assign a Ba3(hyb) rating on cumulative junior subordinated debt, which is three notches below the adjusted BCA, reflecting its junior subordinated claim in liquidation and cumulative deferral features tied to the breach of a net loss trigger.

We assign a B1(hyb) rating on non-cumulative junior subordinated debt, which is four notches below the bank's adjusted BCA, reflecting its junior subordinated claim in liquidation and non-cumulative deferral features tied to the breach of a net loss trigger.

We assign a Ba3(hyb) rating on non-cumulative preferred securities, which is three notches below the adjusted BCA, reflecting their deeply subordinated claim in liquidation and non-cumulative coupon skip mechanism tied to the breach of a balance sheet loss trigger.

The outlook on all these ratings remains negative, reflecting the negative outlook on Erste's D+/baa3 standalone credit assessment.

Foreign Currency Deposit Rating

Erste's foreign currency deposit ratings are A3 (negative)/Prime-2.

Foreign Currency Debt Rating

Erste's foreign currency debt ratings are A3 (negative)/Prime-2.

ABOUT MOODY'S BANK RATINGS

Bank Financial Strength Rating

Moody's Bank Financial Strength Ratings (BFSRs) represent Moody's opinion of a bank's intrinsic safety and soundness and, as such, exclude certain external credit risks and credit support elements that are addressed by Moody's Bank Deposit Ratings. BFSRs do not take into account the probability that the bank will receive such external support, nor do they address risks arising from sovereign actions that may interfere with a bank's ability to honour its domestic or foreign currency obligations. Factors considered in the assignment of BFSRs include bank-specific elements such as financial fundamentals, franchise value, and business and asset diversification.

Although BFSRs exclude the external factors specified above, they do take into account other risk factors in the bank's operating environment, including the strength and prospective performance of the economy, as well as the structure and relative fragility of the financial system, and the quality of banking regulation and supervision.

Global Local Currency Deposit Rating

A deposit rating, as an opinion of relative credit risk, incorporates the BFSR as well as Moody's opinion of any external support. Specifically, Moody's Bank Deposit Ratings are opinions of a bank's ability to repay punctually its deposit obligations. As such, they are intended to incorporate those aspects of credit risk relevant to the prospective payment performance of rated banks with respect to deposit obligations, which includes: intrinsic financial strength, sovereign transfer risk (in the case of foreign currency deposit ratings), and both implicit and explicit external support elements. Moody's Bank Deposit Ratings do not take into account the benefit of deposit insurance schemes which make payments to depositors, but they do recognise the potential support from schemes that may provide assistance to banks directly.

According to Moody's joint default analysis (JDA) methodology, the global local currency deposit rating of a bank is determined by the incorporation of external elements of support into the bank's Baseline Credit Assessment. In calculating the Global Local Currency Deposit rating for a bank, the JDA methodology also factors in the rating of the support provider, in the form of the local currency deposit ceiling for a country, Moody's assessment of the probability of systemic support for the bank in the event of a stress situation and the degree of dependence between the issuer rating and the Local Currency Deposit Ceiling.

National Scale Rating

National scale ratings are intended primarily for use by domestic investors and are not comparable to Moody's globally applicable ratings; rather they address relative credit risk within a given country. A Aaa rating on Moody's National Scale indicates an issuer or issue with the strongest creditworthiness and the lowest likelihood of credit loss relative to other domestic issuers. National Scale Ratings, therefore, rank domestic issuers relative to each other and not relative to absolute default risks. National ratings isolate systemic risks; they do not address loss expectation associated with systemic events that could affect all issuers, even those that receive the highest ratings on the National Scale.

Foreign Currency Deposit Rating

Moody's ratings on foreign currency bank obligations derive from the bank's local currency rating for the same class of obligation. The implementation of JDA for banks can lead to high local currency ratings for certain banks, which could also produce high foreign currency ratings. Nevertheless, it should be noted that foreign currency deposit ratings are in all cases constrained by the country ceiling for foreign currency bank deposits. This may result in the assignment of a different, and typically lower, rating for the foreign currency deposits relative to the bank's rating for local currency obligations.

Foreign Currency Debt Rating

Foreign currency debt ratings are derived from the bank's local currency debt rating. In a similar way to foreign currency deposit ratings, foreign currency debt ratings may also be constrained by the country ceiling for foreign currency bonds and notes; however, in some cases the ratings on foreign currency debt obligations may be allowed to pierce the foreign currency ceiling. A particular mix of rating factors are taken into consideration in order to assess whether a foreign currency bond rating pierces the country ceiling. They include the issuer's global local currency rating, the foreign currency government bond rating, the country ceiling for bonds and the debt's eligibility to pierce that ceiling.

About Moody's Bank Financial Strength Scorecard

Moody's bank financial strength model (see scorecard below) is a strategic input in the assessment of the financial strength of a bank, used as a key tool by Moody's analysts to ensure consistency of approach across banks and regions. The model output and the individual scores are discussed in rating committees and may be adjusted up or down to reflect conditions specific to each rated entity.

Rating Factors

ERSTE GROUP BANK AG

Rating Factors [1]	A	B	C	D	E	Total Score	Trend
Qualitative Factors (50%)						C-	
Factor: Franchise Value						C-	Neutral
Market share and sustainability			x				
Geographical diversification			x				
Earnings stability				x			
Earnings Diversification [2]							
Factor: Risk Positioning						D+	Neutral
Corporate Governance [2]							
- Ownership and Organizational Complexity							
- Key Man Risk							
- Insider and Related-Party Risks							
Controls and Risk Management			x				
- Risk Management			x				
- Controls		x					
Financial Reporting Transparency		x					
- Global Comparability	x						
- Frequency and Timeliness	x						
- Quality of Financial Information			x				
Credit Risk Concentration					x		
- Borrower Concentration					x		
- Industry Concentration				x			
Liquidity Management			x				
Market Risk Appetite		x					
Factor: Operating Environment						B-	Neutral
Economic Stability				x			
Integrity and Corruption		x					
Legal System	x						
Financial Factors (50%)						C-	
Factor: Profitability						C	Neutral
PPI % Average RWA (Basel II)		2.97%					
Net Income % Average RWA (Basel II)				0.39%			
Factor: Liquidity						C	Neutral
(Market Funds - Liquid Assets) % Total Assets			6.76%				
Liquidity Management			x				
Factor: Capital Adequacy						A	Neutral
Tier 1 Ratio (%) (Basel II)	10.73%						
Tangible Common Equity % RWA (Basel II)	8.10%						
Factor: Efficiency						B	Neutral
Cost / Income Ratio		53.87%					
Factor: Asset Quality						E+	Neutral
Problem Loans % Gross Loans				8.40%			
Problem Loans % (Equity + LLR)					57.08%		
Lowest Combined Financial Factor Score (15%)						E+	
Economic Insolvency Override						Neutral	
Aggregate BFSR Score						C-	
Aggregate BCA Score						baa1/baa2	
Assigned BFSR						D+	
Assigned BCA						baa3	

[1] - Where dashes are shown for a particular factor (or sub-factor), the score is based on non-public information.

[2] - A blank score under Earnings Diversification or Corporate Governance indicates the risk is neutral.



© 2013 Moody's Investors Service, Inc. and/or its licensors and affiliates (collectively, "MOODY'S"). All rights reserved.

CREDIT RATINGS ISSUED BY MOODY'S INVESTORS SERVICE, INC. ("MIS") AND ITS AFFILIATES 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. 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 MAKE ITS OWN STUDY AND EVALUATION OF EACH SECURITY THAT IS UNDER CONSIDERATION FOR PURCHASE, HOLDING, OR SALE.

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. Under no circumstances shall MOODY'S have any liability to any person or entity for (a) any loss or damage in whole or in part caused by, resulting from, or relating to, any error (negligent or otherwise) or other circumstance or contingency within or outside the control of MOODY'S or any of its directors, officers, employees or agents in connection with the procurement, collection, compilation, analysis, interpretation, communication, publication or delivery of any such information, or (b) any direct, indirect, special, consequential, compensatory or incidental damages whatsoever (including without limitation, lost profits), even if MOODY'S is advised in advance of the possibility of such damages, resulting from the use of or inability to use, any such information. The ratings, financial reporting analysis, projections, and other observations, if any, constituting part of the information contained herein are, and must be construed solely as, statements of opinion and not statements of fact or recommendations to purchase, sell or hold any securities. Each user of the information contained herein must make its own study and evaluation of each security it may consider purchasing,

holding or selling. 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.

MIS, 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 MIS have, prior to assignment of any rating, agreed to pay to MIS 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.moodys.com under the heading "Shareholder 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 61 003 399 657 AFSL 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.