

# MOODY'S

## INVESTORS SERVICE

### CREDIT OPINION

15 December 2017

#### Update

[Rate this Research](#) >>

#### RATINGS

##### De Volksbank N.V.

Domicile	Netherlands
Long Term Debt	Baa1
Type	Senior Unsecured - Fgn Curr
Outlook	Positive
Long Term Deposit	A3
Type	LT Bank Deposits - Fgn Curr
Outlook	Positive

Please see the [ratings section](#) at the end of this report for more information. The ratings and outlook shown reflect information as of the publication date.

#### Contacts

Laurent Le Mouel +33.1.5330.3340  
VP-Senior Analyst  
laurent.lemouel@moodys.com

Yasuko Nakamura +33.1.5330.1030  
VP-Sr Credit Officer  
yasuko.nakamura@moodys.com

Andreea Prodea +33.1.5330.1055  
Associate Analyst  
andreea.prodea@moodys.com

Alain Laurin +33.1.5330.1059  
Associate Managing Director  
alain.laurin@moodys.com

Nick Hill +33.1.5330.1029  
MD-Banking  
nick.hill@moodys.com

## De Volksbank N.V.

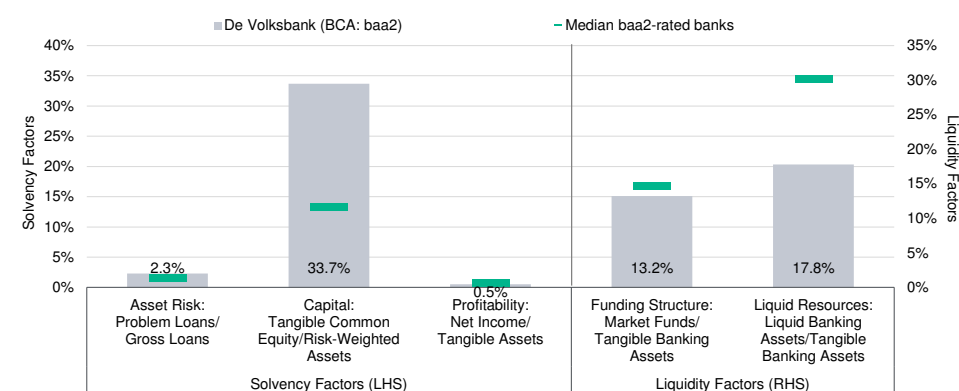
### Semiannual update

#### Summary

[De Volksbank N.V.](#)'s (De Volksbank) long-term deposit and senior unsecured ratings of A3 and Baa1, respectively, primarily reflect the bank's baa2 standalone Baseline Credit Assessment (BCA). De Volksbank's BCA is driven by the bank's strengthened loan book quality (because its activity has been refocused on the Dutch retail market), very strong capital buffer and sound liquidity profile, enhanced by its renewed access to market funding. In a challenging and competitive environment for retail banking, De Volksbank's profitability is resilient and will benefit from the measures taken by the bank to strengthen its franchise. De Volksbank's deposit rating also incorporates a low loss-given-failure, which translates into a one-notch uplift from its BCA. For senior unsecured debt, the moderate loss-given-failure leads to no uplift. In addition, both ratings benefit from an additional one-notch uplift driven by the moderate probability of government support because De Volksbank, a state-owned bank, is considered systemic in the Netherlands. The outlook on De Volksbank's long-term ratings is positive, reflecting our view that further improvements in the Dutch macroeconomic environment and the successful implementation of the bank's new strategy will continue to support its business model, despite the challenging low interest rate environment.

Exhibit 1

#### Rating Scorecard - Key financial ratios



Source: Moody's Financial Metrics

## Credit strengths

- » Strengthened loan book quality and business profile; activity refocused on the Dutch retail market
- » A very strong capital buffer
- » A sound liquidity profile, enhanced by renewed access to market funding

## Credit challenges

- » Profitability challenged by the low interest rate environment and the highly competitive Dutch market
- » Risks and revenue highly correlated with the Dutch mortgage market

## Rating outlook

The outlook on De Volksbank's long-term deposit and debt ratings is positive, reflecting our view that further improvements in the Dutch macroeconomic environment, with a low unemployment rate and rising house prices, will continue to support De Volksbank's business model, despite the challenging low interest rate environment. The bank also benefits from a revised strategy, which, if successful, will enhance its commercial franchise and profitability.

## Factors that could lead to an upgrade

- » De Volksbank's BCA could be upgraded as a result of (1) further improvements in the Dutch economy, resulting in lower asset risk and enhanced profitability, and (2) the bank's achievements in strengthening its franchise through its new strategy. An upgrade of De Volksbank's BCA and adjusted BCA would likely result in an upgrade to all the bank's ratings.
- » A significant increase in the bank's senior unsecured or subordinated debt outstanding could also lead to a reduction in loss-given-failure for senior unsecured debt, which could result in an upgrade of the bank's senior unsecured debt rating.

## Factors that could lead to a downgrade

- » The positive outlook assigned to De Volksbank's deposit and senior unsecured debt ratings indicates that the likelihood of a downgrade is low. De Volksbank's ratings could, nevertheless, be downgraded as a result of a reduction in the bank's baa2 BCA. For example, a downgrade of De Volksbank's BCA could be driven by an unexpected deterioration in the macroeconomic environment in the Netherlands, which would weigh on the bank's financial position. A reduction in the BCA would likely lead to a downgrade of the bank's long-term ratings.
- » A decrease in the amount of outstanding debt or deposits would also increase the loss given failure of these instruments and potentially lead to a downgrade of the bank's deposit rating.

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.moody's.com](http://www.moody's.com) for the most updated credit rating action information and rating history.

## Key indicators

Exhibit 2

### De Volksbank N.V. (Consolidated Financials) [1]

	6-17 <sup>2</sup>	12-16 <sup>2</sup>	12-15 <sup>2</sup>	12-14 <sup>2</sup>	12-13 <sup>2</sup>	CAGR/Avg. <sup>3</sup>
Total Assets (EUR million)	60,092	60,572	61,422	66,513	73,416	-5.6 <sup>4</sup>
Total Assets (USD million)	68,538	63,888	66,722	80,484	101,164	-10.5 <sup>4</sup>
Tangible Common Equity (EUR million)	3,389	3,346	3,118	2,580	2,266	12.2 <sup>4</sup>
Tangible Common Equity (USD million)	3,865	3,529	3,387	3,122	3,122	6.3 <sup>4</sup>
Problem Loans / Gross Loans (%)	1.4	1.4	2.7	3.8	4.5	2.8 <sup>5</sup>
Tangible Common Equity / Risk Weighted Assets (%)	33.7	30.9	27.1	18.7	15.0	25.1 <sup>6</sup>
Problem Loans / (Tangible Common Equity + Loan Loss Reserve) (%)	19.5	19.2	37.5	65.2	89.2	46.1 <sup>5</sup>
Net Interest Margin (%)	1.5	1.5	1.6	1.5	1.3	1.5 <sup>5</sup>
PPI / Average RWA (%)	4.1	3.1	4.0	3.6	3.6	3.7 <sup>6</sup>
Net Income / Tangible Assets (%)	0.6	0.5	0.6	0.2	-1.8	0.0 <sup>5</sup>
Cost / Income Ratio (%)	58.1	64.5	54.4	52.2	49.1	55.7 <sup>5</sup>
Market Funds / Tangible Banking Assets (%)	12.0	13.2	14.4	22.5	34.7	19.4 <sup>5</sup>
Liquid Banking Assets / Tangible Banking Assets (%)	17.0	17.8	17.5	17.4	23.5	18.6 <sup>5</sup>
Gross Loans / Due to Customers (%)	101.9	102.9	104.6	115.4	122.7	109.5 <sup>5</sup>

[1] All figures and ratios are adjusted using Moody's standard adjustments. [2] Basel III - fully-loaded or transitional phase-in; IFRS. [3] May include rounding differences due to scale of reported amounts. [4] Compound Annual Growth Rate (%) based on time period presented for the latest accounting regime. [5] Simple average of periods presented for the latest accounting regime. [6] Simple average of Basel III periods presented.

Source: Moody's Financial Metrics

## Profile

De Volksbank (formerly SNS Bank NV) is the fourth-largest retail bank in the Netherlands. As of June 2017, De Volksbank reported €61 billion in consolidated assets, a deposit base of €48 billion and a loan book of €48.8 billion. De Volksbank provides a range of retail banking and insurance products and services, including mortgages, current accounts, savings accounts and investment products. The bank mainly services individual retail customers and small and medium-sized enterprises (SMEs) in the Netherlands.

Following large losses in its commercial real estate (CRE) lending portfolio, the former SNS Group (SNS REAAL) was nationalized on 1 February 2013 and subjected to an in-depth restructuring. In July 2016, the Dutch state agency NL Financial Investments (NLI), the owner of De Volksbank, submitted a report to the Dutch Ministry of Finance advising it to postpone any decisions regarding the transfer of the bank's shares back to the private sector. The report suggests that a decision should not be taken before the bank's new business strategy has been fully implemented. The Ministry subscribed to NLI's conclusions in a letter sent to the House of Representatives concerning the future of the bank.

On 31 December 2016, ASN Bank NV, RegioBank NV and SNS Bank NV were legally merged and the separate banking licenses of ASN Bank NV and RegioBank NV subsequently lapsed. The four brands, including BLG Wonen, ASN Bank, RegioBank and SNS, are covered by the banking license of SNS Bank NV, renamed De Volksbank on 1 January 2017. Please [click here](#) for further information on De Volksbank.

## Detailed credit considerations

The financial data in the following sections are sourced from De Volksbank's financial statements, unless otherwise stated.

### Strengthened loan book quality and business profile; activity refocused on the Dutch retail market

De Volksbank's new business strategy is focused on retail banking, with the aim of offering simple and transparent products in the areas of mortgages, savings and payments. As a result of this derisking and deleveraging strategy, De Volksbank's activities are now refocused on the Dutch retail market. As of June 2017, 93% of the bank's loan book consisted of Dutch retail mortgages, while the remaining 7% comprised loans to SMEs and public-sector entities.

As a consequence of (1) the bank's new strategy; (2) improving macroeconomic conditions in the Netherlands; and (3) stricter lending standards, driven by the Dutch government's measures on the tax deductibility of home loan interests and maximum loan-to-value ratios, De Volksbank's asset risk profile has materially decreased since 2012. In the first half of 2017, the bank's NPL ratio stood at 1.4%,

a material decrease from 7.6% in 2012. The bank's credit costs on domestic mortgages were negative in H1 2017, at -8 basis points (bps) of gross loans, compared with 8 bps in 2015. This decrease was because of the substantial releases of loan-loss provisions, driven by a sharp decline in loans in arrears over the last 18 months.

We expect the Dutch economy to continue to grow at 2.6% in 2018 and 2.2% in 2019, favoring employment and household spending. House prices have increased steadily over the last three years at a 3-4% rate, and we do not expect a material deterioration over the next 12-18 months. This favorable macroeconomic environment will, therefore, continue to benefit De Volksbank's asset quality. The a2 score for asset risk, which results from a relatively low three-year average nonperforming loan ratio of 2.3%, reflects our assessment of De Volksbank's enhanced risk profile.

### A very strong capital buffer

De Volksbank is very well capitalized; its tangible common equity (TCE) amounted to 33.7% of its risk-weighted assets (RWA) as of June 2017. The bank's fully-loaded Common Equity Tier 1 (CET1) ratio stood at 32.8% as of the same date, well above its requirement of 9.25% in 2017 (consisting of a Pillar 1 requirement of 4.5%, a capital conservation buffer of 1.25%, a systemic buffer of 0.5% and a Pillar 2 requirement of 3%). The bank's capital ratio has increased substantially since 2014 as a result of (1) retained earnings, and (2) a decrease in RWA, driven by lower probabilities of default and loss-given-default as a result of improved economic conditions. As of June 2017, De Volksbank's leverage ratio stood at 5.5%, in line with that of most of its peers. The bank's risk-weighted ratio is high, compared with its leverage ratio, owing to the low risk weight applied to mortgages. We expect the new rules, published by the Basel Committee on 7 December 2017, to negatively impact the bank's capital ratio.

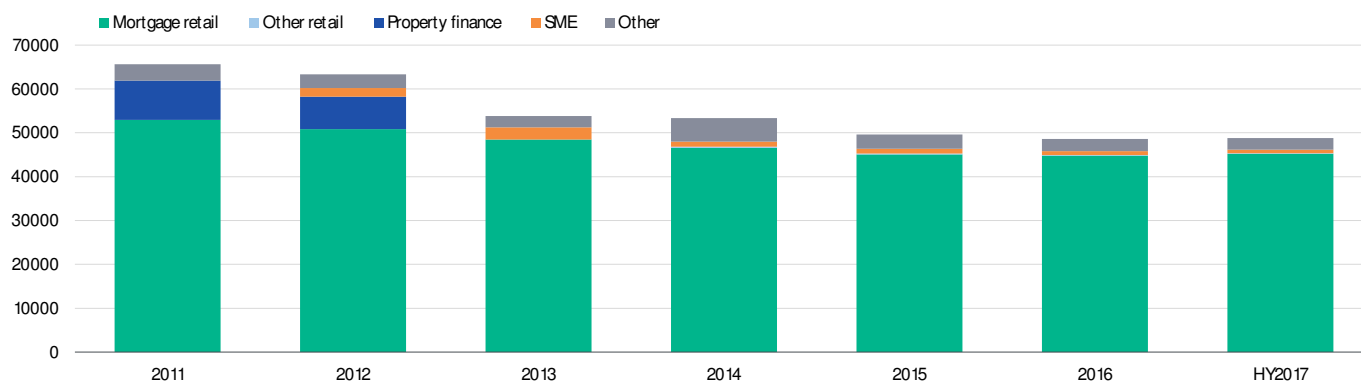
In H1 2017, De Volksbank paid €135 million in dividends from its 2016 profits to its sole shareholder, NLF, at a payout ratio of 41%, in line with its dividend payout target range of 40%-60%. The bank's minimum requirement of own funds and eligible liabilities (MREL) amounts to 8.1% of total gross assets (6.3% of which comprise regulatory capital). We expect De Volksbank to increase the amount of debt eligible for MREL in the next 12-18 months, as soon as the Dutch government's proposal to introduce non-preferred senior notes is endorsed. De Volksbank's TCE/RWA of 33.7% maps to a aa1 score for capital. This ratio is adjusted downward by two notches to aa3 to reflect the potential impact of the new regulatory framework on De Volksbank's capital ratios.

### Profitability challenged by low interest rates and a highly competitive environment

The profitability of De Volksbank's core retail activities is constrained by the challenging low interest rate environment and the bank's modest commercial franchise, compared with Dutch peers. The bank reported a €177 million net profit for the first six months of 2017, a 2.2% decrease from the same period a year earlier. This decrease was mainly driven by a decline in net interest income (-2.1%) and net fee and commission income (-16.1%) from the same period last year, combined with a lower net release of loan-loss provisions. The decrease in net interest income is because of (1) a high number of early repayments, and (2) renegotiations of mortgage loans at lower rates.

Exhibit 3

#### De Volksbank's bank loan portfolio (in € millions)



Source: Bank financial statements

De Volksbank will continue to incur transformation costs from the digitalization and upgrade of its business operations, as well as increased regulatory costs. The bank's cost-to-income ratio improved in the first six months of 2017 to 52.5% from 54.2% for the same period the previous year. A key challenge for De Volksbank is to preserve its profitability by attracting new clients and to improve its cost-efficiency. We consider the bank to be well positioned to achieve its targets because of the following factors:

- » De Volksbank's loan portfolio has been stabilizing since year-end 2015, chiefly because of the bank's efforts to redefine its commercial offering and pricing policies. These measures have been reinforced by the bank's new strategy.
- » Over the last year, De Volksbank has reduced its deposit rates to preserve margins. We estimate that compared with its Dutch peers, the bank still has room to further reduce deposit rates.
- » De Volksbank should continue to benefit from the positive prospects for the Dutch mortgage market in the coming years. Constraints on housing supply have driven a 3%-4% yearly price increase since 2013, and the current low unemployment and mortgage rates could prompt further price increases, which may be positive for the construction sector.

Furthermore, De Volksbank has been implementing a new strategy aimed at tightening its brand positioning, derisking its activity and streamlining its commercial offering. This new strategy has been endorsed by the Dutch Ministry of Finance, which, on 1 July 2016, granted more time to the bank before deciding on its future shareholding structure. These elements are reflected in the ba1 score assigned to De Volksbank's profitability, taking into consideration the stability and resilience of the bank's profits since 2014.

#### **A sound liquidity profile, enhanced by renewed access to market funding**

De Volksbank's liquidity profile supports its overall standalone credit profile, primarily as a result of its large liquidity buffer, which should enable it to resist a prolonged period of financial market disruption. De Volksbank's liquid assets amounted to €11.8 billion as of June 2017, while its wholesale funding, maturing by the end of 2018, stood at €2.2 billion. The bank's liquidity buffer mainly consists of cash (€3.3 billion), sovereign and public-sector bonds (€3.4 billion), as well as residential mortgage-backed securities (RMBS) eligible for central bank refinancing (€4.8 billion). Although these assets are eligible for the European Central Bank (ECB) operations, we consider them to be of lower quality than central bank deposits or government bonds because they may not be negotiable in the secondary market in a stress situation.

In recent years, the bank has significantly reduced its reliance on wholesale funding as a result of the disposal of its legacy CRE portfolio and a successful deposit-acquisition strategy. The bank's deposit base amounted to €48 billion (€37.4 billion in retail savings and €10.7 billion in other deposits) as of June 2017, bringing its gross loan-to-deposit ratio to 103%. The other deposit category is comprised of commercial deposits from SMEs and retail customers, as well as debt instruments (Schuldscheine) issued by pension funds and insurance companies, which are partly considered wholesale funding. The bank's strong liquidity and funding profiles are also confirmed by its liquidity coverage ratio and net stable funding ratio, both above 100%, as of the same date.

On 29 October 2015, De Volksbank issued a €500 million 10-year Tier 2 bond. This was the first time De Volksbank tapped the capital markets since its nationalization. In May 2017, De Volksbank publicly issued a €0.5 billion covered bond with a 10-year maturity. These developments are credit positive and demonstrate that De Volksbank's liquidity profile is no longer constrained by its restricted access to capital markets. In that regard, we expect De Volksbank to issue an amount of around €1.2 billion in senior non-preferred debt in the next years. All these elements are reflected in the bank's combined liquidity score of baa1. De Volksbank's BCA of baa2 reflects its financial profile of a3, which is adjusted downwards by one notch to reflect the bank's excessive sensitivity to the Dutch retail mortgage market. The bank's assigned BCA is at the lower end of the scorecard-calculated BCA range of a3-baa2, which reflects a potential for further upgrade, as explained above.

### **Support and structural considerations**

#### **Loss Given Failure (LGF) analysis**

De Volksbank is subject to the EU Bank Recovery and Resolution Directive, which we consider to be an operational resolution regime. We assume residual TCE of 3%, losses post-failure of 8% of tangible banking assets, a 25% run-off in junior wholesale deposits, a 5% run-off in preferred deposits, a proportion of junior deposits of 10% of total customer deposits, and a 25% probability to deposits being preferred to senior unsecured debt. These assumptions are in keeping with our standard assumptions.

- » Our LGF analysis indicates a low loss-given-failure for deposits, leading us to assign a one-notch uplift above the Adjusted BCA.
- » Our LGF analysis indicates a moderate loss-given-failure for senior unsecured debt, which translates into no uplift above the Adjusted BCA.
- » Our LGF analysis indicates a high loss given failure for subordinated debt, leading us to make a negative adjustment of one notch below the Adjusted BCA.

### Government support considerations

The central bank of the Netherlands considers De Volksbank as a domestic systemically important institution. We thus believe there is a moderate probability of government support for junior deposits and senior unsecured debt, resulting in one notch of additional uplift from the bank's BCA. For other junior securities, we assume a low government support probability, and, therefore, the ratings for these instruments do not include any related uplift.

### Counterparty Risk (CR) Assessment

CR Assessments are opinions of how counterparty obligations are likely to be treated if a bank fails and are distinct from debt and deposit ratings in that they (1) consider only the risk of default rather than both the likelihood of default and the expected financial loss suffered in the event of default, and (2) apply to counterparty obligations and contractual commitments rather than debt or deposit instruments. The CR assessment is an opinion of the counterparty risk related to a bank's covered bonds, contractual performance obligations (servicing), derivatives (e.g., swaps), letters of credit, guarantees and liquidity facilities.

#### De VolksBank's CR Assessment is positioned at A1(cr)/Prime-1(cr)

The CR Assessment includes three notches of uplift from the bank's BCA of baa2, based on the buffer against default provided by subordinated instruments and, in line with our support assumptions on deposits and senior unsecured debt, one notch of government support to the senior obligations represented by the CR Assessment. The main difference with our Advanced LGF approach, used to determine instrument ratings, is that the CR Assessment captures the probability of default on certain senior obligations, rather than expected loss, therefore, we focus purely on subordination and take no account of the volume of the instrument class.

## Rating methodology and scorecard factors

Exhibit 4

De Volksbank N.V.

### Macro Factors

**Weighted Macro Profile**      **Strong +**      **100%**

Factor	Historic Ratio	Macro Adjusted Score	Credit Trend	Assigned Score	Key driver #1	Key driver #2
Solvency						
Asset Risk						
Problem Loans / Gross Loans	2.3%	a2	← →	a2	Quality of assets	
Capital						
TCE / RWA	33.7%	aa1	← →	aa3	Risk-weighted capitalisation	
Profitability						
Net Income / Tangible Assets	0.5%	ba1	↓	ba1	Earnings quality	
Combined Solvency Score		a2		a2		
Liquidity						
Funding Structure						
Market Funds / Tangible Banking Assets	13.2%	a2	← →	a3	Deposit quality	
Liquid Resources						
Liquid Banking Assets / Tangible Banking Assets	17.8%	baa2	← →	baa2	Quality of liquid assets	
Combined Liquidity Score		a3		baa1		
Financial Profile				a3		
Business Diversification				-1		
Opacity and Complexity				0		
Corporate Behavior				0		
Total Qualitative Adjustments				-1		
Sovereign or Affiliate constraint:				Aaa		
Scorecard Calculated BCA range				a3-baa2		
Assigned BCA				baa2		
Affiliate Support notching				0		
Adjusted BCA				baa2		

Balance Sheet	in-scope (EUR million)	% in-scope	at-failure (EUR million)	% at-failure
Other liabilities	8,220	13.7%	11,582	19.3%
Deposits	48,031	79.9%	44,669	74.4%
Preferred deposits	43,228	72.0%	41,067	68.4%
Junior Deposits	4,803	8.0%	3,602	6.0%
Senior unsecured bank debt	1,527	2.5%	1,527	2.5%
Dated subordinated bank debt	498	0.8%	498	0.8%
Equity	1,802	3.0%	1,802	3.0%
Total Tangible Banking Assets	60,078	100%	60,078	100%

Debt class	De Jure waterfall		De Facto waterfall		Notching		LGF	Assigned	Additional	Preliminary
	Instrument	Sub-	Instrument	Sub-	De Jure	De Facto	Notching	LGF	notching	Rating
	volume +	ordination	volume +	ordination			Guidance	notching		Assessment
	subordination		subordination				vs.			
							Adjusted			
							BCA			
Counterparty Risk Assessment	12.4%	12.4%	12.4%	12.4%	3	3	3	3	0	a2 (cr)
Deposits	12.4%	3.8%	12.4%	6.4%	1	1	1	1	0	baa1
Senior unsecured bank debt	12.4%	3.8%	6.4%	3.8%	1	-1	0	0	0	baa2
Dated subordinated bank debt	3.8%	3.0%	3.8%	3.0%	-1	-1	-1	-1	0	baa3

Instrument class	Loss Given		Additional	Preliminary Rating	Government		Local Currency	Foreign
	Failure	notching			Support	notching	Rating	Currency
			Notching	Assessment				Rating
Counterparty Risk Assessment	3		0	a2 (cr)	1		A1 (cr)	--
Deposits	1		0	baa1	1		A3	A3
Senior unsecured bank debt	0		0	baa2	1		Baa1	Baa1
Dated subordinated bank debt	-1		0	baa3	0		Baa3	--

Source: Moody's Financial Metrics

## Ratings

Exhibit 5

Category	Moody's Rating
<b>DE VOLKSBANK N.V.</b>	
Outlook	Positive
Bank Deposits	A3/P-2
Baseline Credit Assessment	baa2
Adjusted Baseline Credit Assessment	baa2
Counterparty Risk Assessment	A1(cr)/P-1(cr)
Senior Unsecured	Baa1
Subordinate -Dom Curr	Baa3
Commercial Paper -Dom Curr	P-2
Other Short Term -Dom Curr	(P)P-2

Source: Moody's Investors Service



© 2017 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 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 AND INAPPROPRIATE FOR RETAIL INVESTORS TO USE MOODY'S CREDIT RATINGS OR MOODY'S PUBLICATIONS WHEN MAKING AN 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](http://www.moody.com) under the heading "Investor Relations — Corporate Governance — Director and Shareholder Affiliation Policy."

Additional terms 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 investors. It would be reckless and inappropriate for retail investors to use MOODY'S credit ratings or publications when making an investment decision. If in doubt you should contact your financial or other professional adviser.

Additional terms 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.

## Contacts

Laurent Le Mouel +33.1.5330.3340  
VP-Senior Analyst  
laurent.lemouel@moody.com

Andreea Prodea +33.1.5330.1055  
Associate Analyst  
andreea.prodea@moody.com

Nick Hill +33.1.5330.1029  
MD-Banking  
nick.hill@moody.com

Yasuko Nakamura +33.1.5330.1030  
VP-Sr Credit Officer  
yasuko.nakamura@moody.com

Alain Laurin +33.1.5330.1059  
Associate Managing  
Director  
alain.laurin@moody.com

## CLIENT SERVICES

Americas 1-212-553-1653

Asia Pacific 852-3551-3077

Japan 81-3-5408-4100

EMEA 44-20-7772-5454