

ISSUER COMMENT

20 May 2019

RATING

General Obligation (or GO Related) ¹

Aaa Stable

Contacts

James Kerin, CFA +1.214.979.6859
Associate Lead Analyst
james.kerin@moodys.com

Gregory W. Lipitz +1.212.553.7782
VP-Sr Credit Officer/Manager
gregory.lipitz@moodys.com

CLIENT SERVICES

Americas	1-212-553-1653
Asia Pacific	852-3551-3077
Japan	81-3-5408-4100
EMEA	44-20-7772-5454

City of Raleigh, NC

Annual Comment on Raleigh

Issuer Profile

The City of Raleigh is the county seat of Wake County and the state capital, located in the Piedmont region of central North Carolina. The city forms one point of the Research Triangle Park, along with Chapel Hill and Durham. The county has a population of 1,023,811 and a high population density of 1,231 people per square mile. The county's median family income is \$91,701 (1st quartile) and the February 2019 unemployment rate was 3.6% (2nd quartile) ². The largest industry sectors that drive the local economy are professional/scientific/technical services, retail trade, and health services.

Credit Overview

The credit position for Raleigh is extremely strong, and its Aaa rating is significantly above the median rating of Aa3 for US cities. Notable credit factors include a very healthy financial position, an extensive tax base and a strong wealth and income profile. It also reflects a low debt burden and a moderate pension liability.

Finances: Raleigh has a robust financial position, which is consistent with the assigned rating of Aaa. The cash balance as a percent of operating revenues (52.9%) exceeds the US median, and remained stable from 2014 to 2018. Additionally, the fund balance as a percent of operating revenues (59.4%) is far superior to other Moody's-rated cities nationwide.

Economy and Tax Base: The economy and tax base of Raleigh are very healthy and are comparable to its Aaa rating. The total full value (\$59.2 billion) is significantly above the US median, and grew markedly from 2014 to 2018. Also, the full value per capita (\$127,369) is much stronger than the US median. Lastly, the median family income is a solid 110% of the US level.

Debt and Pensions: Overall, the debt and pension liabilities of the city are affordable, though they are unfavorable relative to the Aaa rating assigned. Raleigh's net direct debt to full value (0.9%) approximates the US median, and remained flat between 2014 and 2018. Also, the Moody's-adjusted net pension liability to operating revenues (1.1x) favorably is slightly lower than the US median.

Management and Governance: North Carolina cities have an Institutional Framework score ³ of Aaa, which is high compared to the nation. Institutional Framework scores measure a sector's legal ability to increase revenues and decrease expenditures. Property taxes, the sector's major revenue source, is subject to a cap which can be overridden with voter approval. However, the cap of \$15 per \$1,000 of assessed value still allows for significant revenue-raising ability. Unpredictable revenue fluctuations tend to be minor, or under 5% annually. Across the sector, fixed and mandated costs are generally less than 25% of

expenditures. North Carolina is a Right to Work state, providing significant expenditure-cutting ability. Unpredictable expenditure fluctuations tend to be minor, under 5% annually.

Sector Trends - North Carolina Cities

North Carolina cities will generally benefit from a robust state economy, although rural areas still transitioning from a high reliance on textile, furniture and tobacco employment will lag the rest of the state. Most cities benefit from diverse economic expansion of the technology, pharmaceutical, financial and tourism sectors. Sales tax collections are increasing and an improving housing market has bolstered property tax revenues. Pensions are well funded and not expected to have an outsized negative impact on the credit quality of cities as a whole.

EXHIBIT 1

Key Indicators ⁴ ⁵ Raleigh

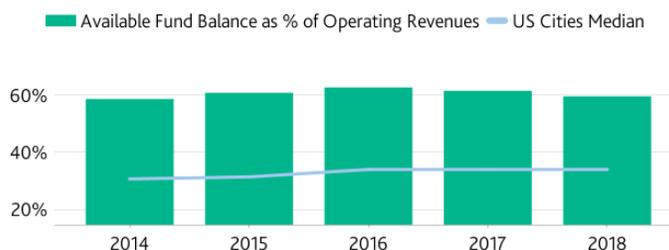
	2014	2015	2016	2017	2018	US Median	Credit Trend
Economy / Tax Base							
Total Full Value	\$52,697M	\$52,725M	\$53,725M	\$58,465M	\$59,195M	\$1,867M	Improved
Full Value Per Capita	\$124,496	\$121,904	\$121,737	\$127,408	\$127,369	\$89,200	Stable
Median Family Income (% of US Median)	105%	106%	110%	110%	110%	113%	Improved
Finances							
Available Fund Balance as % of Operating Revenues	58.5%	60.6%	62.5%	61.3%	59.4%	33.9%	Stable
Net Cash Balance as % of Operating Revenues	53.0%	55.0%	57.2%	55.9%	52.9%	36.9%	Stable
Debt / Pensions							
Net Direct Debt / Full Value	0.9%	1.1%	1.0%	1.0%	0.9%	1.1%	Stable
Net Direct Debt / Operating Revenues	1.25x	1.39x	1.35x	1.41x	1.22x	0.88x	Stable
Moody's-adjusted Net Pension Liability (3-yr average) to Full Value	0.6%	0.6%	0.6%	0.7%	0.8%	1.8%	Stable
Moody's-adjusted Net Pension Liability (3-yr average) to Operating Revenues	0.83x	0.80x	0.79x	0.99x	1.09x	1.51x	Stable
	2014	2015	2016	2017	2018	US Median	
Debt and Financial Data							
Population	423,287	432,520	441,326	458,880	464,758	N/A	
Available Fund Balance (\$000s)	\$221,961	\$242,696	\$260,384	\$267,111	\$271,709	\$7,419	
Net Cash Balance (\$000s)	\$201,115	\$220,243	\$238,484	\$243,608	\$242,160	\$8,404	
Operating Revenues (\$000s)	\$379,702	\$400,298	\$416,720	\$435,571	\$457,490	\$21,930	
Net Direct Debt (\$000s)	\$475,452	\$557,028	\$564,062	\$613,758	\$559,368	\$18,580	
Moody's Adjusted Net Pension Liability (3-yr average) (\$000s)	\$314,618	\$322,239	\$327,921	\$430,454	\$500,859	\$32,507	

Source: Moody's Investors Service

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 for the most updated credit rating action information and rating history.

EXHIBIT 2

Available fund balance as a percent of operating revenues consistent from 2014 to 2018



Source: Issuer financial statements; Moody's Investors Service

EXHIBIT 3

Full value of the property tax base increased from 2014 to 2018



Source: Issuer financial statements; Government data sources; Offering statements; Moody's Investors Service

EXHIBIT 4

Moody's-adjusted net pension liability to operating revenues remained stable from 2014 to 2018



Source: Issuer financial statements; Government data sources; Offering statements; Moody's Investors Service

Endnotes

- The rating referenced in this report is the issuer's General Obligation (GO) rating or its highest public rating that is GO-related. A GO bond is generally backed by the full faith and credit pledge and total taxing power of the issuer. GO-related securities include general obligation limited tax, annual appropriation, lease revenue, non-ad valorem, and moral obligation debt. The referenced ratings reflect the government's underlying credit quality without regard to state guarantees, enhancement programs or bond insurance.
 - The demographic data presented, including population, population density, per capita personal income and unemployment rate are derived from the most recently available US government databases. Population, population density and per capita personal income come from the American Community Survey while the unemployment rate comes from the Bureau of Labor Statistics.
- The largest industry sectors are derived from the Bureau of Economic Analysis. Moody's allocated the per capita personal income data and unemployment data for all counties in the US census into quartiles. The quartiles are ordered from strongest-to-weakest from a credit perspective: the highest per capita personal income quartile is first quartile, and the lowest unemployment rate is first quartile.
- The institutional framework score assesses a municipality's legal ability to match revenues with expenditures based on its constitutionally and legislatively conferred powers and responsibilities. See [US Local Government General Obligation Debt \(December 2016\)](#) methodology report for more details.
 - For definitions of the metrics in the Key Indicators Table, [US Local Government General Obligation Methodology and Scorecard User Guide \(July 2014\)](#). Metrics represented as N/A indicate the data were not available at the time of publication.
 - The medians come from our most recently published local government medians report, [Medians - Property values key to stability, but pension burdens remain a challenge \(March 2018\)](#) which is available on Moodys.com. The medians presented here are based on the key metrics outlined in Moody's GO methodology and the associated scorecard.

© 2019 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 OR IMPAIRMENT. SEE MOODY'S RATING SYMBOLS AND DEFINITIONS PUBLICATION FOR INFORMATION ON THE TYPES OF CONTRACTUAL FINANCIAL OBLIGATIONS ADDRESSED BY MOODY'S RATINGS. 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.

CREDIT RATINGS AND MOODY'S PUBLICATIONS ARE NOT INTENDED FOR USE BY ANY PERSON AS A BENCHMARK AS THAT TERM IS DEFINED FOR REGULATORY PURPOSES AND MUST NOT BE USED IN ANY WAY THAT COULD RESULT IN THEM BEING CONSIDERED A BENCHMARK.

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 CREDIT 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 ratings opinions and services rendered by it fees ranging from \$1,000 to approximately \$2,700,000. 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."

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.

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 ratings opinions and services rendered by it fees ranging from JPY125,000 to approximately JPY250,000,000.

MJKK and MSFJ also maintain policies and procedures to address Japanese regulatory requirements.

REPORT NUMBER

1171271

CLIENT SERVICES

Americas	1-212-553-1653
Asia Pacific	852-3551-3077
Japan	81-3-5408-4100
EMEA	44-20-7772-5454