Memorandum



DATE October 12, 2018

TO Honorable Mayor and Members of the City Council

SUBJECT Moody's Investors Service Credit Analysis Update Affirms City's A1 Stable Rating - INFORMATION

On October 8, 2018, Moody's Investors Service (Moody's) released a credit opinion for the City which affirms the City's A1 stable rating. Moody's credit analysis focuses heavily on the Dallas Police and Fire Pension unfunded liability but provides positive comments regarding the City's current efforts and future growth in revenues. In particular, Moody's report states that, "the stable outlook considers the city's adequate level of operating reserves, and its enhanced fiscal management as evidenced by its implementation of forward-planning tools, including the biennial budget and longer range financial projections."

Similar to the article released in July, this is a positive reflection on Dallas following the adoption of the Fiscal Year 2018-19 budget and in advance of upcoming bond sales.

Please let me know if you need additional information.

M. Elifabeth Reich

M. Elizabeth Reich Chief Financial Officer

Attachment

c:

T.C. Broadnax, City Manager Chris Caso, City Attorney (I) Carol A. Smith, City Auditor (I) Bilierae Johnson, City Secretary Preston Robinson, Administrative Judge Kimberly Bizor Tolbert, Chief of Staff to the City Manager Majed A. Al-Ghafry, Assistant City Manager Jon Fortune, Assistant City Manager Joey Zapata, Assistant City Manager Nadia Chandler Hardy, Assistant City Manager and Chief Resilience Officer Directors and Assistant Directors

MOODY'S INVESTORS SERVICE

CREDIT OPINION

8 October 2018



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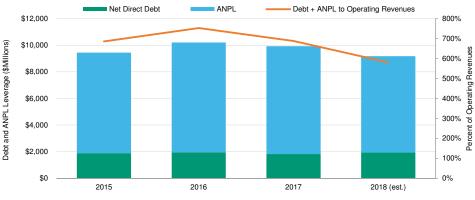
Update to credit analysis

Summary

The city of Dallas (A1 stable) benefits from growing revenues stemming from strong economic growth and a rapidly expanding tax base, a stable and manageable debt burden even with ramped up investment in city infrastructure, and modestly improving, healthy operating reserves. The city's primary credit weakness is poorly funded pension plans, namely the Dallas Police and Fire Pension. Major reform has brought about a significant reduction in the city's unfunded pension liabilities, but the city still faces significant risk that its costs must rise above currently planned levels. The city's unfunded liabilities will likely continue growing for the foreseeable future because its statutory contribution schedule remains below our "tread water" indicator and its public safety pension asset portfolio is unlikely to produce targeted return levels. The projected buildup of pension assets is heavily reliant on the pension system meeting investment return assumptions and payroll growth targets. Further, the city's credit profile is somewhat constrained by the need to increase public safety staffing and absorb increases to public safety salaries, which impacts the largest expenditure category in the city's general fund. However, based on our expectations of continued strong revenue growth and the city's implementation of longer-range financial planning, these operational pressures in combination with the trajectory of the pension funds, and the need to maintain core services, will be manageable challenges over the near term.

Exhibit 1

Pension reform and growing revenues point to reduced leverage relative to operating revenues in fiscal 2018



Debt figures include GOLT net of self-support from essential enterprises, accreted interest, as well as capital leases. Source: Moody's Investors Service, city of Dallas audited financial reports

Credit strengths

- » Large, rapidly growing and diverse tax base that anchors the Dallas/Fort Worth metroplex
- » Population and employment growth that surpass national averages
- » Seven consecutive years of operating surpluses on a reported basis; growth in operating reserves
- » Legal flexibility to further adjust pension benefits for current employees on a prospective basis and ample legal flexibility to raise revenues or cut expenditures
- » Settlement of public safety back-pay lawsuits removes a large contingent liability

Credit challenges

- » Reduced though still elevated unfunded pension liability expected to grow; pension contributions below "tread water" level
- » Budgetary pressures over near to medium term stemming from increased pension contributions, coupled with the cost of service priorities of the city
- » Elevated fixed costs, including debt service, pension contributions and OPEB

Rating outlook

The stable outlook reflects the significantly reduced unfunded pension liability following reform of the Dallas Police and Fire Pension (DPFP), and continued strong economic growth which affords ample financial flexibility. Additionally, the stable outlook considers the city's adequate level of operating reserves, and its enhanced fiscal management as evidenced by its implementation of forward-planning tools, including the biennial budget and longer range financial projections.

Factors that could lead to an upgrade

- » Material reduction in Moody's Adjusted Net Pension Liability (ANPL) relative to operating reserves
- » Demonstrated balanced operations inclusive of pension funding at actuarially determined levels

Factors that could lead to a downgrade

- » Pension asset accumulation that lags targets; increases to the ANPL and weakened annual contributions
- » Trend of declining operating reserves
- » Significant increase in the debt burden

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

Key indicators

Exhibit 2

Dallas (City of) TX	2013	2014	2015	2016	2017
Economy/Tax Base					
Total Full Value (\$000)	\$83,681,722	\$87,251,522	\$93,138,211	\$100,318,937	\$110,387,629
Population	1,222,167	1,240,985	1,260,688	1,278,433	1,270,170
Full Value Per Capita	\$68,470	\$70,308	\$73,879	\$78,470	\$86,908
Median Family Income (% of USMedian)	70.8%	71.0%	71.1%	71.6%	71.6%
Finances					
Operating Revenue (\$000)	\$1,250,319	\$1,327,996	\$1,377,442	\$1,355,442	\$1,441,984
Fund Balance (\$000)	\$145,167	\$162,886	\$195,532	\$178,987	\$224,582
Cash Balance (\$000)	\$141,588	\$155,980	\$198,819	\$187,938	\$215,589
Fund Balance as a % of Revenues	11.6%	12.3%	14.2%	13.2%	15.6%
Cash Balance as a % of Revenues	11.3%	11.7%	14.4%	13.9%	15.0%
Debt/Pensions					
Net Direct Debt (\$000)	\$1,778,653	\$1,683,386	\$1,882,725	\$1,951,220	\$1,820,650
3-Year Average of Moody's ANPL (\$000)	\$5,229,534	\$5,860,728	\$6,476,453	\$7,117,560	\$7,974,116
Net Direct Debt / Full Value (%)	2.1%	1.9%	2.0%	1.9%	1.6%
Net Direct Debt / Operating Revenues (x)	1.4x	1.3x	1.4x	1.4x	1.3x
Moody's - adjusted Net Pension Liability (3-yr average) to Full Value (%)	6.2%	6.7%	7.0%	7.1%	7.2%
Moody's - adjusted Net Pension Liability (3-yr average) to Pevenues (x)	4.2x	4.4x	4.7x	5.3x	5.5x

Source: Moody's Investors Service, city of Dallas audited financial reports

Profile

The city of Dallas is the ninth largest city in the US and the third largest city in Texas behind <u>Houston</u> (Aa3 stable) and <u>San Antonio</u> (Aaa stable). The city serves as the anchor to the Dallas-Fort Worth metroplex. The current population in Dallas is approximately 1.3 million.

Detailed credit considerations

Economy and tax base: strong economic indicators and tax base growth to continue

With job growth that continues to outpace the state and the nation, Dallas' tax base will continue to grow as strong population and job growth support demand for property. New development remains robust, particularly multi-family housing and office space. Assessed value (AV) growth has been very strong, most recently growing 9.9% in fiscal 2019, bringing the AV to a sizable \$130.1 billion. Following years of home appreciations that outpaced wage increases, annual growth is expected to soften but continue as home prices appreciate at a slower pace.

Demographic trends in the city are positive, with the population having increased by over 9% since the 2010 census to reach approximately 1.3 million. Dallas continues to have the largest job base in the metropolitan area, serving as home to many fortune 500 companies and a day time population that increases by over 20% relative to the resident population. As such, Dallas is a regional economic center for the metro area with thousands of people commuting to the city for work. The strong job and population growth has meant an increasing labor force with an unemployment rate that remains below the national average of 3.9%. As of May 2018, unemployment in the city was 3.5%, reflecting a tight labor market that puts upward pressure on wages. Employment growth has been visible across many sectors, and residents in the metropolitan area enjoy a diverse economic base with employment opportunities in the information technology, banking, commerce, medical, transportation, government and logistics sectors, among many others.

Financial operations and reserves: general fund to remain stable despite increased public safety expenditures

The city's financial position is stable and is expected to remain so over the near term supported by operating reserve policies, long range financial planning and continued economic growth. In 2019, the city has incorporated increased base salary and 3% pay increases to existing public safety employees. These budget approved increases are above negotiated levels per the meet and confer agreement

which expires in September 2019. The increased base salaries are partially attributable to challenges around increasing net public safety personnel. Though we expect that the city will be able to successfully absorb these increases, they will need to be incorporated into forward planning in years beyond fiscal 2019.

Fiscal 2017 ended with a strong surplus. Below-budget public safety headcount coupled with stronger than expected revenues and otherwise conservative budgeting led to a large \$44.1 million general fund surplus in fiscal 2017, bringing available general fund reserves to \$211.9 million or a healthy 17.4% of general fund revenues. Of note, the available general fund balance has increased annually, up from 12.7% of revenues in fiscal 2012. Inclusive of the debt service fund, the combined operating funds available balance increased to \$224.6 million in 2017, or 15.6% of operating revenues. The apparent structural balance and increasing reserves is somewhat muted by the annual underfunding of the pension plans such that the liability will grow, which persists but improves post-reform. The underfunding is largely attributable to statutory and/or local ordinance caps on contributions, and exacerbated in the recent past by severe asset loss in the public safety pension plan.

Looking forward, the city's general fund reserves will remain at least at policy levels over the next 5 years. The city expects to report a surplus and maintain reserves in fiscal 2018. The city's five year financial forecast tempers public safety hiring goals, though does include higher salaries, statutorily required higher public safety pension contributions, and expanded services commensurate with growth. While the next few years point to stable reserves, years three through five in the city's long-range plan indicate a need for additional revenues or expenditure cuts to maintain unassigned reserves at least at the policy level of 40 days of expenditures, which we expect will occur. The city has prudently built in softening growth in its projections, including an expected 2-2.5% annual growth in sales tax over the next five years, compared to 4% growth in 2018, and 6.3% AV growth in fiscal 2020, gradually decreasing to 3.8% in fiscal 2023.

While the sales tax rate cannot be increased, the city does have the legal ability to increase property tax revenues if needed. The majority of operating funds revenues were derived from property taxes in 2017, representing 56.0%, followed by sales taxes at 20.5%. The city remains well below the statutory maximum rate for property taxes of \$25/\$1000 of AV, having levied \$7.83/\$1000 in fiscal 2017. The city has been slowly dropping the tax rate annually since 2017, bringing it to \$7.81 in 2018, and again to \$7.77 in fiscal 2019, amid strong property appreciation. The city is mindful of annually setting the rate below the effective 8% yield control, which could trigger a rollback election if exceeded. Over the past several years, the city has set the rate below the 8% yield, and could raise an additional \$3-\$9.5 million in property taxes on existing property if the rate fully leveraged the effective yield.

LIQUIDITY

As of fiscal 2017, the city's cash and investment position in the combined operating funds was \$215.6 million, an adequate 15% of operating revenues.

Debt and pensions: manageable debt burden; significantly improved pension liability post-reform over long-term

The city's debt burden will continue to be stable and manageable as planned annual issuances are outpaced by strong tax base growth. A \$1.05 billion bond package was approved by voters in November 2017, which will be issued in phases, and will facilitate needed investment in public infrastructure. The city maintains a debt policy which stipulates a maximum debt burden of 4% of the estimated market value of the taxable property in the city. Inclusive of accreted interest on outstanding bonds, the city has typically maintained a debt burden that is consistent with peers at or below 2% of assessed valuation. With strong AV growth over the past few years, the net direct debt burden as of fiscal 2017 decreased to 1.6% of fiscal 2017 AV, and includes \$1.8 billion of GOLT debt. The debt burden is expected to increase to about 1.8% through fiscal 2019 and remain within historical levels over the next several years.

DEBT STRUCTURE

All of the city's debt is fixed rate. The city amortizes debt relatively quickly over twenty years, with 75% retired within ten years.

DEBT-RELATED DERIVATIVES

The city is not a party to any derivative agreements.

PENSIONS AND OPEB

Over one year into pension reform, the city's pension valuation reports reflect an improved pension landscape for the city, though the pension burden remains elevated. Annual contributions are significantly improved compared to reported funding levels though remain weak, and solvency challenges remain, particularly for the Dallas Police and Fire Pension fund (DPFP). Required accumulation of DPFP

assets is highly dependent on investment returns and higher near-term contributions tied to payroll targets. Deviation from these key targets over the medium term could require further benefit changes or higher contributions, placing additional pressure on the general fund budget.

The city's adjusted net pension liability (ANPL), reflective of all three of the city's single employer plans,¹ was reduced by a significant \$900M due to reforms and strong investment returns in the ERF plan, which are fully incorporated into the 2018 actuarial valuation reports. While audited financials are not yet available for the plans, based on the valuation reports, the estimated 2018 ANPL has come down to \$7.2 billion, from \$8.1 billion in fiscal 2017, representing a reduced through still elevated ration of 4.6 times estimated fiscal 2018 operating revenues and 5.5% of the fiscal 2019 AV. The ANPL is net of support to ERF from the city's enterprise funds, namely the Waterworks and Sewer Fund and the airport.

The city's fixed costs are high, especially when considering pension contributions at a "tread water" level, though have been brought back to more manageable levels with reform. Moody's calculates fixed costs as debt service, pension contributions and retiree health benefits (OPEB) relative to operating revenues. For Dallas, fixed costs represented a high 30% of 2017 operating revenues. While DPFP annual contributions have increased, they remain governed by state statute; ERF annual contributions are capped by local ordinance. Based on these requirements, contributions fall short of a level that would "tread water" on the unfunded pension liabilities. ² With reform, favorable earnings in ERF, and increased contributions, the "tread water" indicator has declined significantly; assuming pension contributions at "tread water" fixed costs increase by only 3%, to 33% of estimated 2018 operating revenues.

Estimated 2018 pension metrics are significantly improved for the city, bringing them to levels that are still high but closer to large city peers. However, the funding plan for DPFP, the largest of the city's plans by liability, is not without risk. Deviation from key assumptions would jeopardize the accumulation of pension assets, and thus the amortization of the unfunded liability, and since the plan is governed by state statute, further changes will need to be made at the state level. Favorably, HB 3158 requires key parties to look at further needed changes after an initial 7 year period, or 2024. DPFP's unfunded liability is expected to fully amortize by 2063, based on assumptions such as a 7.25% static earnings rate and payroll that increases by at least 3% per year (Exhibit 3).

Total Liability (right axis, \$bln) Assets (right axis, \$ bln) City Contributions (% of payroll, left axis) 45% \$20 \$18 40% \$16 35% \$14 30% \$12 25% \$10 20% \$8 15% \$6 10% \$4 5% \$2 0% \$0 2017 2063 2001 the transform the transform

DPFP unfunded liability amortizes by 2063 per actuarial assumptions

Source: Moody's Investors Service, DPFP valuation report as of 1-1-2018

Reaching the assumptions underlying the amortization plan will be a challenge, though favorably the city has the legal ability to make further changes if warranted, albeit politically challenging. As reported in the most recent valuation reports for each plan, DPFP assets earned 4.7%, compared to 12.3% in the more traditionally invested ERF³. The DPFP board is still slowly working to divest from highly illiquid assets, many of which caused large write-downs in the last several years. Furthermore, the portfolio's expected 20-year compound return is currently 5%, well below the assumed 7.25%. Based on Moody's calculations, if the plan were to earn 5% static returns, and increase payroll by at least 3% annually, the funded status of the plan would erode significantly over the 45 year period, as assets would only marginally increase given annual benefit payments exceeding inflows, while the liability would continue to grow (Exhibit 4). However, assuming lower 2.75% annual payroll increases, as considered by the actuary, and higher 7% compound returns but with annual volatility, the plan could run out of assets by 2041 (Exhibit 5).

Exhibit 3

Exhibit 4

With 5% static returns DPFP unfunded liability will grow significantly as asset accumulation falls short

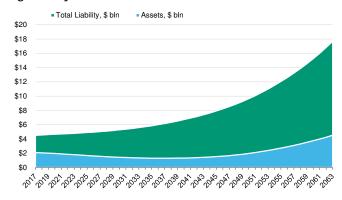
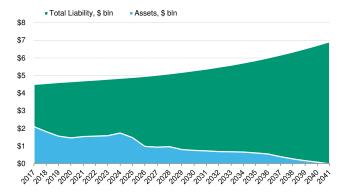


Exhibit 5

With reduced payroll projections and volatile 7% compound returns, assets deplete over the long term



Management and governance: enhanced forward planning; high institutional framework score

The city operates under a council-manager form of government. Dallas' city manager and CFO have worked to implement enhanced forward-thinking and strategic planning to bolster the already sophisticated financial management of the city. The political will exhibited over the course of fiscal 2017 to bring about needed reforms to the public safety pension further demonstrate the strength of the management team in place at the city.

Texas cities have an Institutional Framework score of Aa, which is high. Institutional Framework scores measure a sector's legal ability to increase revenues and decrease expenditures. Property taxes, one of the sector's major revenue sources are subject to a cap, which cannot be overridden. However, the cap of \$25 per \$1,000 of assessed values, with no more than \$15 allocated for debt, 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 greater than 25% of expenditures. Texas is a Right to Work state, providing significant expenditure-cutting ability. Unpredictable expenditure fluctuations tend to be minor, under 5% annually.

Endnotes

- 1 The city participates in three single-employer systems: the Employees's Retirement Fund (ERF), DPFP, and the Supplemental Police and Fire Plan. Contribution rates for the systems are set by ordinance or statutes, and the ERF and DPFP are each managed by separate boards. In 2017, the city, DPFP and the state, were able to come to an agreement around pension reform: HB 3158 implemented sweeping changes to the DPFP plan, including reduced prospective pension benefits for current and future employees, significant reductions to DROP, including time limits to participation, ceased lump-sum withdrawals and elimination of guaranteed interest, increased statutorily required contributions from the city and the membership, and governance changes. ERF also saw changes in 2017, with the approval by voters in November 2016 to create a new tier of reduced pension benefits for new employees hired after January 2, 2017. The new tier reduces the normal cost and the pace at which pension liabilities are accrued.
- <u>2</u> Moody's "tread water" indicator represents the annual contribution that would prevent the liability from growing, under reported assumptions. It is calculated as the employer portion of service cost (also called "normal cost") plus interest on the unfunded liability at the reported discount rate.
- 3 DPFP valuation report as of 1-1-2018 and ERF valuation report as of 12-31-2017

Source: Moody's Investors Service, DPFP valuation report as of 1-1-2018

Asset earnings assume 7% compound returns and 11.7% market volatility Source: Moody's Investors Service, DPFP valuation report as of 1-1-2018

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REPORT NUMBER 1143321

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