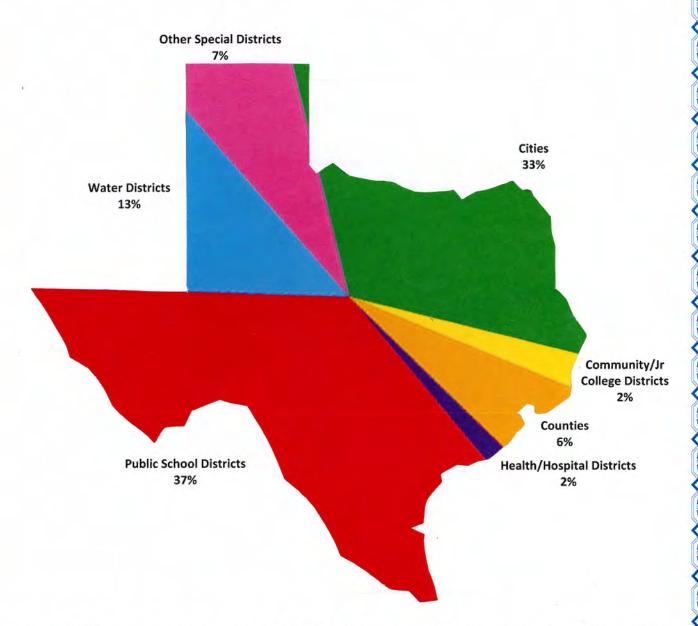
TEXAS BOND REVIEW BOARD

Total Local Government Debt Outstanding



LOCAL GOVERNMENT ANNUAL REPORT FISCAL YEAR ENDED AUGUST 31, 2018

Texas Bond Review Board Local Government Annual Report 2018

Fiscal Year Ended August 31, 2018

Greg Abbott, Governor Chairman

Dan Patrick, Lieutenant Governor

Dennis Bonnen, Speaker of the House of Representatives

Glenn Hegar, Comptroller of Public Accounts

Rob Latsha Executive Director

January 2019

Executive Summary

The Texas Bond Review Board (BRB) has no direct oversight of local government debt issuance. Chapter 1231 of the Texas Government Code requires the BRB to prepare statistical reports on local government debt. This information on debt issued by political subdivisions is primarily prepared by the issuer, collected by the Office of the Attorney General (OAG) as a part of the review and approval procedures as required under Chapter 1202 of the Government Code, and then forwarded to the BRB for its report on local debt statistics. Data that has not been provided to the BRB on intergovernmental loans, privately placed loans, and any other debts that is not in the form of a public security are not reflected in this report. Also, pursuant to Texas Government Code, Chapter 1202.008, conduit debts incurred by nonprofit corporations created by the local governments are not required to provide issuance information to the BRB. As a result, conduit debt is not reflected in this report except for data presented in *Appendix B, Conduit Debt* and certain data presented in *Appendix F, Commercial Paper*. The data in this report and on the website is compiled from information provided to the BRB from various sources and has not been independently verified.

The BRB separates the local government issuances into seven categories: Cities, Towns, and Villages (Cities); Public School Districts (School Districts); Water Districts and Authorities (WD); Counties; Other Special Districts and Authorities (OSD); Community and Junior Colleges (CCD); and Health/Hospital Districts and Authorities (HHD).

Major Findings

- As of fiscal year-end 2018, Texas local governments had \$230.00 billion in total (tax-supported plus revenue) outstanding debt, an increase of \$34.60 billion (17.7 percent) over the past five fiscal years. Of that amount, 65.3 percent (\$150.22 billion) is General Obligation (GO), tax-supported debt secured by local ad valorem tax collections while the remaining 34.7 percent (\$79.77 billion) is secured by revenues generated by various projects such as water, sewer and electric utility fees (Chapter 1).
- Over the past five years, School Districts have consistently accounted for the highest amount of tax-supported debt outstanding, while Cities and WD accounted for the second and third highest amounts, respectively (Chapter 2).
- The most recent U.S. Census Bureau data, for census year 2016, showed that Texas continued to be ranked second in population, second among the ten most populous states in terms of local debt per capita, fourth in total state and local debt per capita and seventh in state debt per capita (Chapter 1).
- Capital appreciation bond (CAB) par issued for Texas local governments during fiscal year 2018 was 0.05 percent (\$17.3 million) of the total CAB and current interest bond (CIB) debt issued (\$32.65 billion). School Districts issuances accounted for 94.2 percent (\$16.3 million) of the total CABs issued for local governments during fiscal year 2018. In fiscal year 2018 CAB maturity amounts accounted for 2.7 percent (\$9.65 billion) of the total debt service outstanding (Chapter 4).
- Since fiscal year 2009, Certificate of Obligation (CO) debt outstanding has increased by 25.4 percent (\$2.88 billion) from \$11.33 billion outstanding in fiscal year 2009 to

- \$14.21 billion outstanding in fiscal year 2018, and Cities accounted for 78.8 percent of the total CO debt outstanding at fiscal year-end 2018 (Chapter 5).
- As of fiscal year 2018, CO debt for Cities accounted for 33.8 percent (\$11.20 billion) of the total Cities tax-supported debt outstanding while County CO debt accounted for 18.3 percent (\$2.11 billion) of total County tax-supported debt outstanding. HHD CO debt outstanding accounted for 35.6 percent (\$895.7 million) of total HHD tax-supported debt outstanding (Chapter 5).
- A total of 181 local governments held 312 bond elections approving a total debt amount of \$24.09 billion during fiscal year 2018. In addition, on November 6, 2018, 86 local governments held 141 bond elections, 127 of which approved debt totaling \$11.27 billion (Appendix A).
- The weighted average for total bond related cost of issuance (COI) including underwriter's spread decreased to \$14.97 per \$1,000 in 2018 from \$16.07 per \$1,000 in 2017 while the average transaction size and average fee increased to \$28.9 million and \$433,048 in 2018 from \$22.1 million and \$355,585 in 2017, respectively. Tax-supported competitive transactions had the highest cost per \$1,000 for transactions less than \$50.0 million (Appendix D).
- Of the \$2.88 billion of charter school debt outstanding as of November 30, 2018, an estimated \$1.70 billion was guaranteed by the Texas Permanent School Fund Bond Guarantee Program (Appendix C).

For limitations on the purpose and use of this report, see the disclosure preceding Chapter 1.

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Cautionary Statements

Section 1202.008 of the Texas Government Code authorizes the Office of the Attorney General to collect local debt information and to send that information to the Bond Review Board (BRB) for inclusion in debt statistic reports. Chapter 1231 of the Texas Government Code requires the BRB to submit biennial reports with such data to the legislature. This report is intended to satisfy this Chapter 1231 duty.

The data in this report and on the BRB's website is compiled from information reported to the BRB from various sources and has not been independently verified. The reported debt and defeasance data may vary from actual debt outstanding, and the variance for a specific issuer or types of or all issuers could be substantial.

Local governments are not required to report data for debt that either is not considered a public security as defined by state statute, e.g., a loan not evidenced by a note or evidenced by a note payable to order, or does not require approval by the Office of the Attorney General of the State of Texas, such as certain short-term notes, certain bond anticipation notes and certain lease purchase agreements for personal property. Consequently, the BRB does not receive information on many privately-placed loans or intergovernmental loans such as State Infrastructure Bank loans for transportation or water development state participation loans that are not evidenced by a public security. In addition, debt issuances for some component corporations of governmental entities such as housing finance corporations, industrial development corporations and other conduit entities are not reported to the BRB. Outstanding debt excludes debt for which sufficient funds have been escrowed to retire the debt either from proceeds of refunding debt or from other sources, if reported to the BRB. Debt totals, percentages, trends and other data are based entirely on debt and defeasances reported to the BRB.

Future debt repayment and debt-service information for variable-rate, commercial paper, and other short-term and demand debt is estimated on the basis of interest rate and refinancing assumptions described in the report. Actual future data could be affected by changes in issuer financing decisions, prevailing interest rates, market conditions, and other factors that cannot be predicted. Consequently, actual future data could differ from the estimates, and the difference could be substantial. The BRB assumes no obligation to update any such estimate of future data.

Historical data and trends presented are not intended to predict future events or continuing trends, and no representation is made that past experience will continue in the future.

This report is intended to meet Chapter 1231 requirements and inform the state leadership and the Legislature. This report is not intended to inform investors in making a decision to buy, hold, or sell any securities, nor may it be relied upon as such. Data is provided as of the date indicated and may not reflect debt, debt-service, population or other data as of any subsequent date. This data may have changed from the date as of which it is provided. For more detailed or more current information, see the issuers' web sites or their filings at Electronic Municipal Market Access (EMMA®). The BRB does not control or make any representation regarding the accuracy, completeness or currency of any such site, and no referenced site is incorporated herein by reference or otherwise.

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Chapter 1 Texas Local Debt in Perspective

Overview

Local governments in Texas issue debt to finance construction and renovation of government facilities (i.e., schools, public safety buildings, city halls and county courthouses), public infrastructure (i.e., roads, water and sewer systems) and various other projects authorized by law. Key factors that affect a government's need and ability to borrow funds for infrastructure development include population changes, revenue sources, tax rates and levies, interest rates and construction costs. Local governments issue two main types of debt – tax (general obligation or GO) and revenue. GO debt is secured by the full faith and credit of the issuer's ad valorem taxing power while revenue debt is secured by a specified revenue source. Tax-supported debt includes debt secured by a combination of ad valorem taxes and other revenue sources, even though the debt may be paid in whole or in part from non-tax revenue. Tax-supported debt generally must be voter approved (with the exception of Certificates of Obligation, tax notes, school district maintenance tax notes, certain time warrants, and certain other obligations).

State law sets limitations on certain local government debt issuers by setting maximum ad valorem tax rates per \$100 of assessed property valuation. These rates vary by government type, but all must generate sufficient funds based on annual ad valorem tax collections to provide for the payment of the debt service on outstanding and projected ad valorem tax (GO) debt. Additionally, all public securities issued by local debt issuers must be approved by the Office of the Attorney General – Public Finance Division (OAG) and registered with the Texas Comptroller of Public Accounts (CPA).

Texas Bond Review Board and Local Government Debt

The Texas Bond Review Board (BRB) has no direct oversight of local government debt issuance. Chapter 1231 of the Texas Government Code requires the BRB to prepare statistical reports on local government debt. This information on debt issued by political subdivisions is primarily prepared by the political subdivision, collected by the OAG as a part of the review and approval procedures as required under Chapter 1202 of the Government Code, and then forwarded to the BRB for its report on local debt statistics. Intergovernmental loans, privately placed loans, and any other debts that are not in the form of a public security are not reflected in this report. Also, conduit debts incurred by nonprofit corporations created by the local governments are not reflected in this report except for data presented in *Appendix B, Conduit Debt* and certain data presented in *Appendix F, Commercial Paper*. The data in this report and on the website is compiled from information provided to the BRB from various sources and has not been independently verified.

All reporting on local debt is presented on the agency's website and the Texas Open Data Portal. Visitors to the BRB website can search databases and access the Data Portal to download spreadsheets that contain debt outstanding, debt issuances, debt ratios and population data as available by government type at each fiscal year-end. In fiscal year 2018, approximately 9,414 different users of the BRB's website downloaded over 29,100 spreadsheets containing Texas local government debt data. The BRB posts this information to its website and the Data Portal annually within four months after the close of the state's fiscal year. Additionally, this data is supplied to the CPA's office as well as the Legislative Budget Board and the Texas Tribune for publication on their debt pages.

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The BRB separates the local government issuances into seven categories: Cities, Towns, Villages (Cities); Public School Districts (School Districts); Water Districts and Authorities (WD); Counties; Other Special Districts and Authorities (OSD); Community and Junior Colleges (CCD); and Health/Hospital Districts and Authorities (HHD).

The data in this report and on the website is compiled from information provided to the BRB from various sources and has not been independently verified.

Local Government Debt Outstanding

As of fiscal year-end 2018, Texas local governments had \$230.00 billion in outstanding debt (*Table 1.1*), an increase of \$34.60 billion (17.7 percent) over the past five fiscal years. Of that amount, 65.3 percent (\$150.22 billion) is GO debt secured by local ad valorem tax collections while the remaining 34.7 percent (\$79.77 billion) is secured by revenues generated by various projects such as water, sewer and electric utility fees. Over the past five fiscal years, tax-supported debt outstanding increased 21.2 percent (\$26.33 billion) and revenue debt outstanding increased 11.6 percent (\$8.28 billion).

School Districts accounted for 36.6 percent (\$84.16 billion) of all local debt outstanding, and Cities accounted for 32.7 percent (\$75.25 billion). WDs held the third highest percentage and accounted for 13.1 percent (\$30.19 billion) of all local debt outstanding. The remaining 17.6 percent (\$40.40 billion) was held by CCDs, Counties, HHDs and OSDs.

Table 1.1 Texas Local Government Debt Outstanding As of August 31, 2018

(amounts in millions)

Type of Issuer		Tax	-Supported*	R	evenue**	7	Total Debt
	Voter-approved tax		82,721.6				82,721.6
D1-1: - C-11	Maintenance tax (ed. equipment)		1,170.8				1,170.8
Public School	Lease-purchase contracts				268.3		268.3
Districts	Revenue (athletic facilities)				1.3		1.3
	Subtotal	\$	83,892.5	\$	269.5	\$	84,162.0
	Tax		33,128.1				33,128.1
Cities Towns	Revenue				41,937.5		41,937.5
Cities, Towns,	Sales Tax				177.5		177.5
Villages	Lease-purchase contracts				3.8		3.8
	Subtotal	\$	33,128.1	\$	42,118.8	\$	75,246.9
	Tax		14,884.3				14,884.3
Water Districts	Revenue				15,301.7		15,301.7
and Authorities	Sales Tax				1.7		1.7
	Subtotal	\$	14,884.3	\$	15,303.4	\$	30,187.7
	Tax		166.2				166.2
Other Special	Revenue				12,462.2		12,462.2
Districts and	Sales Tax				4,668.3		4,668.3
Authorities	Lease-purchase contracts				71.3		71.3
	Subtotal	\$	166.2	\$	17,201.7	\$	17,367.9
	Tax		11,558.6				11,558.6
Counties	Revenue				2,484.4		2,484.4
Counties	Lease-purchase contracts				55.8		55.8
	Subtotal	\$	11,558.6	\$	2,540.1	\$	14,098.8
Community and	Tax		4,076.6				4,076.6
_	Revenue				1,184.4		1,184.4
Junior Colleges	Subtotal	\$	4,076.6	\$	1,184.4	\$	5,260.9
Health/Hospital	Tax		2,517.2				2,517.2
Districts and	Revenue				1,099.5		1,099.5
Authorities	Sales Tax				56.7		56.7
Authornes	Subtotal	\$	2,517.2	\$	1,156.2	\$	3,673.3
	Total Local Debt Outstanding	\$	150,223.4	\$	79,774.1	\$	229,997.5
-					-		-

^{*}Includes debt secured by a combination of ad valorem taxes and other revenue sources.

Source: Texas Bond Review Board - Bond Finance Office

^{**}Excludes conduit debt.

The most recent U.S. Census Bureau data, for census year 2016, showed that Texas continued to be ranked second in population, second among the ten most populous states in terms of Local Debt Per Capita, fourth in Total State and Local Debt Per Capita and seventh in State Debt Per Capita (Table 1.1A).

Table 1.1A												
TOTAL STATE AND LOCAL DEBT OUTSTANDING: TEN MOST POPULOUS STATES												
	1	Γotal State and	d Local Debt			State	Debt			Local	Debt	
	Population	Amount	Per Capita	Per Capita	Amount	% of Total	Per Capita	Per Capita	Amount	% of Total	Per Capita	Per Capita
State	(thousands)	(millions)	Amount	Rank	(millions)	Debt	Amount	Rank	(millions)	Debt	Amount	Rank
New York	19,849	\$356,519	\$17,961	1	\$137,480	38.6%	\$6,926	1	\$219,039	61.4%	\$11,035	1
Illinois	12,802	151,666	11,847	2	65,792	43.4%	5,139	2	85,874	56.6%	6,708	4
California	39,537	433,826	10,973	3	151,308	34.9%	3,827	3	282,518	65.1%	7,146	3
Texas	28,305	279,310	9,868	4	49,357	17.7%	1,744	7	229,953	82.3%	8,124	2
Pennsylvania	12,806	121,869	9,517	5	47,099	38.6%	3,678	4	74,770	61.4%	5,839	5
Ohio	11,659	85,225	7,310	6	33,165	38.9%	2,845	6	52,061	61.1%	4,465	7
Michigan	9,962	72,507	7,278	7	33,745	46.5%	3,387	5	38,762	53.5%	3,891	9
Florida	20,984	139,084	6,628	8	33,469	24.1%	1,595	9	105,615	75.9%	5,033	6
Georgia	10,429	57,938	5,555	9	13,131	22.7%	1,259	10	44,808	77.3%	4,296	8
North Carolina	10,273	47,240	4,598	10	16,919	35.8%	1,647	8	30,321	64.2%	2,951	10
MEAN		\$174,518	\$9,154		\$58,146	34.1%	\$3,205		\$116,372	65.9%	\$5,949	

Note: Detail may not add to total due to rounding.

Source: U.S. Census Bureau, State and Local Government Finances by Level of Government and by State: 2016, the most recent data available. July 2017 U.S. Census Bureau, Population Division.

Over the past 10 years, local government total debt (tax-supported plus revenue) increased \$65.66 billion (40.0 percent). Over this time, the state's population increased by an estimated 16.4 percent (4.0 million), based on July 2017 U.S. Census Bureau population estimates. During that same period, local government total debt outstanding per capita increased by 20.2 percent, or \$1,365 per person, from \$6,761 per capita in fiscal year 2009 to \$8,126 per capita in fiscal year 2018. (Figure 1.1)

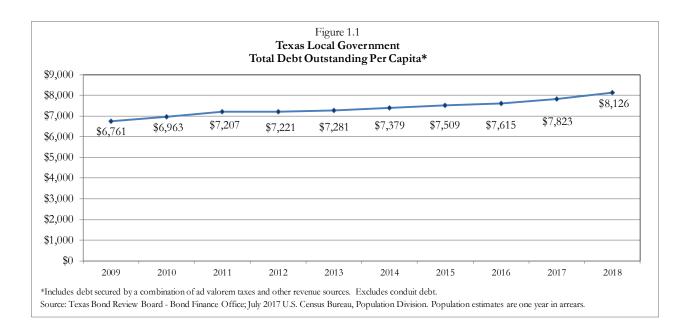


Table 1.2 lists the state's local debt outstanding by category from highest to lowest total amount outstanding.

Table 1.2										
Texas Local Government										
	Debt Outstan	ding by Fisca	l Year							
	(amour	nts in millions)								
	8/31/2014	8/31/2015	8/31/2016	8/31/2017	8/31/2018					
Public School Districts										
Tax-Supported*	\$67,708.1	\$71,961.3	\$74,577.5	\$79,607.5	\$83,892.5					
Revenue**	278.1	340.1	313.3	300.6	269.5					
Total	\$67,986.2	\$72,301.4	\$74,890.8	\$79,908.1	\$84,162.0					
Cities										
Tax-Supported*	\$28,393.9	\$29,532.3	\$30,575.4	\$31,261.5	\$33,128.1					
Revenue**	38,567.7	39,142.1	39,394.0	40,680.3	42,118.8					
Total	\$66,961.6	\$68,674.4	\$69,969.4	\$71,941.8	\$75,246.9					
Water Districts and Authorities										
Tax-Supported*	\$10,745.9	\$11,322.8	\$12,534.1	\$13,677.7	\$14,884.3					
Revenue**	11,812.9	11,727.1	12,805.0	13,374.9	15,303.4					
Total	\$22,558.9	\$23,049.9	\$25,339.1	\$27,052.6	\$30,187.7					
Other Special Districts and Auth	norities									
Tax-Supported*	\$198.4	\$191.8	\$175.0	\$178.9	\$166.2					
Revenue**	16,185.2	16,217.6	16,889.1	17,145.6	17,201.7					
Total	\$16,383.6	\$16,409.4	\$17,064.1	\$17,324.5	\$17,367.9					
Counties										
Tax-Supported*	\$11,112.1	\$11,259.7	\$11,221.3	\$11,699.4	\$11,558.6					
Revenue**	2,474.9	2,471.6	2,303.2	2,146.2	2,540.1					
Total	\$13,587.1	\$13,731.3	\$13,524.5	\$13,845.5	\$14,098.8					
Community College Districts										
Tax-Supported*	\$3,351.1	\$3,612.4	\$3,676.8	\$3,645.4	\$4,076.6					
Revenue**	1,116.6	1,153.8	1,105.9	1,225.1	1,184.4					
Total	\$4,467.7	\$4,766.2	\$4,782.6	\$4,870.5	\$5,260.9					
Health/Hospital Districts and A	Authorities									
Tax-Supported*	\$2,388.4	\$2,382.7	\$2,399.0	\$2,302.5	\$2,517.2					
Revenue**	1,061.2	1,092.7	1,099.1	1,048.4	1,156.2					
Total	\$3,449.6	\$3,475.3	\$3,498.1	\$3,350.9	\$3,673.3					
Total Tax-Supported*	\$123,898.0	\$130,262.9	\$135,159.1	\$142,372.9	\$150,223.4					
Total Revenue**	\$71,496.7	\$72,145.1	\$73,909.4	\$75,921.0	\$79,774.1					
	\$195,394.8	\$202,408.0	\$209,068.5	\$218,293.9	\$229,997.5					

Source: Texas Bond Review Board - Bond Finance Office

Figure 1.2 illustrates the local debt outstanding by category over the past 10 fiscal years.

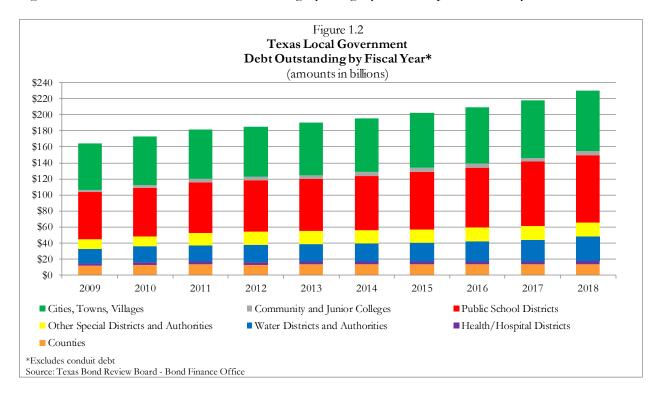
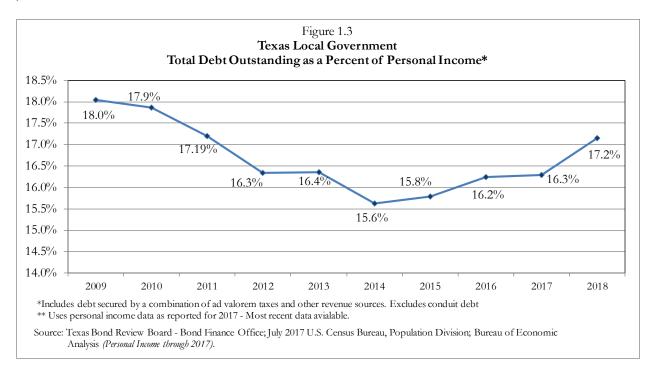


Figure 1.3 illustrates the total local debt outstanding as a percent of personal income over the past 10 years.



Rate of Debt Retirement

Timely repayment of debt is an important factor used by rating agencies to assess a municipal issuer's financial performance. As a guideline, rating agencies look for a repayment schedule that retires 25 percent of principal one quarter through the life of the debt and 50 percent halfway through the life of the debt. Generally, local governments issue debt with varying maturities up to 40 years.

Table 1.3 illustrates the amount of debt retired in the next five, ten and twenty-year periods for both tax-supported and revenue debt outstanding as of fiscal year 2018. Rate of debt retirement for HHD tax-supported debt is low because over half of HHD debt was issued as Build America Bonds (BABs) most of which do not begin principal repayment for 10 years after issuance.

Table 1.3 Texas Local Government* Rate of Debt Retirement (\$ in millions)								
	Tax-Supported		Revenue					
Debt Repaid (Principal Only)	Debt	Percent	Debt	Percent				
Within Five Years								
Public School Districts	17,424.7	20.8%	126.8	47.0%				
Cities, Towns, Villages	11,636.6	35.2%	8,563.7	20.6%				
Water Districts and Authorities	3,507.9	23.6%	3,270.4	21.7%				
Other Special Districts and Authorities	83.8	50.4%	2,216.0	13.1%				
Counties	3,714.1	32.4%	449.2	18.2%				
Community and Junior Colleges	\$1,035.7	25.4%	351.6	29.7%				
Health/Hospital Districts	422.9	16.8%	174.9	15.1%				
Within Ten Years								
Public School Districts	36,815.8	43.9%	214.4	79.5%				
Cities, Towns, Villages	21,228.8	64.3%	17,871.6	43.0%				
Water Districts and Authorities	7,165.6	48.1%	6,741.6	44.8%				
Other Special Districts and Authorities	119.8	72.1%	4,785.8	28.2%				
Counties	7,035.0	61.3%	877.8	35.5%				
Community and Junior Colleges	\$1,993.2	48.9%	\$671.5	56.7%				
Health/Hospital Districts	899.0	35.7%	373.3	32.3%				
Within Twenty Years								
Public School Districts	70,694.1	84.3%	265.7	98.6%				
Cities, Towns, Villages	31,514.0	95.4%	33,915.6	81.6%				
Water Districts and Authorities	13,270.8	89.2%	12,432.9	82.6%				
Other Special Districts and Authorities	160.7	96.7%	10,561.4	62.3%				
Counties	10,790.8	94.0%	1,866.4	75.5%				
Community and Junior Colleges	\$3,545.1	87.0%	\$1,094.1	92.4%				
Health/Hospital Districts	2,009.9	79.8%	840.8	72.7%				
*Excludes commercial paper and conduit debt. Source: Texas Bond Review Board - Bond Finance (Office							

Debt Issuance and Use of Proceeds

Over the past five fiscal years, local government debt issuance increased by 38.6 percent (\$9.10 billion) from \$23.55 billion in fiscal year 2014 to \$32.65 billion in fiscal year 2018. During that period, new-money issuance increased by 60.7 percent from \$12.98 billion to a record high of \$20.85 billion (\$7.88 billion). Refundings increased by 11.6 percent from \$10.57 billion to \$11.80 billion (\$1.22 billion). (*Table 1.4*)

During fiscal year 2018, 36.1 percent of local debt issuance was used to refund debt, 25.5 percent was used to finance educational facilities and equipment, 14.6 percent was used to finance water-related infrastructure, 9.8 percent was used for general purpose debt (such as building or improving city halls and court houses), 4.3 percent was used to finance transportation projects, and 3.1 percent were used to finance pension obligations. Water-related financings are likely understated because some issuers, especially cities, borrow for multiple purposes, over half of which involve financings for water and transportation purposes. The remaining 6.6 percent of local debt issuance was used for multiple purposes including commerce, recreation, health-related facilities, combined utility systems, public safety, prisons and detention centers, and economic development.

Table 1.4											
Texas Local Government											
j	Debt Issuan	ce by Fiscal	Year*								
		n millions)									
	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>	<u>2018</u>						
Issuers	937	1,103	1,152	1,071	921						
Issuances	1,344	1,697	1,709	1,530	1,295						
Public School Districts											
New Money	\$5,387.4	\$7,487.8	\$6,171.6	\$8,447.4	\$7,753.0						
Refunding	3,704.2	10,678.9	8,402.1	5,209.0	2,875.2						
Total Par Issued	\$9,091.5	\$18,166.7	\$14,573.7	\$13,656.4	\$10,628.2						
Cities											
New Money	\$4,411.6	\$4,548.5	\$4,810.1	\$4,889.3	\$6,658.4						
Refunding	5,005.3	5,898.8	6,169.1	3,137.3	3,580.1						
Total Par Issued	\$9,416.9	\$10,447.3	\$10,979.2	\$8,026.5	\$10,238.5						
Water Districts											
New Money	\$1,691.7	\$1,587.2	\$3,192.1	\$2,862.8	\$4,065.1						
Refunding	1,237.1	2,529.7	2,370.2	1,417.7	1,085.0						
Total Par Issued \$2,928.9 \$4,116.9 \$5,562.3 \$4,280.6 \$5,150.1											
Other Special Districts											
New Money	\$338.7	\$224.4	\$1,001.4	\$551.7	\$69.8						
Refunding	79.9	2,068.1	2,997.3	306.9	2,909.4						
Total Par Issued	\$418.7	\$2,292.5	\$3,998.7	\$858.7	\$2,979.2						
Counties											
New Money	\$607.9	\$859.2	\$711.5	\$1,212.8	\$1,123.4						
Refunding	351.6	1,250.5	2,252.6	595.9	1,082.0						
Total Par Issued	\$959.5	\$2,109.7	\$2,964.1	\$1,808.6	\$2,205.4						
Community College Districts	3										
New Money	\$303.8	\$503.4	\$340.7	\$317.9	\$682.7						
Refunding	98.8	338.4	697.5	362.5	211.3						
Total Par Issued	\$402.6	\$841.8	\$1,038.2	\$680.5	\$894.0						
Health/Hospital Districts											
New Money	\$233.9	\$144.6	\$160.9	\$87.5	\$497.8						
Refunding	94.1	32.7	135.3	542.7	52.1						
Total Par Issued	\$328.1	\$177.3	\$296.1	\$630.2	\$549.9						
Total Now Manager	¢10.075.1	\$1F2FF0	¢1/2002	\$10.270 F	\$2 0.050.2						
Total New Money	\$12,975.1	\$15,355.0	\$16,388.2	\$18,369.5	\$20,850.2						
Total Refunding	\$10,571.1	\$22,797.1	\$23,024.2	\$11,572.0	\$11,795.0						
Total Par	\$23,546.2	\$38,152.2	\$39,412.4	\$29,941.5	\$32,645.2						
*Excludes commercial paper and con		0.55									
Source: Texas Bond Review Board - Bond Finance Office											

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Chapter 2

Texas Local Government Tax-Supported Debt

Overview

Tax-supported debt includes debt secured by a combination of ad valorem taxes and other revenue sources, even though the debt may be paid in whole or in part from non-tax revenue. Tax-supported debt generally must be voter approved, with the exception for Certificates of Obligation, tax notes, school district maintenance tax notes, certain time warrants, and certain other obligations.

State law sets limitations on certain local government debt issuers by setting maximum ad valorem tax rates per \$100 of assessed property valuation. These rates vary by government type, but all must generate sufficient funds based on annual ad valorem tax collections to provide for the payment of the debt service on outstanding and projected ad valorem tax (General Obligation or GO) debt. Additionally, all public securities issued by local debt issuers must receive approval from the Office of the Attorney General – Public Finance Division (OAG) and be registered with the Texas Comptroller of Public Accounts.

Local Government Tax-Supported Debt Outstanding

As of fiscal year-end 2018, Texas local governments had \$150.22 billion in outstanding tax-supported debt, an increase of \$7.85 billion (5.5 percent) over the 2017 total of \$142.37 billion, and a 21.2 percent (\$26.33 billion) increase over the past five fiscal years, from \$123.90 billion in 2014. (Table 2.1)

Table 2.1											
Texas Local Government											
Tax-Supported Debt Outstanding by Fiscal Year**											
	(amounts in millions)										
	8/31/2014 8/31/2015 8/31/2016 8/31/2017 8/31/2018										
Public School Districts	\$67,708.1	\$71,961.3	\$74,577.5	\$79,607.5	\$83,892.5						
Cities, Towns, Villages	28,393.9	29,532.3	30,575.4	31,261.5	33,128.1						
Water Districts and Authorities	10,745.9	11,322.8	12,534.1	13,677.7	14,884.3						
Other Special Districts and Authorities	198.4	191.8	175.0	178.9	166.2						
Counties	11,112.1	11,259.7	11,221.3	11,699.4	11,558.6						
Community and Junior Colleges	3,351.1	3,612.4	3,676.8	3,645.4	4,076.6						
Health/Hospital Districts and Authorities	2,388.4	2,382.7	2,399.0	2,302.5	2,517.2						
Total Tax-Supported Debt Outstanding*	\$123,898.0	\$130,262.9	\$135,159.1	\$142,372.9	\$150,223.4						

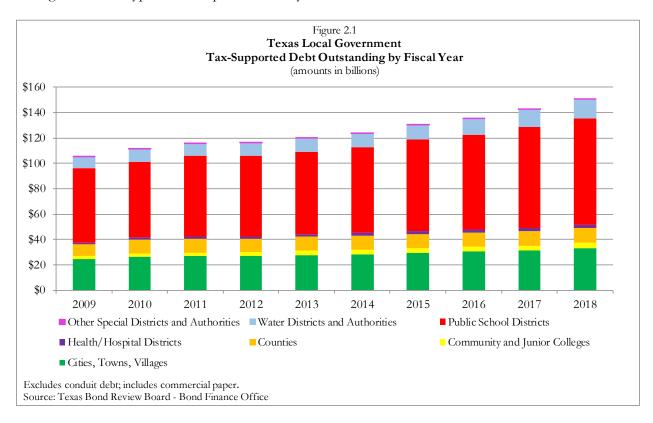
^{*}Includes debt secured by a combination of ad valorem taxes and other revenue sources.

As shown in *Table 2.1* and *Figure 2.1*, Public School Districts have consistently accounted for the highest amount of tax-supported debt outstanding, while Cities and Water Districts accounted for the second and third highest amounts, respectively. Of the total City tax-supported debt outstanding, the "Big 6 Cities" (Houston, Dallas, San Antonio, Austin, El Paso, and Fort Worth) accounted for an average of 32.7 percent over the last five years and 33.8 percent over the last ten years.

^{**}Includes commercial paper; excludes conduit debt.

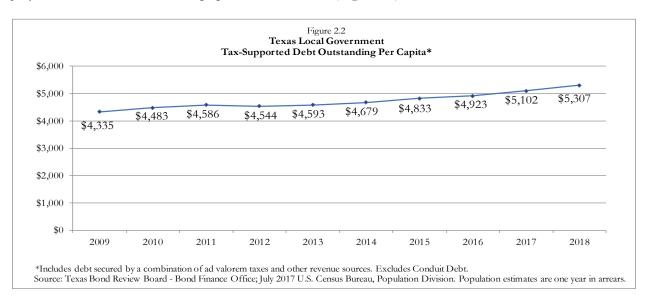
Source: Texas Bond Review Board - Bond Finance Office

Over the past ten fiscal years, tax-supported debt outstanding has increased \$44.84 billion (42.6 percent) from \$105.38 billion in 2009. *Figure 2.1* illustrates local tax-supported debt outstanding by local government type over the past 10 fiscal years.



Tax-Supported Debt per Capita

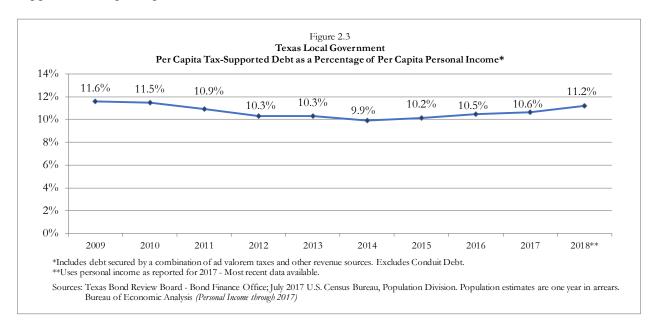
Local government tax-supported debt per capita increased over the past 10 years by 22.4 percent, or \$972 per person, from \$4,335 per capita in fiscal year 2009 to \$5,307 per capita in fiscal year 2018. Over this time, the state's population increased by an estimated 16.4 percent (4.0 million), based on July 2017 U.S. Census Bureau population estimates. (Figure 2.2)



Tax-Supported Debt as a Percentage of Personal Income

As reported by the U.S. Bureau of Economic Analysis, Texas total personal income has grown 47.1 percent in the past 10 years, from \$911.23 billion in 2009 to \$1.34 trillion in 2017 (the most recent data available). During the past five years, the growth was 7.2 percent, from \$1.25 trillion in 2014. Per capita personal income has shown a 26.3 percent 10-year growth from \$37,485 in 2009 and a 0.3 percent 5-year growth from \$47,239 in 2014 to \$47,362 in 2017.

Per capita tax-supported debt, as a percentage of per capita personal income, has decreased 3.1 percent during the past 10 years from 11.6 percent in 2009. It has risen 13.1 percent during the past five years from 9.9 percent in 2014 to 11.2 percent in 2017 (Figure 2.3). Over the 10-year period, the growth of the state's personal income per capita has increased slightly more than the growth of tax-supported debt per capita.



Tax-Supported Debt Issuance

New tax-supported debt issued during fiscal year 2018 totaled \$21.14 billion (\$15.19 billion in new money and \$5.95 billion in refunding debt). This was a decrease of 5.6 percent from the total of \$22.40 billion issued in fiscal year 2017, but an increase of 32.3 percent from the total of \$15.97 issued in fiscal year 2014.

During this five-year period, Public School Districts (School Districts or ISDs) have consistently issued the most tax-supported debt, with over 50 percent of the total tax-supported debt issued each fiscal year. In fiscal year 2014, ISDs completed 362 GO issues for a total of \$9.06 billion (56.8 percent of the 2014 total), of which \$5.36 billion was new money debt and \$3.70 billion was refunding debt. In 2018, ISDs completed 308 issues for a total of \$10.63 billion (50.3 percent of the 2018 total), of which \$7.75 billion was new money debt and \$2.88 billion was refunding debt.

Tax-supported new money debt issuance over the past five years has risen steadily, from \$9.71 billion in 2014 to \$15.19 billion in 2018 (an increase of 56.5 percent).

Tax-supported refunding debt issuance over the past five years peaked in 2015 and 2016 at \$16.09 billion and \$14.87 billion, respectively, while showing an overall decline of 5.0 percent from \$6.26 billion in 2014 to \$5.95 billion in 2018.

Tax-supported debt issued over the past five fiscal years is shown below, excluding commercial paper and conduit debt (Table 2.2).

Issuers	Table 2.2										
Section	Texas Local Government										
Session	Tax-S	Supported Debt	Issuance by I	Fiscal Year*							
Saucrs Sa											
Public School Districts		<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>	<u>2018</u>					
New Money	Issuers	872	1,030	1,068	996	825					
New Money \$5,358.8 \$7,406.1 \$6,171.6 \$8,420.6 \$7,758.6 \$7,758.6 \$3,704.2 \$10,678.9 \$8,402.1 \$5,187.5 \$2,878.7 \$104 Par Issued \$9,063.0 \$18,085.1 \$14,573.7 \$13,608.1 \$10,622.5 \$10.6 \$	Issuances	1,174	1,497	1,483	1,340	1,066					
Refunding 3,704.2 10,678.9 8,402.1 5,187.5 2,87 Total Par Issued \$9,063.0 \$18,085.1 \$14,573.7 \$13,608.1 \$10,622 Cities Section of Sectio	Public School Districts										
Total Par Issued \$9,063.0 \$18,085.1 \$14,573.7 \$13,608.1 \$10,62 Cities New Money \$2,517.0 \$2,878.7 \$3,034.2 \$2,746.2 \$4,10 Refunding 1,431.8 2,492.8 3,012.7 1,057.0 1,47 Total Par Issued \$3,948.8 \$5,371.5 \$6,046.9 \$3,803.3 \$5,579 Water Districts New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,69 Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,598.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,222 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 \$23.6 \$1 Total Par Issued \$363.3 \$11.0 \$17.1 \$34.8 \$1 Counties \$2 \$4.2 \$7.2 \$1,212.8 \$68 Refunding 351.6 1	New Money	\$5,358.8	\$7,406.1	\$6,171.6	\$8,420.6	\$7,753.0					
Cities New Money \$2,517.0 \$2,878.7 \$3,034.2 \$2,746.2 \$4,10 Refunding 1,431.8 2,492.8 3,012.7 1,057.0 1,47 Total Par Issued \$3,948.8 \$5,371.5 \$6,046.9 \$3,803.3 \$5,577 Water Districts New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,69 Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,22 Other Special Districts See Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 1.0 1.0 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1 Counties \$8603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$24.2 \$65.2	Refunding	3,704.2	10,678.9	8,402.1	5,187.5	2,875.2					
New Money \$2,517.0 \$2,878.7 \$3,034.2 \$2,746.2 \$4,10 Refunding 1,431.8 2,492.8 3,012.7 1,057.0 1,47 Total Par Issued \$3,948.8 \$5,371.5 \$6,046.9 \$3,803.3 \$5,579.5 Water Districts New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,69 Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,220 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0 1.0 1.1 1.0	Total Par Issued	\$9,063.0	\$18,085.1	\$14,573.7	\$13,608.1	\$10,628.2					
Refunding 1,431.8 2,492.8 3,012.7 1,057.0 1,47 Total Par Issued \$3,948.8 \$5,371.5 \$6,046.9 \$3,803.3 \$5,575 Water Districts New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,69 Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,22 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 1.0 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1 Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money <											
Total Par Issued \$3,948.8 \$5,371.5 \$6,046.9 \$3,803.3 \$5,57 Water Districts New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,69 Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,22 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 1 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1 Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7	New Money	\$2,517.0	\$2,878.7	\$3,034.2	\$2,746.2	\$4,105.0					
Water Districts New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,692.0 \$1,692.0 \$1,692.0 \$1,692.0 \$1,692.0 \$1,692.0 \$2,222.0 \$2,222.0 \$2,453.3 \$3,047.7 \$2,352.4 \$2,222.0 \$2,222.0 \$2,453.3 \$3,047.7 \$2,352.4 \$2,222.0 \$2,00 \$1.1 \$23.6 \$1 \$1 \$2.0 \$1.1 \$23.6 \$1 \$24.0 \$24.1 <td>Refunding</td> <td>1,431.8</td> <td>2,492.8</td> <td>3,012.7</td> <td>1,057.0</td> <td>1,474.0</td>	Refunding	1,431.8	2,492.8	3,012.7	1,057.0	1,474.0					
New Money \$810.3 \$1,051.9 \$1,632.4 \$1,721.9 \$1,692 Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,220 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 11.1 11.1 1.0 11.1 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 11.1 1.0 1.0 11.1 1.0 1.0 11.1 1.0 1.0 11.1 1.0 1.0 11.1 1.0 1.0 1.0 11.1 1.0 1.0 1.0	Total Par Issued	\$3,948.8	\$5,371.5	\$6,046.9	\$3,803.3	\$5,579.0					
Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,220 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 11.1 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1 Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts \$21.7 \$54.6 \$81.3 <td colspan="11"></td>											
Refunding 697.8 1,401.4 1,415.3 630.4 52 Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,220 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 11.1 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1 Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts \$21.7 \$54.6 \$81.3 <td>New Money</td> <td>\$810.3</td> <td>\$1,051.9</td> <td>\$1,632.4</td> <td>\$1,721.9</td> <td>\$1,698.4</td>	New Money	\$810.3	\$1,051.9	\$1,632.4	\$1,721.9	\$1,698.4					
Total Par Issued \$1,508.1 \$2,453.3 \$3,047.7 \$2,352.4 \$2,220 Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 11.1 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1 Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7	•	697.8	1,401.4	1,415.3	630.4	521.6					
Other Special Districts New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 11.1 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1. Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81' Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued	Total Par Issued	\$1,508.1			\$2,352.4	\$2,220.0					
New Money \$24.4 \$9.0 \$1.1 \$23.6 \$1 Refunding 11.9 2.0 16.0 11.1 11.1 Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1. Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81' Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7<	Other Special Districts					·					
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Total Par Issued \$36.3 \$11.0 \$17.1 \$34.8 \$1.0 Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33.0 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 <td>Refunding</td> <td>11.9</td> <td>2.0</td> <td>16.0</td> <td>11.1</td> <td>0.0</td>	Refunding	11.9	2.0	16.0	11.1	0.0					
Counties New Money \$603.1 \$764.8 \$711.5 \$1,212.8 \$68 Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13		\$36.3	\$11.0	\$17.1	\$34.8	\$13.9					
Refunding 351.6 1,250.5 1,482.0 595.9 86 Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65. Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81' Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33-1 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 *Excludes commercial paper and conduit debt	Counties										
Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	New Money	\$603.1	\$764.8	\$711.5	\$1,212.8	\$680.3					
Total Par Issued \$954.7 \$2,015.2 \$2,193.5 \$1,808.6 \$1,54 Community College Districts \$181.5 \$437.7 \$281.1 \$162.2 \$65 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	Refunding	351.6	1,250.5	1,482.0	595.9	861.4					
Community College Districts New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65. Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81.7 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33.4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,132 *Excludes commercial paper and conduit debt	9	\$954.7			\$1,808.6	\$1,541.7					
New Money \$181.5 \$437.7 \$281.1 \$162.2 \$65.7 Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81.7 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33.4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	Community College Districts					·					
Refunding 58.7 227.5 515.8 258.7 16 Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81' Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33-4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	· ·	\$181.5	\$437.7	\$281.1	\$162.2	\$652.4					
Total Par Issued \$240.2 \$665.2 \$796.9 \$421.0 \$81 Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	Refunding	58.7	227.5	515.8	258.7	165.3					
Health/Hospital Districts New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33-4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	e de la companya de	\$240.2	\$665.2	\$796.9	\$421.0	\$817.7					
New Money \$211.7 \$54.6 \$81.3 \$0.0 \$28 Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33.4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,132 *Excludes commercial paper and conduit debt	Health/Hospital Districts										
Refunding 6.5 32.7 22.4 371.1 4 Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33.4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt		\$211.7	\$54.6	\$81.3	\$0.0	\$285.1					
Total Par Issued \$218.2 \$87.3 \$103.7 \$371.1 \$33.4 Total New Money \$9,706.9 \$12,602.8 \$11,913.2 \$14,287.4 \$15,18 Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13 *Excludes commercial paper and conduit debt	•	6.5				49.4					
Total Refunding \$6,262.4 \$16,085.8 \$14,866.3 \$8,111.8 \$5,94 Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,138 *Excludes commercial paper and conduit debt	2	\$218.2	\$87.3	\$103.7	\$371.1	\$334.5					
Total Par \$15,969.3 \$28,688.6 \$26,779.5 \$22,399.2 \$21,13.2 *Excludes commercial paper and conduit debt	Total New Money	\$9,706.9	\$12,602.8	\$11,913.2	\$14,287.4	\$15,188.0					
*Excludes commercial paper and conduit debt	Total Refunding	\$6,262.4	\$16,085.8	\$14,866.3	\$8,111.8	\$5,947.0					
1 1	Total Par	\$15,969.3	\$28,688.6	\$26,779.5	\$22,399.2	\$21,135.0					
Source: Texas Bond Review Board - Bond Finance Office	*Excludes commercial paper and conduit debt										
DOUGLE. Texas Dougla Review Dougla - Dougla Highlice Office											

The amounts of Gross Cash Savings and Net Present Value Savings earned from tax-supported refunding issuance over the past five years have fluctuated from \$578.4 million and \$585.6 million, respectively, in 2014 to \$810.3 million and \$588.2 million, respectively, in 2018.

During that period, Texas local governments issued \$51.27 billion in tax-supported refunding debt to realize \$8.35 billion in Gross Cash Savings and \$6.26 billion in Net Present Value Savings.

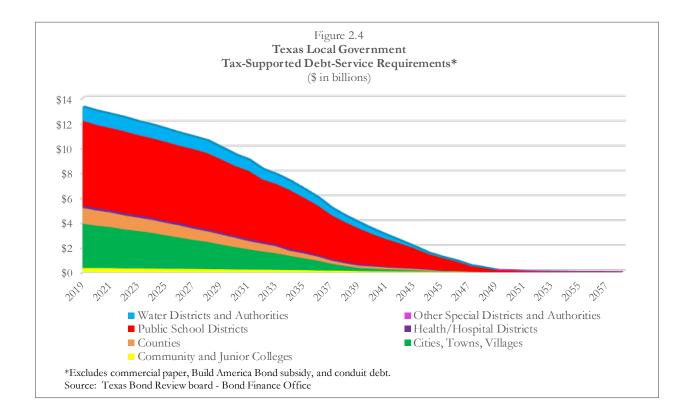
Rate of Debt Retirement

Timely repayment of debt is an important factor used by rating agencies to assess a municipal issuer's financial performance. As a guideline, rating agencies look for a repayment schedule that retires 25 percent of principal a quarter through the life of the debt and 50 percent halfway through the life of the debt. For debt outstanding as of fiscal year end 2018, Texas local governments will repay 25.2 percent (\$37.83 billion) of tax-supported debt within five years, 50.2 percent (\$75.26 billion) within 10 years, and 88.0 percent (\$131.99 billion) within 20 years (*Table 2.3*). As of August 31, 2018, the final maturity for tax-supported debt was 41 years.

Table 2.3									
Texas Local Government*									
Rate of Tax-Supported Debt Retirement									
(\$ in millions)									
		Percent		Percent	Twenty	Percent			
DEBT REPAID WITHIN:	Five Years	of Total	Ten Years	of Total	Years	of Total			
Public School Districts	17,424.7	20.8%	36,815.8	43.9%	70,694.1	84.3%			
Cities, Towns, Villages	11,636.6	35.2%	21,228.8	64.3%	31,514.0	95.4%			
Water Districts and Authorities	3,507.9	23.6%	7,165.6	48.1%	13,270.8	89.2%			
Other Special Districts and Authorities	83.8	50.4%	119.8	72.1%	160.7	96.7%			
Counties	3,714.1	32.4%	7,035.0	61.3%	10,790.8	94.0%			
Community and Junior Colleges	\$1,035.7	25.4%	\$1,993.2	48.9%	\$3,545.1	87.0%			
Health/Hospital Districts	422.9	16.8%	899.0	35.7%	2,009.9	79.8%			
TOTALS	\$37,825.5	25.2%	\$75,257.1	50.2%	\$131,985.4	88.0%			
*Excludes commercial paper and conduit debt.									
Source: Texas Bond Review Board - Bond Finance Office									

Tax-Supported Debt Service Outstanding

As of August 31, 2018, tax-supported debt-service requirements (principal and interest) projected over the life of the debt totaled \$225.79 billion. *Figure 2.4* illustrates annual tax-supported debt-service requirements for each of the local government types.



Chapter 3

Texas Local Government Revenue Debt

Overview

Revenue debt includes debt legally secured by a specified revenue source(s). Most revenue debt does not require voter approval and usually has a maturity based on the life of the project to be financed.

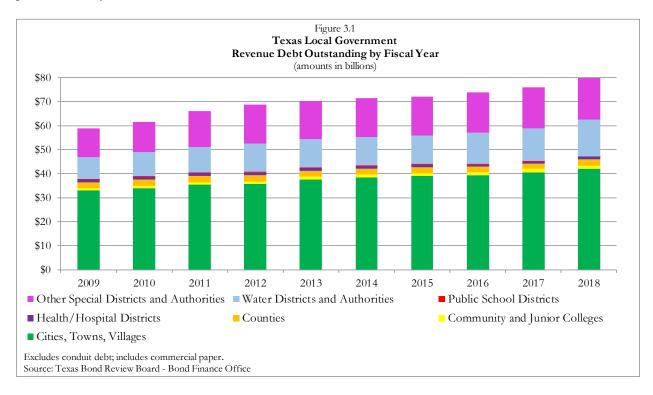
Excluding conduit debt, Texas local governments had \$79.77 billion in revenue debt outstanding as of fiscal year end 2018, an increase of \$3.85 billion (5.1 percent) over the 2017 total of \$75.92 billion, and an 11.6 percent (\$8.28 billion) increase over the past five fiscal years, from \$71.50 billion in 2014 (Table 3.1).

Cities accounted for 52.8 percent (\$42.12 billion) of the total revenue local debt outstanding, water districts and authorities (WDs) accounted for 19.2 percent (\$15.30 billion), other special districts (OSDs) accounted for 21.6 percent (\$17.20 billion) and the remaining 6.5 percent (\$5.15 billion) was attributable to school districts, community college districts (CCDs), counties and health and hospital districts (HHDs).

City revenue debt increased by 9.2 percent from \$38.57 billion to \$42.12 billion in the five-year period. Since fiscal year 2014, the state's population increased by an estimated 6.9 percent (1.8 million). Urban areas have experienced particularly rapid growth creating the need for new infrastructure including roads, bridges and new and expanded water and sewer systems. The majority of city revenue debt has been used to finance utility-related projects including water, wastewater, and in some localities, electric utility systems. Of the total city revenue debt outstanding, the Big 6 Cities (Houston, Dallas, San Antonio, Austin, El Paso, and Fort Worth) accounted for an average of 83.2 percent over the last five years and 83.1 percent over the last 10 years.

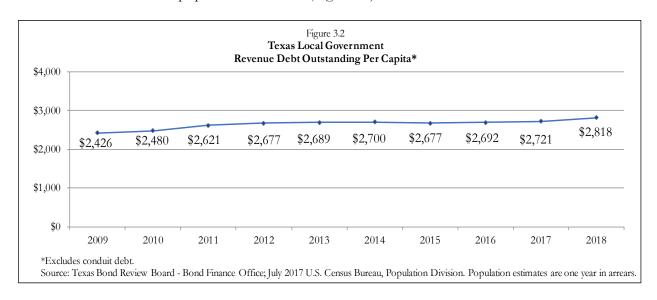
Table 3.1									
Texas Local Government									
Revenue Debt Outstanding by Fiscal Year*									
	(amounts in n	nillions)							
	8/31/2014	8/31/2015	8/31/2016	8/31/2017	8/31/2018				
Public School Districts	\$278.1	\$340.1	\$313.3	\$300.6	\$269.5				
Cities, Towns, Villages	38,567.7	39,142.1	39,394.0	40,680.3	42,118.8				
Water Districts and Authorities	11,812.9	11,727.1	12,805.0	13,374.9	15,303.4				
Other Special Districts and Authorities	16,185.2	16,217.6	16,889.1	17,145.6	17,201.7				
Counties	2,474.9	2,471.6	2,303.2	2,146.2	2,540.1				
Community College Districts	1,116.6	1,153.8	1,105.9	1,225.1	1,184.4				
Health/Hospital Districts and Authorities	1,061.2	1,092.7	1,099.1	1,048.4	1,156.2				
Total Revenue Debt Outstanding*	\$71,496.7	\$72,145.1	\$73,909.4	\$75,921.0	\$79,774.1				
*Includes commercial paper; excludes conduit debt.									
Source: Texas Bond Review Board - Bond Finance Office									

Over the past 10 fiscal years, revenue debt outstanding has increased \$20.81 billion (35.3 percent) from \$58.96 billion in 2009. Figure 3.1 illustrates local revenue debt outstanding by category over the past 10 fiscal years.



Revenue Debt per Capita

Local government revenue debt per capita increased over the past 10 years by 16.2 percent, or \$393 per person, from \$2,426 per capita in fiscal year 2009 to \$2,818 per capita in fiscal year 2018. Over this time, the state's population increased by an estimated 16.4 percent (4.0 million), based on July 2017 U.S. Census Bureau population estimates (Figure 3.2).



Revenue Debt Issuance

Excluding conduit debt, new revenue debt issued during fiscal year 2018 totaled \$11.51 billion (\$5.66 billion in new money and \$5.85 billion in refunding debt). This was an increase of 52.6 percent from the total of \$7.54 billion issued in fiscal year 2017 and an increase of 51.9 percent from the total of \$7.58 billion issued in fiscal year 2014.

During this five-year period, cities have consistently issued the most revenue debt. In fiscal year 2014, cities completed 89 issues for a total of \$5.47 billion (72.2 percent of the 2014 total), of which \$1.89 billion was new money debt and \$3.57 billion was refunding debt. In 2018, cities completed 110 issues for a total of \$4.66 billion (40.5 percent of the 2018 total), of which \$2.55 billion was new money debt and \$2.11 billion was refunding debt.

Revenue debt issued over the past five fiscal years is shown in *Table 3.2* below, excluding commercial paper and conduit debt.

	Ta	able 3.2							
	Texas Loc	al Governmen	nt						
Revenue Debt Issuance by Fiscal Year*									
(\$ in millions)									
	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>	<u>2018</u>				
Issuers	101	119	135	112	138				
Issuances	170	200	226	190	229				
Public School Districts									
New Money	\$28.6	\$81.7	\$0.0	\$26.8	\$0.0				
Refunding	0.0	0.0	0.0	21.6	0.0				
Total Par Issued	\$28.6	\$81.7	\$0.0	\$48.3	\$0.0				
Cities									
New Money	\$1,894.6	\$1,669.8	\$1,775.9	\$2,143.1	\$2,553.4				
Refunding	3,573.5	3,406.0	3,156.4	2,080.2	2,106.1				
Total Par Issued	\$5,468.2	\$5,075.8	\$4,932.3	\$4,223.3	\$4,659.5				
Water Districts									
New Money	\$881.4	\$535.3	\$1,559.7	\$1,140.9	\$2,366.7				
Refunding	539.4	1,128.3	954.9	787.3	563.4				
Total Par Issued	\$1,420.8	\$1,663.6	\$2,514.6	\$1,928.2	\$2,930.1				
Other Special Districts									
New Money	\$314.3	\$215.4	\$1,000.3	\$528.1	\$55.9				
Refunding	68.1	2,066.1	2,981.3	295.8	2,909.4				
Total Par Issued	\$382.4	\$2,281.5	\$3,981.6	\$823.9	\$2,965.3				
Counties									
New Money	\$4.8	\$94.4	\$0.0	\$0.0	\$443.1				
Refunding	0.0	0.0	770.6	0.0	220.6				
Total Par Issued	\$4.8	\$94.4	\$770.6	\$0.0	\$663.7				
Community College Districts									
New Money	\$122.2	\$65.7	\$59.6	\$155.7	\$30.3				
Refunding	40.1	110.9	181.7	103.8	45.9				
Total Par Issued	\$162.3	\$176.6	\$241.3	\$259.5	\$76.3				
Health/Hospital Districts									
New Money	\$22.2	\$90.0	\$79.5	\$87.5	\$212.8				
Refunding	87.6	0.0	112.9	171.5	2.6				
Total Par Issued	\$109.9	\$90.0	\$192.4	\$259.1	\$215.4				
Total New Money	\$3,268.2	\$2,752.2	\$4,475.0	\$4,082.1	\$5,662.1				
Total Refunding	\$4,308.7	\$6,711.3	\$8,157.9	\$3,460.2	\$5,848.1				
Total Par	\$7,576.9	\$9,463.5	\$12,632.9	\$7,542.3	\$11,510.2				

Revenue new money debt issuance over the past five years has risen steadily, from \$3.27 billion in 2014 to \$5.66 billion in 2018. This is an increase of 73.2 percent.

Revenue refunding debt issuance over the past five years peaked in 2015 and 2016 at \$6.71 billion and \$8.16 billion, respectively, while showing an overall increase of 35.7 percent from \$4.31 billion in 2014 to \$5.85 billion in 2018.

The amounts of Gross Cash Savings and Net Present Value Savings earned from revenue refunding issuance over the past five years have fluctuated from \$218.1 million and \$405.5 million, respectively, in 2014 to \$910.4 million and \$548.1 million, respectively, in 2018.

During that period, Texas local governments issued \$28.49 billion in revenue refunding debt to realize \$3.76 billion in Gross Cash Savings and \$2.77 billion in Net Present Value Savings.

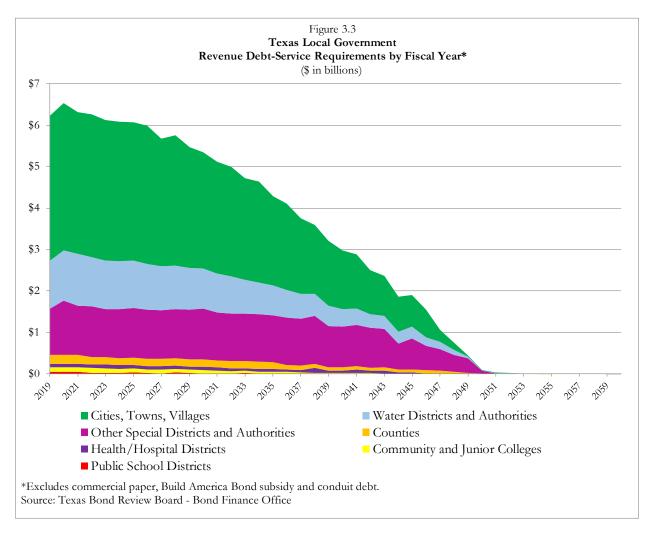
Rate of Revenue Debt Retirement

Timely repayment of debt is an important factor used by rating agencies to assess a municipal issuer's financial performance. As a guideline, rating agencies look for a repayment schedule that retires 25 percent of principal a quarter through the life of the debt and 50 percent halfway through the life of the debt. For debt outstanding as of fiscal year-end 2018, Texas local governments will repay 19.3 percent (\$15.15 billion) of revenue debt within five years, 40.1 percent (\$31.54 billion) within 10 years, and 77.5 percent (\$60.98 billion) within 20 years (*Table 3.3*). As of August 31, 2018, the final maturity for revenue debt was 40 years.

Table 3.3									
Texas Local Government*									
Rate of Revenue Debt Retirement									
	(\$ in millions)								
		Percent		Percent		Percent			
DEBT REPAID WITHIN:	Five Years	of Total	Ten Years	of Total	Twenty Years	of Total			
Public School Districts	126.8	47.0%	214.4	79.5%	265.7	98.6%			
Cities, Towns, Villages	8,563.7	20.6%	17,871.6	43.0%	33,915.6	81.6%			
Water Districts and Authorities	3,270.4	21.7%	6,741.6	44.8%	12,432.9	82.6%			
Other Special Districts and Authorities	2,216.0	13.1%	4,785.8	28.2%	10,561.4	62.3%			
Counties	449.2	18.2%	877.8	35.5%	1,866.4	75.5%			
Community and Junior Colleges	\$351.6	29.7%	\$671.5	56.7%	\$1,094.1	92.4%			
Health/Hospital Districts	174.9	15.1%	373.3	32.3%	840.8	72.7%			
TOTALS	\$15,152.6	19.3%	\$31,536.0	40.1%	\$60,976.8	77.5%			
*Excludes commercial paper and conduit de	*Excludes commercial paper and conduit debt.								
* *	Source: Texas Bond Review Board - Bond Finance Office								

Revenue Debt Service Outstanding

As of August 31, 2018, scheduled revenue debt-service requirements (principal and interest) projected over the life of the debt totaled \$128.77 billion. *Figure 3.3* illustrates the scheduled annual revenue debt-service requirements for each of the local government types.



Chapter 4

Capital Appreciation Bonds

Overview

Capital appreciation bonds (CABs) are sold at a discounted price called the par amount. They are often sold in combination with current interest bonds (CIBs). While the debt service for CIBs is paid throughout the life of the obligation, principal and interest on CABs is paid at maturity. Interest on CABs compounds semiannually and accumulates over the life of the bond, and the amount paid at the maturity is called the maturity value. Interest rates for CABs are generally higher than for CIBs, and CABs can be more expensive than CIBs because of the compounding interest. However, CABs can be an effective financing tool if they are used moderately and with reasonable terms.

Premium CABs (PCABs) provide a lower initial stated par amount and are sold with a premium. PCABs are issued to: (1) raise additional proceeds, (2) preserve debt limits, and (3) help local governments reach tax rate targets. Local governments issue more PCABs than non-premium CABs.

Over the past decade, total CAB maturity amounts outstanding have decreased by 41.4 percent from \$16.46 billion in fiscal year 2009 to \$9.65 billion in fiscal year 2018. Additionally, CAB maturity amounts outstanding have decreased 11.4 percent from \$10.89 billion outstanding in fiscal year 2017. The outstanding CAB maturities range from 2019 to 2053.

Heavy use of CABs can result in rating agency downgrades.

CABs are often used to refund existing CAB and CIB debt.

CABs Issued

Table 4.1 shows that the total CAB par issued for Texas local governments during fiscal year 2018 was 0.05 percent of the total CAB and CIB debt issued. School districts issuances accounted for 94.2 percent of the total CABs issued for local governments during fiscal year 2018. Of the total par issued by school districts, 0.15 percent was issued as CAB par. CABs have been used by school districts to enable them to remain under the 50-cent debt ceiling that limits the property taxes assessed for debt service costs to 50 cents per \$100 of assessed value. CAB issuances by school districts are general obligation (tax) debt repaid with ad valorem taxes.

For CAB debt issued in fiscal year 2018, Texas local governments will owe \$2.56 in interest and principal for every \$1 of principal borrowed.

The 84th Legislature passed House Bill 114, effective September 1, 2015, that prohibits Texas local governments from issuing CABs secured by property taxes with terms of more than 20 years and (with some exceptions) from refunding CABs to extend their maturity dates. It also limits each government's CAB debt to no more than 25 percent of its total outstanding bond debt including principal and interest. The 85th Legislature passed Senate Bill 295, which extends the allowed maturity date for CABs issued for refunding purposes and financing transportation projects.

Table 4.1 Texas Local Government Capital Appreciation Bonds Issued in Fiscal Year 2018											
Entity Type	Total Par Issued (CIB and CAB)	CAB Par	CAB Par/ Total Par	% of Total CAB Par Issued	CAB Premium	CAB Maturity Amount	% of Total CAB Maturity Amount				
Public School Districts	\$10,628,192,704.55	16,311,704.55	0.15%	94.16%	11,622,109.30	41,003,241.27	92.46%				
Cities, Towns & Villages	\$10,238,471,925.00	442,175.00	0.00%	2.55%	1,604,136.60	2,400,000.00	5.41%				
Water Districts	\$5,150,091,750.00	570,000.00	0.01%	3.29%	316,749.95	945,000.00	2.13%				
Other Special Districts	\$2,979,210,000.00	-	0.00%	0.00%	-	-	0.00%				
Counties	\$2,205,378,099.00	-	0.00%	0.00%	-	-	0.00%				
Comm Colleges / Junior Colleges	\$893,960,000.00	-	0.00%	0.00%	-	-	0.00%				
Health & Hospitals	\$549,872,862.00	-	0.00%	0.00%	-	-	0.00%				
Total	\$ 32,645,177,341	\$ 17,323,880	0.05%	100.00%	\$ 13,542,996	\$ 44,348,241	100.0%				
*	Excludes Commercial Paper & Conduit Debt Source: Texas Bond Review Board - Bond Finance Office										

Table 4.2 shows CAB issued amounts for the last five fiscal years.

Table 4.2											
Texas Local Government											
Capital Appreciation Bonds Par Amount Issued by Fiscal Year											
(\$ in millions)											
	2014 2015 2016 2017* 2018										
Public School Districts	\$471.9	\$214.1	\$70.5	\$38.1	\$16.3						
Cities, Towns, Villages	-	-	0.7	1.2	0.4						
Water Districts and Authorities	1.0	1.8	2.5	11.6	0.6						
Other Special Districts and Authorities	-	-	-	-	-						
Counties	1.4	-	-	-	-						
Community and Junior Colleges	1.0	-	-	0.0	-						
Health/Hospital Districts	1.3	-		-	-						
Total CAB Par Amount Issued	\$476.7	\$215.9	\$73.8	\$51.0	\$17.3						
Total Par Amount Issued**	\$23,546.2	\$38,152.2	\$39,412.4	\$29,941.5	\$32,645.2						
CAB Par Amount % of Total	2.02%	0.57%	0.19%	0.17%	0.05%						
* CCDs issued \$35,000 of CABs in 2017											
** Includes current interest bonds, excludes commercial paper authorizations and conduit issuances.											
Source: Bond Review Board - Bond Finance Office											

Source: Bond Review Board - Bond Finance Office

Three ratios have been developed to compare CAB issuances. The first is the "Maturity Value/Par" ratio which is calculated by dividing the CAB maturity amount by the CAB par amount and represents the total amount to be repaid (principal plus interest) compared to the par amount borrowed. This ratio disregards premiums received on PCABs.

The second is the "Maturity Value/Proceeds" ratio which is calculated by dividing the CAB maturity amount by the total CAB proceeds including the additional proceeds received as premium on PCAB issuances. This ratio represents the total amount to be repaid at maturity (principal plus interest) compared to the total amount of proceeds received (par plus premium).

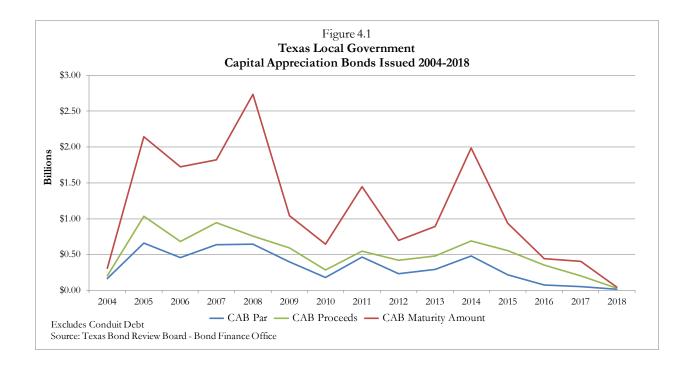
The third is the "Accreted Interest/Proceeds" ratio (AIPR) which is calculated by dividing the CAB maturity amount minus the original par amount by the total proceeds including the CAB premium. This ratio represents the total amount of interest to be paid at maturity compared to the total amount of proceeds received including premium (par plus premium).

Table 4.3 lists the top 20 most expensive CABs issued and outstanding as of fiscal year-end 2018 as defined by the "Maturity Value/Proceeds" ratio. CABs become increasingly more expensive as interest continues to compound with longer term maturities. For comparison, the Maturity Value/Proceeds ratio for CIBs is generally less than 2.0 and the AIPR is generally less than 1.0. The decline in the Maturity Value/Proceeds ratio compared to the Maturity Value/Par ratio shows the effect of including the premiums on PCABs in the comparison.

Table 4.3										
Texas Local Governent										
Top 20 Most Expensive Capital Appreciation Bonds Outstanding As of August 31, 2018										
						Accreted				
			CAB	Maturity	Maturity	Interest /				
		Closing	Maturity	Value/	Value/	Proceeds				
Issuer	Issue	Date	Date	Par	Proceeds	Ratio				
Forney ISD	Unl Tax Ref Bonds Txbl Ser 2014A	2/18/2014	8/15/2053	12.69	10.87	10.01				
Forney ISD	Unl Tax Ref Bonds Ser 2014	2/18/2014	8/15/2053	10.17	8.34	7.52				
Forney ISD	Unl Tax Ref Bonds Txbl Ser 2013B	8/27/2013	8/15/2043	7.94	6.89	6.03				
Hutto ISD	Unl Tax Ref Bonds Ser 2012A	5/3/2012	8/1/2045	249.18	6.71	6.68				
Anna ISD	Unl Tax School Bldg Bonds Ser 2010A	9/21/2010	8/15/2046	3,819.06	6.25	6.25				
Anna ISD	Unl Tax School Bldg Bonds Ser 2011	6/23/2011	2/15/2051	6.17	5.87	4.92				
Anna ISD	Unl Tax School Bldg Bonds Ser 2010	4/8/2010	8/15/2043	12.00	5.82	5.33				
Forney ISD	Unl Tax Ref Bonds Ser 2013A	8/27/2013	8/15/2043	9.35	5.49	4.90				
Lake Worth ISD	Unl Tax Ref Bonds Ser 1995	9/21/1995	2/15/2024	8.25	5.31	4.66				
Robstown ISD	Unl Tax School Bldg & Ref Bonds Ser 1994	1/4/1995	2/15/2022	13.16	5.26	4.86				
Anna ISD	Unl Tax School Bldg Bonds Ser 2009	10/15/2009	8/15/2042	7.57	5.26	4.56				
Galena Park ISD	Unl Tax School Bldg & Ref Bonds Ser 1996	8/20/1996	8/15/2031	6.09	5.11	4.27				
Crowley ISD	Unl Tax Ref & School Bldg Bonds Ser 1993	5/19/1993	8/1/2023	9.87	5.04	4.53				
Central Texas Regional Mobility Auth	Sr Lien Rev Bonds Ser 2010	3/11/2010	1/1/2040	5.03	5.03	4.03				
Hillsboro ISD	Unl Tax School Bldg & Ref Bonds Ser 2001	2/15/2001	8/15/2031	75.90	4.94	4.88				
Alvarado ISD	Unl Tax Ref Bonds Ser 1995	6/29/1995	2/15/2025	14.78	4.83	4.50				
Frisco ISD	Unl Tax School Bldg & Ref Bonds Ser 2002	9/24/2002	8/15/2034	11.65	4.79	4.37				
Crowley ISD	Unl Tax School Bldg & Ref Bonds Ser 2002	2/19/2002	8/1/2031	47.10	4.78	4.67				
Frisco ISD	Unl Tax School Bldg & Ref Bonds Ser 1999	8/10/1999	8/15/2029	59.78	4.73	4.65				
Austin	Combined Util Sys Rev Ref Bonds Ser 1994	10/19/1994	5/15/2019	4.61	4.61	3.61				
Excludes commercial paper & conduit deb	ot									
Source: Texas Bond Review Board - Bond	Finance Office									

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Figure 4.1 illustrates the total CAB par amount issued, the total proceeds received (including premiums on PCABs), and CAB maturity amount (total debt-service owed at maturity) since 2004.



CABs Outstanding

Table 4.4 provides a comparison between the total CAB debt outstanding and total CIB and CAB debt outstanding for each type of local government entity. The CAB debt service (principal plus interest) is 2.7 percent of total debt-service owed by local governments. School districts owe the most CAB debt service at 58.5 percent of total CAB debt-service owed among all local governments. While CAB par was 1.0 percent of total CIB and CAB par outstanding at fiscal year-end 2018, CAB interest accounted for 5.9 percent of total interest owed.

	Table 4.4										
Texas Local Government											
Capital Appreciation Bonds Outstanding as of August 31, 2018											
	T . I D .		CARR	T . II		CARI	T . ID 1.	CARM	CAB Maturity	0/ 675 / 1	% of Total CAB
	Total Par Outstanding	CAB Par	CAB Par / Total	Total Interest Outstanding		CAB Interest / Total	Total Debt Service	CAB Maturity Amount	Amount/ Total Debt	% of Total	Maturity Amount
Entity Type	(CIB+CAB)	Outstanding	Par	(CIB+CAB)	CAB Interest	Interest	(CIB+CAB)	Outstanding	1		Outstanding
Public School Districts	84,089,978,300.11	1,226,454,954.84	1.46%	49,152,085,649.63	4,415,418,287.14	8.98%	133,242,063,950	5,641,873,242	4.23%	53.59%	58.46%
Cities, Towns & Villages	74,589,848,109.80	241,003,755.50	0.32%	36,926,827,695.58	1,044,168,456.79	2.83%	111,516,675,805	1,285,172,212	1.15%	10.53%	13.32%
Water Districts	29,940,930,375.39	96,691,609.71	0.32%	13,617,172,444.03	190,965,101.26	1.40%	43,558,102,819	287,656,711	0.66%	4.22%	2.98%
Other Special Districts	17,126,785,073.23	645,032,412.65	3.77%	14,767,394,649.70	1,552,002,587.35	10.51%	31,894,179,723	2,197,035,000	6.89%	28.18%	22.76%
Counties	13,949,010,202.96	44,334,618.90	0.32%	6,324,827,126.65	109,330,381.10	1.73%	20,273,837,330	153,665,000	0.76%	1.94%	1.59%
Comm Colleges / Junior Colleges	\$ 5,260,949,715.00	23,953,715.00	0.46%	\$ 2,544,959,261.74	24,336,285.00	0.96%	\$7,805,908,977	\$48,290,000	0.62%	1.05%	0.50%
Health & Hospitals	3,673,321,307.04	11,149,366.66	0.30%	2,599,112,365.11	26,756,617.34	1.03%	6,272,433,672	37,905,984	0.60%	0.49%	0.39%
Total	\$ 228,630,823,084	\$ 2,288,620,433	1.00%	\$125,932,379,192	\$7,362,977,716	5.85%	\$ 354,563,202,276	\$ 9,651,598,149	2.72%	100.00%	100.00%
Excludes Commercial Paper, Conduit	Debt & Build America B	Bond subsidies.									

Source: Texas Bond Review Board - Bond Finance Office

Figure 4.2 below shows the maturity amount (principal plus interest) for each local government entity with CABs outstanding since 2004.

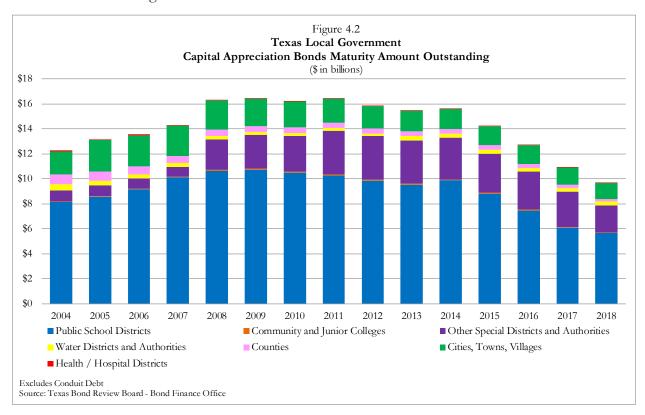


Figure 4.3 shows CIB debt service and CAB debt service for all local governments since 2004. In fiscal year 2018, CAB maturity amounts accounted for 2.7 percent (\$9.65 billion) of the total debt service outstanding.

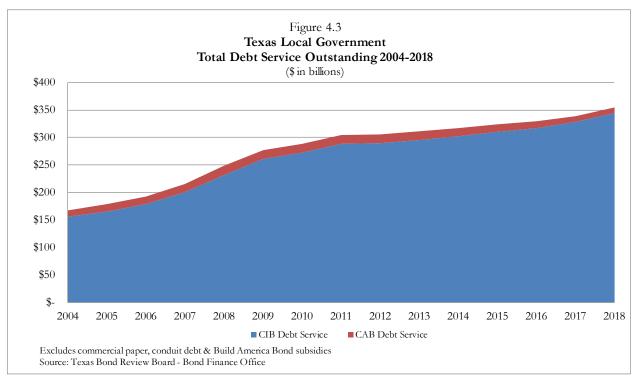


Figure 4.4 compares the ratio of total debt service to total par outstanding for CIB and CAB debt for all local governments. On average, issuers of CAB debt paid \$3.56 in principal and interest for every \$1 of principal borrowed since 2004 compared to \$1.64 for CIB debt.

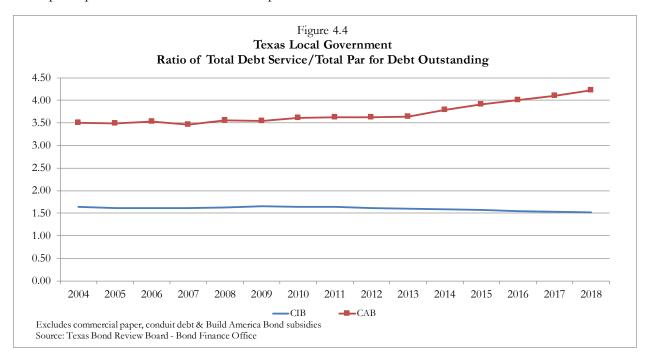
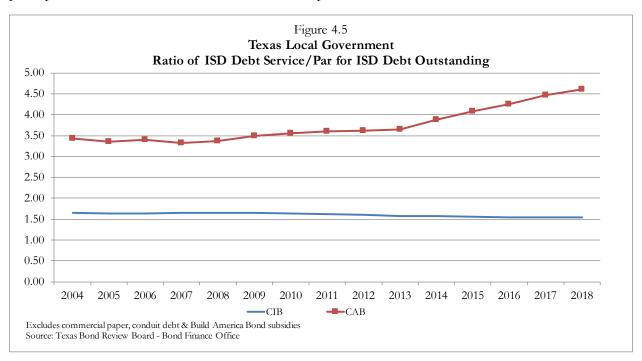


Figure 4.5 compares the ratio of public school district (ISD) debt service to ISD debt outstanding for CIB and CAB debt. On average, school districts paid \$3.74 in principal and interest for every \$1 of principal borrowed since 2004 for CAB debt compared to \$1.60 for CIB debt.



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Chapter 5 Certificates of Obligation

Certificates of Obligation (COs) are authorized by the Certificate of Obligation Act of 1971, Subchapter C of Chapter 271 of the Texas Local Government Code. COs are generally issued as tax-supported debt to pay for the construction of a public work; purchase of materials, supplies, equipment, machinery, buildings, land, and rights-of-way; and to pay for professional services such as engineers, architects, attorneys and financial advisors. Debt for COs is paid from ad valorem taxes and/or a combination of revenues available from other sources. CO issuance does not require voter approval unless a valid petition of 5 percent of the voters requesting an election is presented.

With the passage of House Bill 1378 during the 84th Legislative Session, effective January 1, 2016, a CO may not be issued if the voters rejected a bond proposition for the same purpose within the preceding three years, except in the case of public calamity, public health, unforeseen damage to public property, or to comply with a state or federal regulation. Only counties, certain cities, and Health and Hospital Districts and Authorities (HHDs) are authorized to issue COs.

Since fiscal 2009, CO debt outstanding has increased by 25.4 percent (\$2.88 billion) from \$11.33 billion outstanding in fiscal 2009 to \$14.21 billion outstanding at August 31, 2018. At August 31, 2018, cities accounted for 78.8 percent of the total CO debt outstanding (*Figure 5.1*).

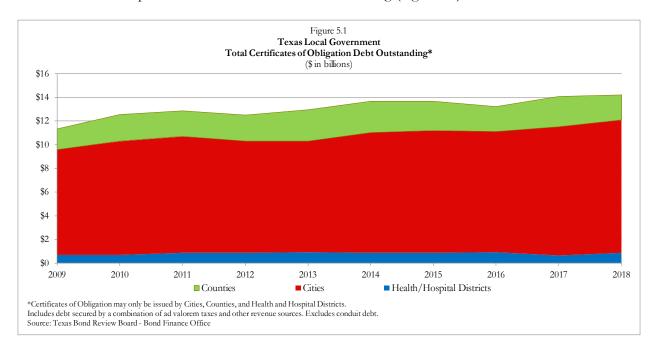
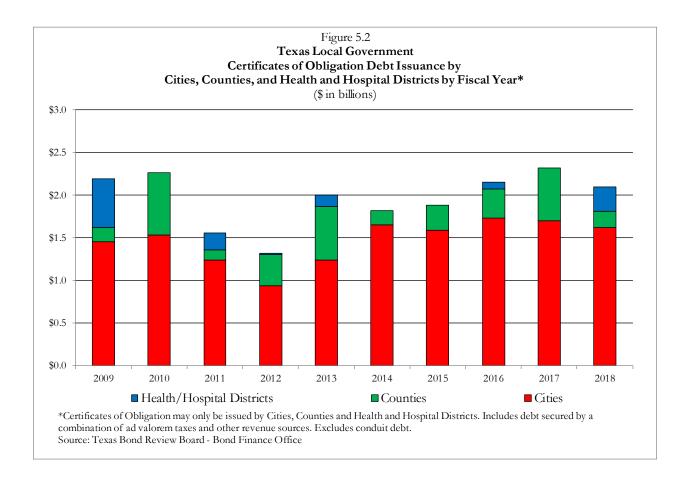


Figure 5.2 illustrates the relative amounts of CO debt issued by cities, counties and HHDs over the past 10 fiscal years.

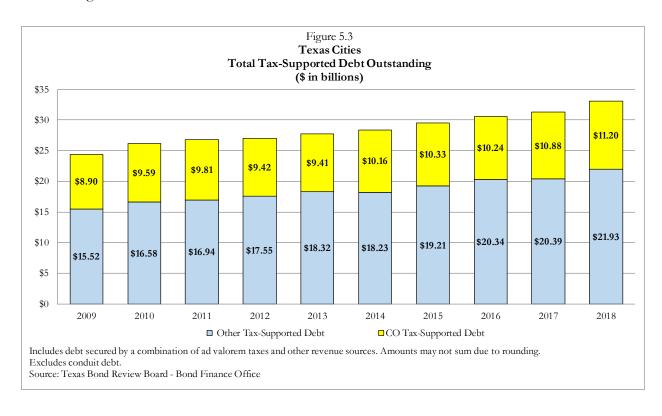


The 20 highest issuers of CO debt accounted for 41.3 percent of all CO debt outstanding (Table 5.1).

Table 5.1 Texas Local Government Top 20 Issuers with Certificates of Obligation Debt Outstanding as of August 31, 2018 (\$ in millions)						
Bexar County Hospital District	\$696.3					
Bexar County	622.3					
Lubbock	559.1					
San Antonio	511.5					
El Paso	497.8					
Denton	466.1					
Austin	276.6					
Frisco	267.7					
Waco	244.3					
Travis County	190.0					
Fort Worth	185.6					
Abilene	182.7					
Grand Prairie	177.7					
College Station	177.3					
San Marcos	162.8					
Dallas County	145.5					
League City	133.4					
El Paso County Hospital District	130.6					
Hutto	125.2					
Sugar Land	121.3					
Subtotal	\$5,873.6					
Other CO Issuers	8,338.5					
Total	\$14,212.1					
Includes debt secured by a combination of ad valorem taxes and other revenue sources. Excludes conduit debt. Source: Texas Bond Review Board - Bond Finance Office						

Cities, Town and Villages

Over the past 10 fiscal years, tax-supported CO debt outstanding has increased by 25.9 percent (\$2.31 billion) from \$8.90 billion to \$11.20 billion. As of fiscal year 2018, all outstanding CO debt is tax-supported and represents 33.8 percent of the total cities tax-supported debt outstanding and 14.9 percent of the total cities debt outstanding including revenue debt. *Figure 5.3* illustrates the portion of total city tax-supported debt attributable to CO. As of fiscal year 2018, 660 cities had CO debt outstanding.



The top 30 cities with CO debt outstanding accounted for 49.0 percent (\$5.48 billion) of the total city CO debt outstanding (*Table 5.2*).

	Table 5.2	2	
	Texas Cit		
Top 30 Issuers w			n Outstanding
P 22 22 22 22		CO Debt	CO as % of City
	CO 4		· ·
	CO Amount	per Capita*	Tax-Supported
T 11 1	(\$ in millions)	<u>-</u>	Debt Outstanding
Lubbock	\$559.1	\$2,202	56.6%
San Antonio	511.5	338	26.7%
El Paso	497.8	728	40.7%
Denton	466.1	3,420	63.2%
Austin	276.6	291	18.6%
Frisco	267.7	1,510	34.4%
Waco	244.3	1,790	57.5%
Fort Worth	185.6	212	25.4%
Abilene	182.7	1,499	58.2%
Grand Prairie	177.7	917	70.3%
College Station	177.3	1,561	55.0%
San Marcos	162.8	2,581	51.8%
League City	133.4	1,271	61.0%
Hutto	125.2	4,935	77.8%
Sugar Land	121.3	1,371	42.5%
Flower Mound	111.9	1,459	68.8%
Garland	111.2	467	24.8%
Conroe	110.8	1,313	64.5%
Richardson	106.8	915	34.6%
Temple	104.2	1,398	44.9%
Beaumont	100.9	847	48.4%
San Angelo	100.3	1,002	57.7%
Amarillo	92.6	464	60.0%
Mansfield	91.3	1,325	67.9%
Bryan	83.2	990	62.4%
Laredo	82.4	316	28.5%
Midland	79.3	583	56.6%
	79.3 76.2		41.2%
Mesquite		529 1 719	
Colony, The	73.4	1,718	66.7%
Irving	70.6	294	15.9%
Subtotal	\$5,484.1		
Other Cities	5,718.5		
Total Includes debt secured by a comb	\$11,202.6	· othor	

Includes debt secured by a combination of ad valorem taxes and other revenue sources. Excludes conduit debt.

Source: Texas Bond Review Board - Bond Finance Office

^{*} Population data from the July 2017 US Census Population Division

The CO debt for the Big 6 accounted for 13.4 percent (\$1.50 billion) of the total cities' CO debt outstanding (Table 5.3).

Table 5.3 Texas Cities Big 6 Cities with Certificates of Obligation Debt Outstanding									
	Amount (\$ in millions)	Debt per Capita	CO as % of Issuer's Tax-Supported Debt Outstanding	Rank by CO Debt Outstanding					
San Antonio	\$511.5	\$338	26.7%	2nd					
El Paso	497.8	728	40.7%	3rd					
Austin	276.6	291	18.6%	5th					
Fort Worth	185.6	212	25.4%	8th					
Houston	15.3	7	0.4%	153rd					
Dallas	10.1	8	0.6%	202nd					
Subtotal	\$1,496.9								
Other City CO Issuers_	9,705.8								
Total	\$11,202.6								

Includes debt secured by a combination of ad valorem taxes and other revenue sources.

Excludes conduit debt.

Source: Texas Bond Review Board - Bond Finance Office

^{*} Population data from the July 2017 US Census Population Division

Counties

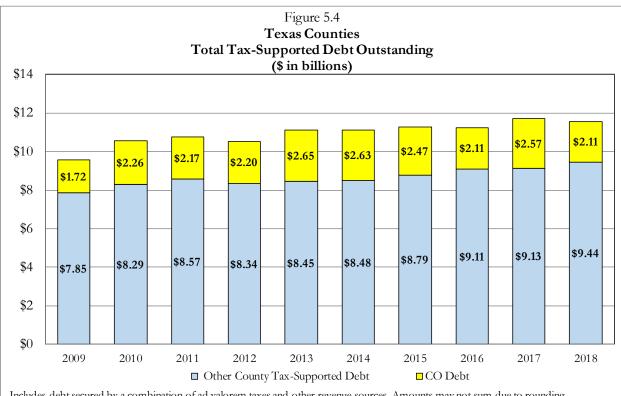
As of August 31, 2018, Texas counties had \$2.11 billion of CO debt outstanding which was 18.3 percent of the county tax-supported debt outstanding. Of the 82 counties with CO debt outstanding, the top 20 had \$1.76 billion (83.1 percent) of the total county CO debt outstanding (*Table 5.4*).

Table 5.4 Texas Counties										
Top 20 Cert	tificates of Obl	0	uers							
	CO Amount	-	% of Issuer's Tax-							
	(\$ in millions)	Capita*	supported Debt							
Bexar County	\$622.3	\$318	37.0%							
Travis County	190.0	155	26.9%							
Dallas County	145.5	56	84.5%							
Hidalgo County	120.5	140	61.2%							
Cameron County	79.9	189	47.9%							
Tom Green County	65.9	559	100.0%							
Fort Bend County	65.9	86	11.2%							
Bell County	56.0	161	43.5%							
Montgomery County	49.1	86	10.7%							
Comal County	41.4	293	28.2%							
Williamson County	39.6	72	4.5%							
Nueces County	39.0	108	36.2%							
La Salle County	35.1	4,631	72.6%							
Bastrop County	34.5	407	71.7%							
Brazoria County	32.1	88	42.0%							
Webb County	31.2	114	46.8%							
Randall County	31.1	232	67.4%							
Brazos County	29.1	131	33.9%							
El Paso County	24.9	30	14.5%							
Atascosa County	24.0	491	97.8%							
Subtotal of Top 20 CO Issuers	\$1,757.2	\$147	28.0%							
Other CO Issuers	356.6	137	30.2%							
Total	\$2,113.8	\$146	18.3%							

^{*} Population data from the July 2017 US Census Population Division. Total population based on issuers with debt outstanding. Excludes conduit debt.

Includes debt secured by a combination of ad valorem taxes and other revenue sources. Source: Texas Bond Review Board - Bond Finance Office

Over the past 10 fiscal years ending August 31, 2018, county CO debt outstanding has increased by 22.8 percent from \$1.72 billion to \$2.11 billion. The increase was mainly due to multiple issuances by Bexar County totaling \$1.40 billion over the period for flood control purposes, transportation projects, improvements to the courthouse and jail, and general purpose (*Figure 5.4*).



Includes debt secured by a combination of ad valorem taxes and other revenue sources. Amounts may not sum due to rounding. Excludes conduit debt.

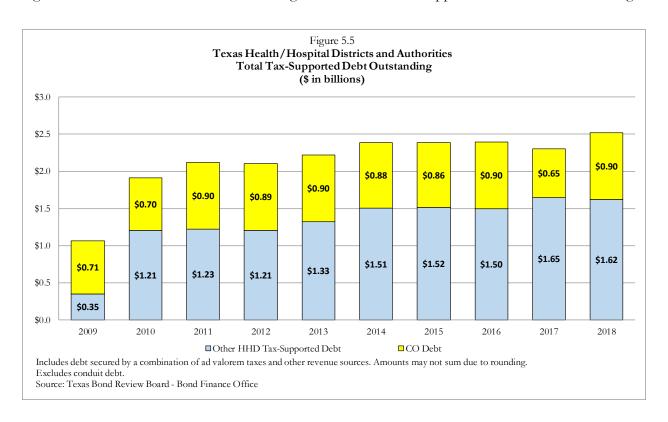
Source: Texas Bond Review Board - Bond Finance Office

Health and Hospital Districts

As of August 31, 2018, four HHDs had CO debt outstanding totaling \$895.7 million (*Table 5.5*). These issuances accounted for 35.6 percent of total HHD tax-supported debt outstanding (*Figure 5.5*) and 24.4 percent of total HHD debt outstanding including revenue debt.

Table 5.5 Texas Health/Hospital Districts and Authorities with Certificates of Obligation Debt Outstanding								
	COs as % of							
	Amount*	Tax- Supported Debt						
Issuer	(\$ in millions)	Outstanding						
Bexar County Hospital District (University Health System)	\$696.3	78.1%						
El Paso County Hospital District	130.6	38.3%						
Harris County Hospital District	59.5	100.0%						
Travis County Healthcare District	9.4	100.0%						
Total	\$895.7	_						
*Includes debt secured by a combination of ad valorem taxes and other revenue sources. Excludes conduit debt. Source: Texas Bond Review Board - Bond Finance Office								

Figure 5.5 shows HHD CO debt outstanding relative to total tax-supported HHD debt outstanding.



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Appendix A Bond Election Results

Bond elections are required before the issuance of certain debt obligations that pledge unlimited or limited ad valorem taxes of a local government for repayment. Bond elections are generally held on a uniform election date. Section 41.001 of the Election Code states a uniform election date is one of the following: (1) the first Saturday in May in an odd numbered year; (2) the first Saturday in May in an even numbered year (excluding counties); (3) the first Tuesday after the first Monday in November.

Texas local governments are not required to provide the Bond Review Board (BRB) with bond election information. Such information has been obtained from various sources, including newspaper articles, the Municipal Advisory Council's *Texas Bond Reporter*, and the U.S. Department of Justice.

Table A.1 shows the number of voter-approved bond elections for the past 5 fiscal years. Table A.2 shows the voter-approved election amounts for the past five fiscal years for each of the local government categories. The detailed results of the fiscal year 2018 elections are shown in Tables A.3 through A.6. A total of 181 local governments held 312 bond elections during fiscal year 2018.

On November 6, 2018, 86 local governments held 141 bond elections, 127 of which approved debt totaling \$11.27 billion.

					Ta	able A.1						
Texas Local Government												
	Number of Bond Election Propositions Approved by Fiscal Year											
											Total Percentage	
	201	4	20	15	20	16	20	17	20)18	Approved	
ISD	103	68%	116	82%	109	80%	65	68%	98	74%	75%	
City	54	78%	64	93%	54	93%	34	81%	66	80%	85%	
WD	36	100%	57	97%	55	98%	16	94%	81	94%	96%	
OSD	0	N/A	0	N/A	0	N/A	0	N/A	0	N/A	N/A	
County	9	75%	4	80%	12	92%	12	92%	8	80%	85%	
CCD	3	100%	5	100%	1	50%	4	100%	0	0%	87%	
HHD	3	60%	1	33%	0	N/A	1	100%	0	0%	50%	
Total	208	75%	247	87%	231	87%	132	77%	253	81%	82%	
Source: Bond	l Buyer, Mur	nicipal Adv	risory Coun	icil's Texas	Bond Repo	orter and U	S. Departm	nent of Just	ice. Civil R	iohts Divisi	on - Voting Section	

Table A.2 **Texas Local Government** Estimated Bond Election Results by Fiscal Year (\$ in millions) 2014 2015 2016 2017 2018 **Public School Districts** \$9,599.5 \$11,105.2 \$8,605.3 \$13,508.2 Election Amount \$8,626.8 10,560.9 11,897.1 Amount Approved 7,965.9 7,244.1 7,042.1 83.0% 84.0% 95.1% 81.8% 88.1% Percent Approved Cities, Towns, Villages Election Amount \$1,003.6 \$1,824.8 \$1,020.3 \$3,031.1 \$3,894.8 Amount Approved 848.0 933.6 2,784.8 3,654.0 1,157.8 Percent Approved 84.5% 63.5% 91.5% 91.9% 93.8% Water Districts and Authorities Election Amount \$7,556.0 \$3,328.6 \$4,013.8 \$1,120.3 \$8,204.6 Amount Approved 7,556.0 3,167.6 4,003.8 1,102.8 7,976.0 Percent Approved 100.0% 95.2%99.8% 98.4% 97.2% Other Special Districts and Authorities Election Amount \$0.0 \$0.0 \$0.0 \$0.0 \$0.0 Amount Approved 0.0 0.0 0.0 0.0 0.0 Percent Approved N/A N/A N/A N/A N/ACounties Election Amount \$995.8 \$1,557.9 \$552.1 \$707.4 \$414.0 Amount Approved 663.9 64.0 1,270.6 543.6 562.4 Percent Approved 66.7% 79.5% 15.5% 81.6% 98.5% Community and Junior College Districts Election Amount \$273.8 \$1,047.9 \$513.5 \$1,199.0 \$48.5 Amount Approved 273.8 1,047.9 425.0 1,199.0 0.0 0.0%Percent Approved 100.0% 100.0% 82.8% 100.0% Health/Hospital Districts and Authorities Election Amount \$139.5 \$0.0 \$7.3 \$66.0 \$13.8 10.0 Amount Approved 62.5 0.0 13.8 0.0 44.8% 15.1% N/A100.0% 0.0% Percent Approved **Total Election Amount** \$19,568.1 \$15,308.0 \$18,210.7 \$14,521.5 \$26,370.8 \$24,089.5 **Total Amount Approved** \$17,370.2 \$12,691.3 \$17,193.9 \$12,686.0 88.8% 82.9% 94.4% 87.4% 91.3% Total Percent Approved

Source: Bond Buyer, Municipal Advisory Council's Texas Bond Reporter and U.S. Department of Justice, Civil Rights Division - Voting Section

Table A.3

Texas Local Government Carried Propositions

Bond Elections May 05, 2018

			Amount
Issuer	County	Purpose	Carried
Public School Districts			
Andrews ISD	Andrews	School Building & Buses	\$50.0
Bells ISD	Grayson	School Building	8.0
Bishop CISD	Nueces	School Building & Security	15.2
Bluff Dale ISD	Erath	School Building & Gymnasium	5.1
Caldwell ISD	Burleson	School Building & Gymnasium	28.0
Carthage ISD	Panola	School Building & Buses	5.8
Center ISD	Shelby	School Building & Security	20.0
Center ISD	Shelby	School Building/Auditorium	10.0
Dawson ISDb	Navarro	School Building & Athletic Improvements	5.9
Denton ISD	Denton	School Building	750.5
Dripping Springs ISD	Hays-Travis	School Building	132.0
Farwell ISD	Parmer	Athletic Facility and School Building	6.2
Farwell ISD	Parmer	School Building	3.2
Fredericksburg ISD	Gillespie	School Building	9.3
Frost ISD	Navarro	Cafeteria	6.5
Galveston ISD	Galveston	School Building	31.0
Gilmer ISD	Upshur	School Building	35.3
Grape Creek ISD	Tom Green	School Building	10.8
Hawkins ISD	Wood	School Building & Buses	4.1
Hawkins ISD	Wood	Athletic Renovations	0.9
Highland Park ISDb	Potter	School Building	15.0
Humble ISD	Harris	School Building & Gymnasium	575.0
Hurst-Euless-Bedford ISD	Tarrant	School Building & Technology	199.0
Itasca ISD	Hill	School Building & Buses	45.0
Jayton-Girard ISD	Kent	School Building & Buses	2.0
Killeen ISD	Bell	School Building & Security	235.0
Killeen ISD	Bell	School Building	191.0
Lamesa ISD	Dawson	School Building	30.4
Laredo ISD	Webb	School Building	150.0
Lufkin ISD	Angelina	School Building	75.0
Mesquite ISD	Dallas	School Building & Buses	325.0
Mildred ISD	Navarro	School Building & Technology	8.0
New Caney ISD	Montgomery	School Building	200.0

Texas Local Government

Carried Propositions

Bond Elections May 05, 2018

			Amount
Issuer	County	Purpose	Carried
Public School Districts Cont'd			
Northside ISDa	Bexar	School Building	\$848.9
Peaster ISD	Parker	School Building	6.0
Pleasant Grove ISD	Bowie	School Building & Technology	19.9
Pottsboro ISD	Grayson	Safety	4.8
Rice CISD	Colorado	School Building	9.9
Royse City ISD	Rockwall	School Building	60.0
Salado ISD	Bell	SchoolBuilding & Athletic Improvements	49.4
Snook ISD	Burleson	School Building/ Stadium	7.5
Snook ISD	Burleson	Athletic Renovations	0.7
Stephenville ISD	Erath	School Building	60.8
Texas City ISD	Galveston	School Building & Security	136.1
Thorndale ISD	Milam	School Building	9.9
Thorndale ISD	Milam	Renovations	0.2
Thomdale ISD	Milam	School Building Improvements	0.7
Waxahachie ISD	Ellis	School Building	23.0
Wimberley ISD	Hays	School Building	45.5
Wink-Loving ISD	Winkler	School Building/ Auditorium	53.0
Public School Districts Total			\$4,524.3
Cities, Towns, Villages			
Carrollton	Dallas	Street & Bridge	\$78.0
Carrollton	Dallas	Public Safety	6.3
Carrollton	Dallas	Parks & Recreation	22.4
Fort Worth	Tarrant	Mobility Projects	261.6
Fort Worth	Tarrant	Parks & Recreation	84.2
Fort Worth	Tarrant	Library	9.9
Fort Worth	Tarrant	Fire Station Improvements	12.0
Fort Worth	Tarrant	Animal Care & Control	13.8
Fort Worth	Tarrant	Poliœ Station	18.1
Haltom City	Tarrant	Fire Station Improvements	5.5
Katy	Harris	Bridge	4.3

Texas Local Government Carried Propositions

Bond Elections May 05, 2018

			Amount
Issuer	County	Purpose	Carried
Cities, Towns, Villages Cont'd			
Katy	Harris	Drainage	\$10.3
Katy	Harris	Sewer	5.0
Kirby	Bexar	Street & Drainage	6.8
McAllen	Hidalgo	Drainage	22.0
McAllen	Hidalgo	Traffic Improvements	3.0
Oak Point	Denton	Street	5.0
Rockwall	Rockwall	Street	85.0
Rowlett	Dallas	Street & Drainage	41.5
Rowlett	Dallas	Parks & Recreation	9.0
Rowlett	Dallas	Public Safety	9.5
Wichita Falls	Wichita	Street	17.3
Cities, Towns, Villages Total			\$730.2
Water Districts			
Brazoria County MUD 29	Brazoria	Road	\$22.0
Dowdell PUD	Harris	Water, Sewer, Drainage & Refunding	75.0
Fort Bend County LID 007	Fort Bend	Levee	121.2
Fort Bend County LID 007	Fort Bend	Refunding	121.2
Fort Bend County MUD 132*	Fort Bend	Road	65.1
Fort Bend County MUD 132*	Fort Bend	Water, Sewer & Drainage	333.6
Fort Bend County MUD 132*	Fort Bend	Recreation	57.9
Fort Bend County MUD 132*	Fort Bend	Refunding	456.6
Fort Bend County MUD 143	Fort Bend	Sewer & Drainage	56.8
Fort Bend County MUD 200	Fort Bend	Water, Sewer & Drainage	130.8
Fort Bend County MUD 200	Fort Bend	Parks & Recreation	31.4
Fort Bend County MUD 200	Fort Bend	Road	100.8
Fort Bend County MUD 218	Fort Bend	Water, Sewer & Drainage	140.0
* Bond election occurred on May 9, 2018			

Texas Local Government Carried Propositions

Bond Elections May 05, 2018

			Amount
Issuer	County	Purpose	Carried
Water Districts Cont'd			
Fort Bend County MUD 218	Fort Bend	Road	\$69.0
Fort Bend County MUD 218	Fort Bend	Parks & Recreation	20.5
Galveston County MUD 12	Galveston	Water & Sewer	4.4
Harris County FCD*	Harris	Flood Control	2,500.0
Harris County MUD 552	Harris	Water, Sewer, Drainage & Refunding	195.0
Harris County MUD 552	Harris	Road & Refunding Roads	67.5
Harris County MUD 552	Harris	Parks & Recreation & Refunding	17.5
Missouri City Management District 1	Fort Bend	Water, Sewer & Drainage	170.0
Missouri City Management District 1	Fort Bend	Recreation	33.2
Missouri City Management District 1	Fort Bend	Road	95.8
Montgomery County MUD 111	Montgomery	Sewer & Drainage	179.9
Montgomery County MUD 111	Montgomery	Road	9.4
Montgomery County MUD 111	Montgomery	Parks & Recreation	51.5
Montgomery County MUD 15	Montgomery	Water, Sewer & Drainage	24.4
Port Freeport	Brazoria	Channel Improvements	1.3
Tarrant Regional WD	Tarrant	Flood Control	250.0
Trinity Lakes MUD	Montgomery	Water, Sewer & Drainage	17.0
Trinity Lakes MUD	Montgomery	Road	6.0
Trinity Lakes MUD	Montgomery	Parks & Recreation	2.0
Varner Creek UD	Brazoria	Water, Sewer & Drainage	3.5
Williamson County MUD 28**	Williamson	Water, Sewer, Drainage & Refunding	69.8
Williamson County MUD 28**	Williamson	Roads & Refunding Roads	14.8
Williamson County MUD 28**	Williamson	Parks & Recreation & Refunding	34.6
Water Districts Total			\$5,549.4
Total Carried			\$10,803.9
* Bond election occurred on August 25, 20	018		
** Bond election occurred on July 9, 2018			

Table A.4

Texas Local Government

Defeated Propositions Bond Elections May 05, 2018

			Amount
Issuer	County	Purpose	Defeated
Public School Districts			
Alpine ISD	Brewster	School Building	\$29.5
Alvord ISD	Wise	School Building & Gymnasium	5.1
Beeville ISD	Bee	School Building	37.0
Beeville ISD	Bee	Renovations	13.0
Brady ISD	McCulloch	School Building	13.5
Christoval ISD	Tom Green	School Building & Security	9.5
Eustaœ ISD	Henderson	School Building & Buses	27.5
Goose Creek ISD	Harris-Chambers	School Building & Athletic Improvements	376.9
Goose Creek ISD	Harris-Chambers	Multi-Pupose Center	60.5
Mildred ISD	Navarro	Stadium	6.2
Mildred ISD	Navarro	Multi-Pupose Center	0.8
Pottsboro ISD	Grayson	School Building & Gymnasium	27.0
San Angelo ISD	Tom Green	School Building	149.0
West ISD	McLennan	School Building	20.0
Public School Districts Total			\$775.5
Cities, Towns, Villages			
Ferris	Ellis	Municipal Building	\$12.0
Haltom City	Tarrant	City Building	28.9
Ivanhoe	Tyler	Street	2.0
Spearman	Hansford	Parks & Recreation	2.0
Wichita Falls	Wichita	Park	7.3
Wichita Falls	Wichita	Shoreline	3.9
Wichita Falls	Wichita	Municipal Complex	77.0
Wichita Falls	Wichita	Event Center	2.2
Wichita Falls	Wichita	Auditorium	1.5
Wichita Falls	Wichita	Street & Park	21.9
Cities, Towns, Villages Total			\$158.6
Water Districts			
East Texas MUD of Smith County	Smith	Water & Sewer	\$6.0
Fort Bend County MUD 143	Fort Bend	Recreation	10.8
Harris County MUD 165	Harris	Water, Sewer & Drainage	191.1
Water Districts Total			\$207.9
Total Defeated			\$1,142.0

Table A.5

Texas Local Government

Carried Propositions

Bond Elections November 07, 2017

			Amount
Issuer	County	Purpose	Carried
Public School Districts			
Amarillo ISD	Potter-Randall	School Building	\$100.0
Aubrey ISD	Denton	School Building	51.0
Austin ISD	Travis	School Building	1,050.0
Calallen ISD	Nueces	School Building	39.5
Coahoma ISD	Howard	School Building	4.0
Coldspring-Oakhurst CISD	San Jacinto	School Building	19.8
Community ISD	Collin	School Building	115.8
Crockett County Cons CSD	Crockett	School Building	5.0
Crosby ISD	Harris	School Building	109.5
Danbury ISD	Brazoria	School Building	18.7
Deer Park ISD	Harris	School Building	156.0
Eagle Mt-Saginaw ISD	Tarrant	School Building & Security	524.7
East Bernard ISD	Wharton	School Building	18.5
Fort Worth ISD	Tarrant	School Building	749.7
Grady ISD	Martin	School Building & Buses	35.0
Groesbeck ISD	Limestone	School Building & Buses	5.0
Haskell CISD	Haskell	School Building	21.8
Howe ISD	Grayson	School Building	17.0
Katy ISD	Harris	School Building & Technology	609.2
Kenedy ISD	Karnes	School Building	17.0
La Villa ISD	Hidalgo	School Building & Buses	5.0
Lago Vista ISD	Travis	School Building & Technology	2.9
Lake Travis ISD	Travis	School Building & Buses	253.0
Lamar CISD	Fort Bend	School Building & Technology	445.4
Leander ISD	Williamson	School Building & Technology	454.4
Little Elm ISD	Denton	School Building & Athletic Improvements	235.0
Little Elm ISD	Denton	Refunding	4.5
London ISD	Nueces	School Building	18.0
Mart ISD	MdLennan	School Building	9.2
Medina ISD	Bandera	School Building & Security	6.0
Navasota ISD	Grimes	School Building/ Auditorium	55.0
New Diana ISD	Upshur	School Building	5.5
Pasadena ISD	Harris	School Building	135.0

Texas Local Government Carried Propositions

Bond Elections November 07, 2017

Issuer	County	Purpose	Amount Carried
Public School Districts Cont'd	<i>J</i>	1	
Poth ISD	Wilson	School Building	\$10.0
S and S CISD	Grayson	School Building	20.5
Sabine Pass ISD	Jefferson	School Building	1.2
Sherman ISD	Grayson	School Building & Technology	176.0
Socorro ISD	El Paso	School Building	448.5
Spring Branch ISD	Harris	School Building & Buses	898.4
Stafford MSD	Fort Bend	School Building	62.0
Stratford ISD	Sherman	Science Lab	2.9
Stratford ISD	Sherman	Agriculture	3.2
Stratford ISD	Sherman	School Building & Security	1.3
Tomball ISD	Harris	School Building	275.0
Tulia ISD	Swisher	School Building	13.0
Van Vleck ISD	Matagorda	School Building & Buses	88.2
Winnsboro ISD	Wood	School Building	31.5
Wylie ISDb	Taylor	School Building	45.0
Public School Districts Total			\$7,372.8
Cities, Towns, Villages			
Bedford	Tarrant	Multi-Pupose Center	\$70.0
Cedar Hill	Dallas-Ellis	Street & Drainage	10.0
Cedar Hill	Dallas-Ellis	Library	20.0
Cedar Hill	Dallas-Ellis	Parks & Recreation	15.0
Dallas	Dallas	Street	534.0
Dallas	Dallas	Parks & Recreation	261.8
Dallas	Dallas	Parks & Rec	50.0
Dallas	Dallas	Flood Control	48.8
Dallas	Dallas	Library	15.6
Dallas	Dallas	Cultural Arts Facilities	14.2
Dallas	Dallas	Police & Fire	32.1
Dallas	Dallas	City Hall	18.2
Dallas	Dallas	Economic Development	55.4
Dallas	Dallas	Homeless	20.0
Farmers Branch	Dallas	Infrastructure	4.0

Texas Local Government Carried Propositions

Bond Elections November 07, 2017

T	C	D	Amount Carried
Issuer	County	Purpose	Carried
Cities, Towns, Villages Cont'd			
Farmers Branch	Dallas	Sidewalks	\$7.0
Farmers Branch	Dallas	Neighborhood Development	4.0
Grapevine	Tarrant	Animal Care & Control	3.9
Grapevine	Tarrant	Fire Station Improvements	16.0
Grapevine	Tarrant	Multi-Pupose Center	4.8
Highland Village	Denton	Street	2.9
Highland Village	Denton	Parks & Recreation	4.3
Houston	Harris	Public Safety	159.0
Houston	Harris	Parks & Recreation	104.0
Houston	Harris	Public Facility	109.0
Houston	Harris	Library	123.0
Houston	Harris	Pension Obligation	1,010.0
Midland	Midland	Street	74.1
Midland	Midland	Water & Sewer	25.9
Midlothian	Ellis	Fire Improvements	9.1
Midlothian	Ellis	Streets & Roads	22.2
Midlothian	Ellis	Parks & Recreation	16.1
Mineral Wells	Palo Pinto	Streets & Roads	7.5
Murphy	Collin	Street	15.5
Murphy	Collin	Public Safety Facilities	1.7
Murphy	Collin	Parks & Recreation	4.4
Plainview	Hale	Streets & Roads	7.2
Plainview	Hale	City Hall	6.0
Plainview	Hale	Fire Improvements	3.8
Plainview	Hale	Aquatic Facilities	3.8
Plainview	Hale	Downtown Area	1.5
Plainview	Hale	Parks & Recreation	1.5
Waller	Waller	City Hall	5.4
Waller	Waller	Civic Center	1.3
Cities, Towns, Villages Total		_	\$2,923.8

Texas Local Government Carried Propositions

Bond Elections November 07, 2017

			Amount
Issuer	County	Purpose	Approved
Water Districts			
Bastrop County WCID 2	Bastrop	Road	\$7.5
East Montgomery County MUD 7	Montgomery	Water, Sewer & Drainage	110.0
East Montgomery County MUD 7	Montgomery	Road	98.0
East Montgomery County MUD 7	Montgomery	Parks & Recreation	37.9
Galveston County MUD 56	Galveston	Water, Sewer & Drainage	139.0
Galveston County MUD 56	Galveston	Recreational Facilities	17.6
Galveston County MUD 56	Galveston	Road	56.6
Galveston County MUD 76	Galveston	Water, Sewer & Drainage	23.1
Galveston County MUD 76	Galveston	Recreational Facilities	7.2
Galveston County MUD 76	Galveston	Road	10.5
Galveston County MUD 76	Galveston	Port Improvements	17.3
Galveston County MUD 76	Galveston	Refunding	47.6
Galveston County MUD 76	Galveston	Refunding	10.5
Harris County MUD 061	Harris	Recreational Facilities	18.3
Harris County MUD 061	Harris	Road	49.5
Harris County MUD 061	Harris	Water, Sewer & Drainage	131.0
Harris County MUD 551	Harris	Water, Sewer & Drainage	55.0
Harris County MUD 551	Harris	Refunding	82.5
Harris County MUD 552	Harris	Water, Sewer & Drainage	78.0
Harris County MUD 552	Harris	Water, Sewer, Drainage & Refunding	117.0
Harris County MUD 552	Harris	Road	27.0
Harris County MUD 552	Harris	Road & Refunding Roads	40.5
Harris County MUD 552	Harris	Parks & Recreation	7.0
Harris County WCID 133	Harris	Water, Sewer & Drainage	16.8
Jefferson County WCID 10	Jefferson	Water & Sewer	5.4
Magnolia East MUD	Montgomery	Water, Sewer & Drainage	69.9
Magnolia East MUD	Montgomery	Road	41.5
Magnolia East MUD	Montgomery	Parks & Recreation	2.5
Magnolia East MUD	Montgomery	Refunding	104.9
Montgomery County MUD 121	Montgomery	Water, Sewer & Drainage	136.9
Montgomery County MUD 121	Montgomery	Recreational Facilities	29.0

Texas Local Government Carried Propositions

Bond Elections November 07, 2017

		Amount
County	Purpose	Carried
Montgomery	Road	\$50.2
Harris	Water, Sewer & Drainage	48.5
Harris	Water, Sewer, Drainage & Refunding	72.8
Williamson	Water	74.5
Williamson	Parks	15.9
Williamson	Roads	20.4
Williamson	Water	174.5
Williamson	Refunding	174.5
Williamson	Roads	25.0
Williamson	Parks	33.0
Harris	Water, Sewer & Drainage	16.4
Harris	Recreational Facilities	3.2
Harris	Water, Sewer & Drainage	37.5
Jefferson	Port Improvements	85.0
		\$2,426.5
Fort Bend	Mobility Projects	\$218.5
Galveston	Road	56.0
Galveston	County Building	18.0
Galveston	Flood Control	6.0
Smith	Road	39.5
Travis	Transportation	93.4
Travis	Park	91.5
Waller	Justiæ Center	39.5
		\$562.4
		\$13,285.6
	Montgomery Harris Harris Williamson Williamson Williamson Williamson Williamson Williamson Williamson Harris Harris Harris Jefferson Fort Bend Galveston Galveston Galveston Smith Travis Travis	Montgomery Road Harris Water, Sewer & Drainage Harris Water, Sewer, Drainage & Refunding Williamson Water Williamson Roads Williamson Refunding Williamson Roads Williamson Roads Williamson Roads Williamson Roads Williamson Parks Harris Water, Sewer & Drainage Harris Recreational Facilities Harris Water, Sewer & Drainage Jefferson Port Improvements Fort Bend Mobility Projects Galveston Road Galveston County Building Galveston Flood Control Smith Road Travis Transportation Travis Park

Table A.6

Texas Local Government Defeated Propositions

Bond Elections November 07, 2017

T			Amount
Issuer	County	Purpose	Defeated
Public School Districts			
Aledo ISD	Parker	School Building	\$64.2
Aledo ISD	Parker	School Building & Technology	8.8
Bastrop ISD	Bastrop	School Building	88.5
DeKalb ISD	Bowie	School Building	10.0
DeKalb ISD	Bowie	Gymnasium	2.5
Ector County ISD	Ector	School Building	291.2
Kenedy ISD	Karnes	Athletic Facility Improvements	9.0
Laneville ISD	Rusk	School Building	3.8
Laneville ISD	Rusk	Auditorium	2.9
Lytle ISD	Atascosa	School Building & Buses	6.5
Mineola ISD	Wood	School Building	38.5
Peaster ISD	Parker	Sports Complex	13.5
Pottsboro ISD	Grayson	School Building	54.7
Pottsboro ISD	Grayson	Multi-Pupose Center	4.0
Reagan County ISD	Reagan	School Building & Buses	6.0
Snook ISD	Burleson	School Building	7.5
Stratford ISD	Sherman	Performing Arts	4.8
Victoria ISD	Victoria	School Building	141.2
Waxahachie ISD	Ellis	School Building	65.0
Waxahachie ISD	Ellis	Aquatic Center	13.0
Public School Districts Total			\$835.6
Cities, Towns, Villages			
Fairview (a)	Collin	Municipal Building	25.5
Fredericksburg	Gillespie	Sports Complex	12.6
Midlothian	Ellis	Public Safety Building	33.0
Mineral Wells	Palo Pinto	City Hall	5.8
Mineral Wells	Palo Pinto	Water	4.0
Murphy	Collin	Municipal Building	1.3
Cities, Towns, Villages Total			\$82.2

Table A.6

Texas Local Government Defeated Propositions

Bond Elections November 07, 2017

			Amount
Issuer	County	Purpose	Defeated
Water Districts			
Galveston County MUD 12	Galveston	Water, Sewer & Drainage	\$4.4
Laguna Madre WD	Cameron	Water & Sewer	16.4
Water Districts Total			\$20.8
Community College Distrcits			
Alvin CCD	Brazoria	School Building & Technology	\$48.5
Community College Distrcits Total			\$48.5
Counties			
Val Verde County	Val Verde	Sports Complex	\$20.0
Webb County	Webb	Jail	125.0
Counties Total			\$145.0
Health & Hospital Districts			
Andrews County Hospital District	Andrews	Improvements	\$7.3
Health & Hospital Districts Total			\$7.3
Total Defeated			\$1,139.4
		•	_

Appendix B Texas Local Government Conduit Debt

Conduit, Component, and Related Organization debt has been excluded from this report, except for data presented in this appendix and certain data presented in *Appendix F, Commercial Paper*. A Conduit Issuer is usually a government agency or a creation of the agency (such as a nonprofit corporation sponsored by a local government) that issues municipal securities to finance revenue-generating projects. The funds generated are used by a third party (known as the "conduit borrower" or "obligor") for debt-service payments.

Most conduit debt is issued for projects that will benefit the public or segments of the public within the geographical area of the sponsoring agency. Some conduit issuers can issue debt for projects which benefit the Texas public at large. The purposes and locations of projects funded by conduit debt are governed by the Texas law used to establish the discrete conduit issuer. The projects include transportation, airports, ports, housing, utilities, culture, higher education, recreation, and health, as well as industrial and economic development.

Not all Texas local government conduit issuers are required to provide issuance information to the Bond Review Board (BRB) pursuant to Texas Government Code, Chapter 1202.008. However, basic information on all conduit issuances that require approval by the Office of the Attorney General (OAG) is forwarded by the OAG to the BRB. In prior years, this data was retained but not included in the BRB Debt Database. Beginning in fiscal year 2017, the BRB has added current conduit issuances into the database. There is an ongoing BRB project to enter conduit issuance data from prior years into the database as well. At the end of this project, all conduit debt outstanding from 2003 onwards will be included, based on data provided to the BRB in those years.

Conduit Debt Issuance

Currently, only 2017 and 2018 conduit debt issuance information is available (*Table B.1*). Conduit debt outstanding and debt service outstanding information will be reported once the project has been completed.

In 2018, 49 local government conduits issued 98 new debt instruments for a total of \$2.72 billion, a decrease of 39.9 percent from the \$4.54 billion issued in 2017. Of that decrease, 19.1 percent was in new money debt issuance (from \$2.50 billion in 2017 to \$1.64 in 2018) and 20.8 percent was in refunding debt issuance (from \$2.03 billion in 2017 to \$1.09 billion in 2018.

Conduit debt is generally backed by revenue. All of the conduit debt issued in the past two years was revenue debt, except for \$83.5 million of toll road combination tax/revenue bonds issued in 2017 by the Brazoria County Toll Road Authority.

City conduit entities issued \$1.39 billion in debt in 2018, 50.9 percent of the total 2018 conduit debt issued. \$845.4 million was new money debt and \$542.0 million was refunding debt. Such revenue debt is often issued as a loan to third parties to finance the acquisition of land, and to construct or expand, furnish and equip certain cultural, educational, housing, health-related or correctional facilities.

County conduit entities can issue revenue and lease-revenue debt. Some can issue tax-supported debt. Historically, county conduit revenue debt has been issued for pollution control and residential rental projects. Many county conduit lease-revenue obligations are issued by nonprofit corporations formed by counties to finance the acquisition of land and to construct or expand, furnish and equip county projects, including adult or juvenile correctional facilities that may house county, state or federal prisoners. In 2018, counties issued \$755.9 million in conduit debt, 27.7 percent of the total issued in 2018. About \$209.9 million was revenue new money debt, and \$546.0 million was revenue refunding debt.

Other Special Districts issued \$375.0 million in new money conduit debt, 13.8 percent of the total 2018 conduit debt issued.

Many Water Districts and Authorities (WDs) create conduit issuers to raise funds for pollution and solid waste disposal facilities. In 2018, WDs issued \$100.0 million in new money conduit debt, 3.7 percent of the total conduit debt issuance.

CCDs can execute lease-purchase agreements that provide security for lease-revenue obligations issued by nonprofit corporations formed by CCDs. In 2018, CCDs issued \$106.4 million in new money conduit debt, 3.9 percent of the total conduit debt issuance.

No conduit debt was issued in 2018 by Public School Districts or Health/Hospital Districts. (HHD conduit debt was last issued in 1985 and matured in 2011.)

Conduit entities also issue commercial paper. Commercial paper outstanding balances reported by conduits over the past 10 years are presented at the end of *Appendix F, Commercial Paper*.

Table B.1 shows 2018 conduit debt issuance by local government conduit type for the New Money/Refunding breakdown.

New Money Refunding Total Par Issued Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	2017 73 145 \$0.0 0.0 \$0.0 \$0.0 \$1,503.4 986.5 \$2,489.9 \$40.0 0.0 \$40.0	\$0.0 \$0.0 \$0.0 \$0.0 \$1,387.5 \$100.0 \$100.0	\$0.0 \$0.0 \$0.0 \$0.0 \$2,348.8 \$1,528.5 \$3,877.3 \$140.0 0.0
Issuances Public School Districts New Money Refunding Total Par Issued Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	\$0.0 0.0 \$0.0 \$0.0 \$1,503.4 986.5 \$2,489.9 \$40.0 0.0	\$0.0 0.0 \$0.0 \$845.4 542.0 \$1,387.5 \$100.0 0.0	\$0.0 0.0 \$0.0 \$2,348.8 1,528.5 \$3,877.3 \$140.0 0.0
Public School Districts New Money Refunding Total Par Issued Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	\$0.0 0.0 \$0.0 \$1,503.4 986.5 \$2,489.9 \$40.0 0.0	\$0.0 0.0 \$0.0 \$845.4 542.0 \$1,387.5 \$100.0 0.0	\$0.0 0.0 \$0.0 \$2,348.8 1,528.5 \$3,877.3 \$140.0 0.0
New Money Refunding Total Par Issued Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	0.0 \$0.0 \$1,503.4 986.5 \$2,489.9 \$40.0 0.0	\$0.0 \$0.0 \$845.4 542.0 \$1,387.5 \$100.0 0.0	0.0 \$0.0 \$2,348.8 1,528.5 \$3,877.3 \$140.0 0.0
Refunding Total Par Issued Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	0.0 \$0.0 \$1,503.4 986.5 \$2,489.9 \$40.0 0.0	\$0.0 \$0.0 \$845.4 542.0 \$1,387.5 \$100.0 0.0	0.0 \$0.0 \$2,348.8 1,528.5 \$3,877.3 \$140.0 0.0
Total Par Issued Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	\$0.0 \$1,503.4 986.5 \$2,489.9 \$40.0 0.0	\$0.0 \$845.4 542.0 \$1,387.5 \$100.0 0.0	\$0.0 \$2,348.8 1,528.5 \$3,877.3 \$140.0 0.0
Cities, Towns, Villages New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	\$1,503.4 986.5 \$2,489.9 \$40.0 0.0	\$845.4 542.0 \$1,387.5 \$100.0 0.0	\$2,348.8 1,528.5 \$3,877.3 \$140.0 0.0
New Money Refunding Total Par Issued Water Districts and Authorities New Money Refunding	986.5 \$2,489.9 \$40.0 0.0	\$1,387.5 \$1,00.0 0.0	1,528.5 \$3,877.3 \$140.0 0.0
Refunding Total Par Issued Water Districts and Authorities New Money Refunding	986.5 \$2,489.9 \$40.0 0.0	\$1,387.5 \$1,00.0 0.0	1,528.5 \$3,877.3 \$140.0 0.0
Total Par Issued Water Districts and Authorities New Money Refunding	\$2,489.9 \$40.0 0.0	\$1,387.5 \$100.0 0.0	\$3,877.3 \$140.0 0.0
Water Districts and Authorities New Money Refunding	\$40.0 0.0	\$100.0 0.0	\$140.0 0.0
New Money Refunding	0.0	0.0	0.0
Refunding	0.0	0.0	0.0
· · · · · · · · · · · · · · · · · · ·	\$40.0	\$100.0	¢1/0 0
Total Par Issued			\$14U.U
Other Special Districts and Authorities			
New Money	\$246.2	\$375.0	\$621.3
Refunding	0.0	0.0	0.0
Total Par Issued	\$246.2	\$375.0	\$621.3
Counties			
New Money	\$713.0	\$209.9	\$922.9
Refunding	1,047.2	546.0	1,593.2
Total Par Issued	\$1,760.2	\$755.9	\$2,516.1
Community College Districts			
New Money	\$0.0	\$106.4	\$106.4
Refunding	0.0	0.0	0.0
Total Par Issued	\$0.0	\$106.4	\$106.4
Health/Hospital Districts			
New Money	\$0.0	\$0.0	\$0.0
Refunding	0.0	0.0	0.0
Total Par Issued	\$0.0	\$0.0	\$0.0
Total New Money	\$2,502.6	\$1,636.8	\$4,139.4
Total Refunding	\$2,033.7	\$1,088.0	\$3,121.7
Total Par	\$4,536.3	\$2,724.8	\$7,261.1

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Appendix C Texas Charter Schools

History

Local government education finance corporations (EFC) issue the majority of charter school debt in Texas. These conduit corporations are created by Texas municipalities to issue debt on behalf of charter school borrowers. Debt issued by EFCs is secured by the revenues of the borrower and is not an obligation of the municipality. (Because debt issued by local government EFCs is not reported to the Bond Review Board (BRB), staff relied on multiple sources to compile the data used in this Appendix.)

Public charter schools were authorized by the legislature in 1995 to offer publicly funded alternate education options to parents within the public-school system. The Texas Education Code Chapter 12 provides for four types of charter schools: Home-Rule Charters, Campus or District Charters, Open-Enrollment Charters and University Charters. Most charters in Texas are open enrollment.

Open-enrollment charter schools function like public school districts in that they provide tuition-free instruction and must accept any student that applies, subject to enrollment constraints. Charter schools have no taxing authority and receive most of their funding from the state based on their enrollment. Charter schools are subject to fewer restrictions than public schools, but they must meet certain requirements for financial, governing, and operating standards adopted by the Texas Commissioner of Education (Commissioner). State law requires fiscal and academic accountability for charter schools, and the state monitors and accredits charter schools in the same manner as public-school districts.

Pursuant to Texas Education Code, Section 53.351, the Texas Public Finance Authority (TPFA) established the Texas Public Finance Authority Charter School Finance Corporation (Corporation) to act as a conduit to facilitate the issuance of revenue bonds for the acquisition, construction, repair or renovation of educational facilities for authorized open-enrollment charter schools. All issuances of charter school debt issued by the Corporation must be approved by the BRB.

Permanent School Fund Bond Guarantee Program

The Texas Permanent School Fund (PSF) was created in 1854 by the 5th Legislature expressly for the benefit of public schools. In addition, the Constitution of 1876 stipulated that certain lands and proceeds from the sale of those lands would also be dedicated to the PSF. The Constitution requires that distributions from the returns on the PSF be made to the Available School Fund to be used for the benefit of public schools, and allows the PSF to be used to guarantee bonds issued by public schools.

The PSF Bond Guarantee Program (BGP) was created in 1983 as an alternative for school districts to avoid the cost of private bond insurance by obtaining a PSF guarantee for voter-approved public-school bond issuances.

The Texas Education Agency (TEA) reviews each BGP applicant for financial soundness, accreditation status and complaints from the public regarding misconduct and rules violations. Applicants for the BGP must have an investment grade rating below triple-A from at least one of the top credit rating agencies. Bonds guaranteed by the BGP are rated AAA from all three credit rating agencies.

Texas Education Code, Section 12.135, passed by the 82nd Legislature, permits charter schools to participate in the BGP, but they must apply and be approved by the Commissioner to participate in the program. In January 2014, the State Board of Education adopted rules for charter school participation in the BGP, and the program was opened to them in March 2014.

The BGP capacity for all schools is currently set at the lower of a multiple of 3.50 times the PSF book value or the Internal Revenue Service-set limitation of \$117.3 billion, minus a 5 percent reserve. The State Board of Education has also required an additional 5 percent of charter capacity to be set aside as a reserve. Prior to fiscal year 2018, the capacity for charter schools was calculated using the available PSF capacity multiplied by the ratio of the number of charter school students to public school students determined annually by the Commissioner (currently set at 5.50 percent), applied against the available capacity of the BGP. The available capacity is defined as maximum allowable for guarantee, less total amount of outstanding guaranteed bonds, and less the State Board of Education established reserve on the total program. Effective September 1, 2017, the 85th Legislature amended the Educational Code, Section 45.0532 related to the calculation of the capacity of the bond guarantee program through Senate Bill 1480 (SB 1480). SB 1480 changes the charter capacity calculation formula to apply the ratio of charter students described above directly against the maximum allowable overall program guarantee net of the 5 percent reserve on the total program. This methodology is designed to be fully phased in over five years.

Charter School Closures

Senate Bill 2 passed in the 83rd Legislature in 2013 requires the mandatory revocation of a charter by the Commissioner if a charter school fails to meet academic or financial accountability performance ratings for the preceding three school years. As a result of this legislation, 20 charter school revocations have occurred between 2014 and 2018.

As of November 30, 2018, a total of \$4.04 billion of debt had been issued for charter schools by EFCs of which an estimated \$2.88 billion is currently outstanding. *Table C.1* shows total EFC issuances since the inception of the BGP.

Table C.1								
Total Charter School Debt by Issuer								
As of November 30	As of November 30, 2018							
Issuer	Par Issued	Par Outstanding	% Outstanding					
Clifton Higher Education Finance Corporation	\$ 1,509,695,213	\$ 1,051,645,213	69.7%					
Arlington Higher Education Finance Corporation	914,339,000	870,565,000	95.2%					
Houston Higher Education Finance Corp, City of	407,366,600	325,856,600	80.0%					
Texas Public Finance Auth Charter School Finance Corp	353,320,000	146,847,780	41.6%					
La Vernia Higher Education Finance Corp	202,390,000	36,265,000	17.9%					
Newark Higher Education Finance Corporation	138,235,000	135,460,000	98.0%					
Danbury Higher Education Authority, Inc.	88,752,000	45,592,000	51.4%					
North Texas Education Finance Corporation	80,780,000	74,300,000	92.0%					
San Juan Higher Education Finance Authority	43,955,000	10,895,000	24.8%					
Pottsboro Higher Education Finance Corporation	43,560,000	42,410,000	97.4%					
Anson Education Facilities Corp	34,465,000	12,709,513	36.9%					
Pharr Higher Education Finance Authority, City of	29,625,000	-	0.0%					
Beasley Higher Education Finance Corp	25,405,000	8,803,226	34.7%					
New Hope Cultural Education Facilities Finance Corporation	21,330,000	21,195,000	99.4%					
Travis Co Cultural Education Facilities Finance Corp	20,865,000	18,840,000	90.3%					
Tom Green Co Cultural Education Facilities Finance Corporation	17,170,000	16,145,000	94.0%					
Cameron Education Corp, City of	16,640,000	13,275,000	79.8%					
Heart of Texas Education Finance Corp	14,835,000	8,440,000	56.9%					
Orchard Higher Education Finance Corp	11,330,000	-	0.0%					
Hackberry Cultural Education Facilities Finance Corporation	8,575,000	8,185,000	95.5%					
Waxahachie Education Finance Corporation	6,515,000	6,515,000	100.0%					
Northeast Higher Education Facilities Corp	6,330,000	5,905,000	93.3%					
Clyde Education Facilities Corporation	6,240,000	5,445,000	87.3%					
Fate Higher Education Facilities Corp	6,000,000	-	0.0%					
Dickinson Education Facilities Corp	5,455,000	-	0.0%					
Creedmoor Education Facilities Corporation	5,440,000	4,585,203	84.3%					
Austin Achieve Public Schools Inc	5,160,000	5,160,000	100.0%					
Crawford Education Facilities Corp	4,800,000	-	0.0%					
Hilshire Village Higher Education Finance Corporation	4,123,000	3,978,000	96.5%					
Ames Higher Education Facilities Corporation	2,600,000	2,408,394	92.6%					
Bryan Higher Education Authority, Inc., City of	2,500,000	-	0.0%					
Total	\$ 4,037,795,813	\$ 2,881,425,929	71.4%					

Of the \$2.88 billion of charter school debt outstanding as of November 30, 2018, an estimated \$1.70 billion was guaranteed by the PSF. *Table C.2* shows charter school debt guaranteed by the PSF.

Table C.2			
Charter School Debt Outstanding Guaranteed by the Perman	ent School Fund as of	November 30, 20	018
		PSF Guaranteed Debt	
Charter School	Total Par Outstanding	Outstanding	% PSF Guaranteed
IDEA Academy, Inc.	\$735,790,000	\$595,660,000	81.0%
Uplift Education	376,865,000	138,700,000	36.8%
Harmony Public Schools	374,090,000	300,630,000	80.4%
KIPP, Inc.	220,400,000	220,400,000	100.0%
International Leadership of Texas	165,995,213		0.0%
Responsive Education Solutions	124,050,000	124,050,000	100.0%
LIFESCHOOL of Dallas	88,175,000	88,175,000	100.0%
YES Prep Public Schools	81,761,600		0.0%
KIPP Austin Public Schools, Inc.	67,113,000	67,113,000	100.0%
Orenda Education	43,565,000	38,315,000	87.9%
Austin Achieve Public Schools, Inc.	40,210,000		0.0%
Trinity Basin Preparatory	35,548,226	26,745,000	75.2%
Wayside Schools	35,305,000		0.0%
Meridian World School, LLC	28,830,000		0.0%
LTTS Charter School, Inc. d/b/a Universal Academy	28,420,000		0.0%
Golden Rule Schools, Inc.	28,270,000	28,270,000	100.0%
A.W. Brown Fellowship Charter School	27,505,000	27,505,000	100.0%
Eagle Advantage Schools, Inc.	24,195,000	19,865,000	82.1%
Arlington Classics Academy	23,325,000		0.0%
Tejano Center for Community Concerns, Inc Raul Yzaguirre School for Success Project	22,785,000		0.0%
UMEP Inc	22,490,000		0.0%
Imagine International Academy of North Texas, LLC	21,970,000		0.0%
Village Tech Schools	20,515,000		0.0%
Leadership Prep School	19,025,000		0.0%
TLC Academy	18,553,394		0.0%
A+ Charter Schools, Inc.	18,130,000		0.0%
Newman International Academy	17,915,000		0.0%
Odyssey Academy	16,735,000	11,735,000	70.1%
Citiscape Schools Inc.	14,865,000	1-1,100,000	0.0%
Faith Family Academy Charter School	13,275,000		0.0%
Ser-Ninos, Inc.	12,129,513		0.0%
Aristoi Classical Academy	11,130,000		0.0%
Educational Resource Center, Inc.	9,215,000		0.0%
Gateway Charter Academy	8,440,000		0.0%
Shekinah Learning Institute Project	8,250,000		0.0%
Coram Deo Academy Project	8,185,000		0.0%
Riverwalk Education Foundation, Inc.	8,107,000	8,107,000	100.0%
Winfree Academy Charter School		6,107,000	0.0%
· ·	7,435,000		
School of Excellence in Education Project	7,150,000		0.0%
Charter School Revenue	6,540,000		0.0%
Beta Academy	6,330,000		0.0%
New Frontiers Charter School	5,880,000		0.0%
Evolution Academy Charter School	5,805,000		0.0%
Nova Academy	5,445,000	5,445,000	100.0%
Coram Deo Academy	5,290,000		0.0%
St. Michael's Academy	4,585,203		0.0%
South Texas Educational Technologies, Inc.	4,052,780		0.0%
El Paso Education Initiative, Inc.	1,785,000		0.0%
Total	\$2,881,425,929	\$1,700,715,000	59.0%

Appendix D Cost of Issuance

For fiscal year 2018, the total aggregated cost of issuance (COI), including underwriter's spread for both competitive and negotiated bond sales among Texas local government debt issuers, was \$419.6 million. It was comprised of total direct bond costs of \$248.0 million and total underwriter's spread of \$171.6 million (*Table D.1*).

The largest components of total direct bond costs are fees for financial advisor, bond counsel and rating agencies, which totaled \$78.2 million, \$75.7 million and \$26.1 million, respectively. Other direct bond related costs were \$68.0 million and include fees for bond insurance, paying agent, trustee and escrow verification, miscellaneous bond program fees and various smaller fees.

Total underwriter's spread is comprised of the takedown fee, management fee, underwriter's counsel fee and spread expenses which totaled \$134.5 million, \$15.3 million, \$10.7 million and \$11.2 million, respectively.

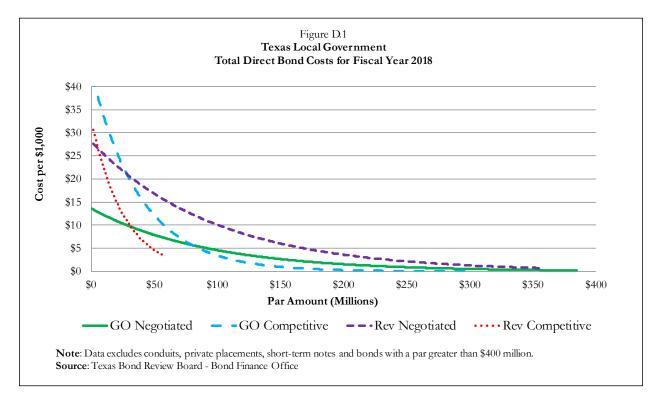
Table D.1					
Texas Local Government Total Cost of Issuance for Fiscal Year 2018					
Financial Advisor Fees	\$	78,183,712			
Bond Counsel Fees		75,668,243			
Ratings Fees		26,139,524			
Other Direct Bond Related Costs		68,008,258			
Total Direct Bond Related Costs	\$	247,999,737			
Takedown Fee		134,483,251			
Management Fee		15,287,102			
Underwriter's Counsel Fee		10,656,564			
Spread Expenses Fee		11,196,501			
Total Underwriter's Spread*	\$	171,623,416			
Total COI including UW Spread \$ 419,623,153					
Note: Excludes conduits, private placement					
Source: Texas Bond Review Board - Bond Finance Office.					

Trends in Issuance Costs for Texas Local Government Bonds in 2018

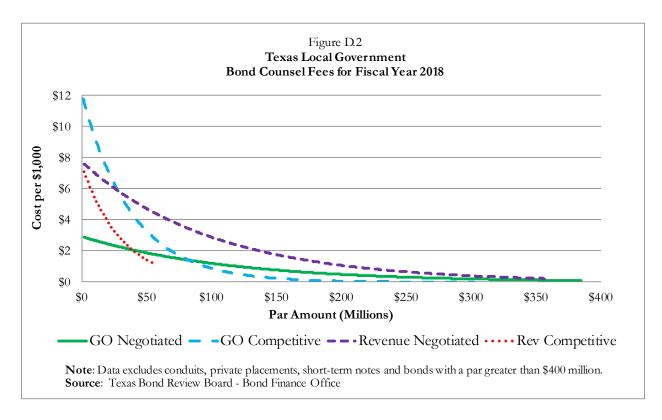
Total direct bond costs include all cost of issuance fees except the underwriter's spread. To analyze these fees on a cost per \$1,000 basis for fiscal year 2018, each major cost of issuance component has been compared by bond type (general obligation vs. revenue) and by method of sale (negotiated vs. competitive) (Figures D.1, D.2, D.3, D.4, and D.5).

Excluding issuances of conduit debt, private placement debt and short-term notes, data was collected from 969 transactions for fiscal year 2018 of which 531 were competitive and 438 were negotiated.

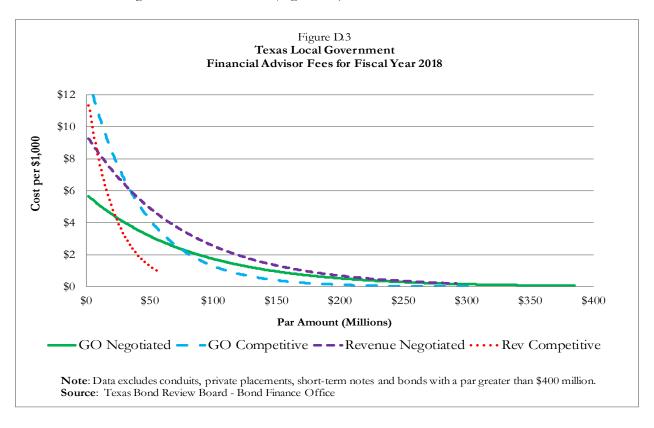
Of the competitive transactions, 497 were general obligation and 34 were revenue issuances. Of the negotiated transactions, 339 were general obligation and 99 were revenue transactions. The data indicates that cost per \$1,000 for all transactions declined as transaction size increased. General Obligation (GO) competitive transactions had the highest cost per \$1,000 for transactions less than \$50.0 million - 476 of the 497 GO competitive transactions were issued for less than \$50.0 million in fiscal year 2018. Generally speaking, cost per \$1,000 decreased as transaction size increased. GO negotiated and GO competitive transactions mostly had lower cost per \$1,000 for transaction sizes over \$100 million (Figure D.1).



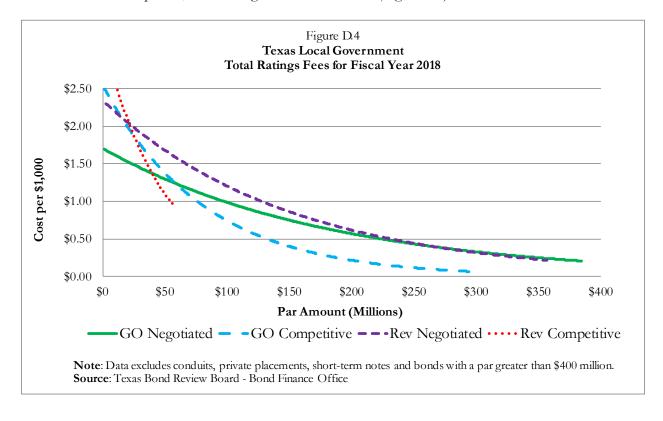
Data for bond counsel cost per \$1,000 for fiscal year 2018 indicates that GO competitive transactions had the highest cost per \$1,000 for smaller transaction sizes. GO negotiated and GO competitive transactions generally had the lowest cost per \$1,000 for transaction sizes larger than \$100.0 million (Figure D.2).



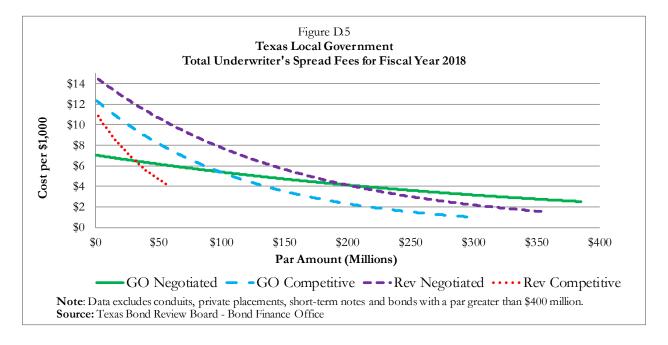
Data for financial advisor cost per \$1,000 indicates that GO competitive transactions had the highest cost per \$1,000 for smaller transaction sizes. Revenue negotiated had the highest cost per \$1,000 for transaction sizes larger than \$50.0 million (Figure D.3).



Data for total ratings cost per \$1,000 indicates that GO negotiated transactions had the lowest cost per \$1,000 for smaller transaction sizes. Both GO competitive and revenue negotiated transactions had the lowest cost per \$1,000 for larger transaction sizes (Figure D.4).



Data for total underwriter's spread cost per \$1,000 indicates that revenue negotiated transactions had the highest cost per \$1,000 for smaller transaction sizes. GO negotiated transactions had the lowest cost per \$1,000 for transaction sizes less than \$50.0 million (Figure D.5).



2018 Local Texas Governments Cost of Issuance Statistical Information

Table D.2 provides COI statistical information for general obligation and revenue transactions completed during fiscal year 2018.

The weighted average for Total COI including underwriter's spread decreased to \$14.97 per \$1,000 in 2018 from \$16.07 per \$1,000 in 2017. The average transaction size and average fee increased to \$28.9 million and \$433,048 in 2018 from \$22.1 million and \$355,585 in 2017, respectively.

Table D.2 Texas Local Government Cost of Issuance Statistics Summary for Fiscal Year 2018

						-				,	Total COI
	7	Total Direct	В	ond Counsel		Financial	Ί	otal Ratings	Total UW	In	cluding UW
]	Bond Costs		Fees	Ι	Advisor Fees		Fees	Spread Fees		Spread
GO Negotiated											
Count		339		334		333		331	339		339
Average Par	\$	41,113,235	\$	41,522,954	\$	36,195,185	\$	42,040,609	\$ 41,113,235	\$	41,113,235
Average Fee	\$	186,748	\$	50,711	\$	73,665	\$	38,135	\$ 212,966	\$	399,713
Minimum (\$ per 1,000)		0.89		0.04		0.42		0.15	1.18		4.64
Maximum (\$ per 1,000)		76.94		30.00		34.67		6.89	24.75		100.12
Median (\$ per 1,000)		8.94		1.70		3.68		1.29	6.29		15.13
Average (\$ per 1,000)		4.54		1.22		2.04		0.91	5.18		9.72
GO Competitive											
Count		497		493		493		396	496		497
Average Par	\$	11,836,481	\$	11,883,917	\$	11,894,688	\$	13,731,745	\$ 11,846,625	\$	11,836,481
Average Fee	\$	268,385	\$	85,752	\$	80,715	\$	19,999	\$ 112,691	\$	380,849
Minimum (\$ per 1,000)		2.34		0.67		0.66		0.41	0.54		3.83
Maximum (\$ per 1,000)		229.56		36.31		29.30		20.00	53.44		251.97
Median (\$ per 1,000)		57.13		20.00		17.50		2.15	12.06		73.58
Average (\$ per 1,000)		22.67		7.22		6.79		1.46	9.51		32.18
Rev Negotiated											
Count		99		99		90		65	99		99
Average Par	\$	77,607,466	\$	77,607,466	\$	62,231,713	\$	113,779,154	\$ 77,607,466	\$	77,607,466
Average Fee	\$	443,139	\$	141,586	\$	127,615	\$	71,560	\$ 397,609	\$	840,748
Minimum (\$ per 1,000)		1.30		0.54		0.17		0.18	2.80		4.83
Maximum (\$ per 1,000)		76.85		26.90		27.84		19.85	36.55		108.85
Median (\$ per 1,000)		17.00		3.60		6.36		1.30	6.93		24.19
Average (\$ per 1,000)		5.71		1.82		2.05		0.63	5.12		10.83
Rev Competitive											
Count		34		34		34		30	34		34
Average Par	\$	15,599,118	\$	15,599,118	\$	15,599,118	\$	17,022,167	\$ 15,599,118	\$	15,599,118
Average Fee	\$	218,659	\$	71,705	\$	69,867	\$	31,528	\$ 122,643	\$	341,302
Minimum (\$ per 1,000)		4.19		0.80		1.49		0.82	1.93		8.37
Maximum (\$ per 1,000)		61.08		30.00		32.71		7.57	24.32		85.39
Median (\$ per 1,000)		17.72		2.80		6.29		2.10	8.47		26.41
Average (\$ per 1,000)		14.02		4.60		4.48		1.85	7.86		21.88
Total											
Count		969		960		950		822	968		969
Average Par	\$	28,930,471	\$	29,105,153	\$	25,314,002	\$	33,162,436	\$ 28,953,328	\$	28,930,471
Average Fee	\$	255,934	\$	78,821	\$	82,299	\$	31,800	\$ 177,297	\$	433,048
Minimum (\$ per 1,000)		0.89		0.04		0.17		0.15	0.54		3.83
Maximum (\$ per 1,000)		229.56		36.31		34.67		20.00	53.44		251.97
Median (\$ per 1,000)		17.46		3.45		7.84		1.67	7.96		25.16
Average (\$ per 1,000)		8.85		2.71		3.25		0.96	6.12		14.97

Note: Data excludes conduits, private placements and short-term notes.

Source: Texas Bond Review Board - Bond Finance Office

Appendix E Build America Bonds

Build America Bonds (BAB) were created by the American Recovery and Reinvestment Act of 2010 and could be issued as Tax Credit BABs or Direct-Payment BABs. Tax Credit BABs provide a tax credit subsidy to investors equal to 35 percent of the interest payable by the issuer. Direct-Payment BABs provide a direct federal subsidy payment to state and local governmental issuers equal to 35 percent of the interest payable. Authority to issue BABs expired in December 2010.

Under the Budget Control Act of 2011, across-the-board sequestration took effect on March 1, 2013, and direct-pay bonds such as BABs experienced a 8.7 percent reduction of the original 35 percent federal subsidy on BABs interest payments. The Internal Revenue Service reported that effective October 1, 2014, issuers of BABs and other direct-pay bonds would have their subsidy payments processed in federal fiscal year 2015 reduced by 7.3 percent. In federal fiscal years 2016, 2017 and 2018 the subsidy payments were further reduced by 6.8 percent, 6.9 percent and 6.6 percent, respectively. In federal fiscal year 2019, the subsidy payments are expected to be reduced by 6.2 percent.

During fiscal years 2010-2011, 63 local government issuers issued \$10.96 billion in Direct-Payment BABs. Of that amount, \$10.23 billion was issued for new-money purposes and \$728.5 million was issued for refunding purposes. Local governments in Texas accounted for approximately 6.0 percent of the total national BAB issuance of \$181.26 billion. As of August 31, 2018, BAB debt outstanding was \$9.74 billion or 4.2 percent of total local debt outstanding (*Table E.1*).

Table E.1 Texas Local Government Build America Bond Debt Outstanding (\$ in millions)				
Government Type	Amount			
Public School Districts	\$3,186.6			
Other Special Districts and Authorities	2,792.1			
Cities, Towns, Villages	1,994.8			
Health/Hospital Districts	1,203.3			
Counties	336.0			
Water Districts and Authorities	227.9			
Community and Junior Colleges	-			
Total	\$9,740.7			
Includes debt secured by a combination of ad valorem taxes and other revenue sources. Excludes conduit debt. Source: Texas Bond Review Board - Bond Finance Office				

The top five local governments with outstanding BABs account for over 50 percent of the total BAB debt outstanding (*Table E.2*).

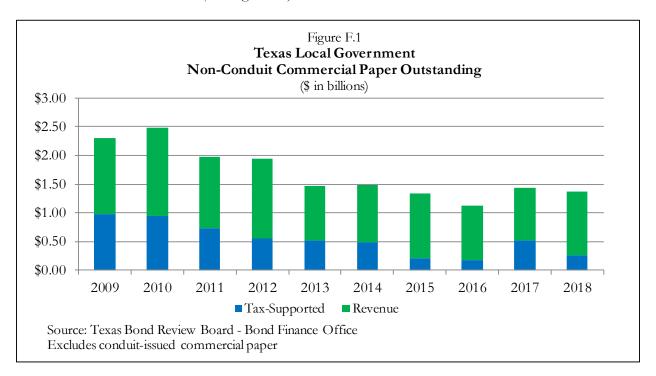
Table E.2 Texas Local Government Top 5 Issuers With Build America Bond Debt Outstanding						
(\$ in millions) Issuer	Pri	incipal				
Dallas Area Rapid Transit	\$	1,559				
San Antonio		1,256				
North Texas Tollway Authority		1,135				
Dallas ISD		947				
Dallas County Hospital District		650				
Top 5 Total	\$	5,548				
Total BAB Debt Outstanding	\$	9,741				
Top 5 Issuers % of Total BAB Debt Outstanding		57.0%				
Excludes conduit debt.						
Source: Texas Bond Review Board - Bond Finance Office		Source: Texas Bond Review Board - Bond Finance Office				

Appendix F Commercial Paper

Commercial Paper (CP) is an unsecured debt instrument that matures within 270 days and is backed by a liquidity provider, usually a bank, that stands by to provide liquidity in the event CP notes are not remarketed or redeemed at maturity. Debt that matures in less than 270 days does not require registration with the SEC, so it is less costly to the issuer. Since CP is not backed by collateral, only issuers with solid ratings from the major credit rating agencies will be able to offer their CP at reasonable prices. CP generally carries lower interest repayment rates than bonds due to the shorter maturities of CP.

Local governments and their conduit corporations issue CP to provide interim financing for projects for which revenues are not yet available. Texas local governments are not required to provide the BRB with CP issuance information but are required to report new CP programs to the Office of the Attorney General, which forwards such information to the BRB. Current CP balances are obtained by contacting local governments who have had CP programs in prior years or who have opened new CP programs in 2018. Because some local governments reported in the past that they terminated or inactivated their CP programs in favor of various revolving credit, direct purchase agreements or lines of credit with banking institutions, the BRB asked all CP contacts to report such non-public debt outstanding along with their CP outstanding balances beginning in 2017. CP data provided in this Appendix includes any reported non-public debt outstanding.

Non-conduit issued CP can be supported by pledges of tax or revenue. The 2018 reported non-conduit CP total of \$1.37 billion showed a 10-year decrease of 40.8 percent from \$2.31 billion in 2009, a five year decrease of 7.9 percent from \$1.48 billion in 2014, and a 4.9 percent decrease from the 2017 total of \$1.44 billion (see *Figure F.1*).

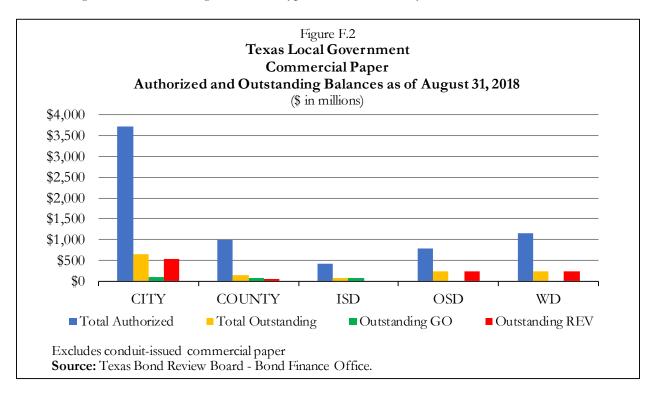


Local government CP outstanding is shown by pledge type for each of the last five fiscal years in *Table F.1*.

	Tabl	e F.1			
	Texas Local	Government	t		
Commercia	l Paper Outs	standing by I	Fiscal Year*		
	(\$ in m	nillions)			
	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>	<u>2018</u>
Public School Districts					
Tax-Supported GO	\$100.0	\$8.1	\$0.0	\$144.5	\$72.1
M&O (Tax-Supported)	0.0	20.0	0.0	0.0	0.0
Total Commercial Paper Balance	\$100.0	\$28.1	\$0.0	\$144.5	\$72.1
Cities					
Tax-Supported GO	\$63.6	\$156.9	\$144.9	\$285.2	\$109.5
Revenue	425.2	499.5	369.5	334.4	540.9
Sales Tax Revenue	0.0	0.0	0.0	9.7	6.6
Total Commercial Paper Balance	\$488.7	\$656.4	\$514.4	\$629.3	\$657.0
Water Districts					
Tax-Supported GO	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Revenue	114.9	218.7	192.3	182.9	246.7
Total Commercial Paper Balance	\$114.9	\$218.7	\$192.3	\$182.9	\$246.7
Other Special Districts					
Tax-Supported GO	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Revenue	121.7	86.0	89.1	100.1	0.0
Sales Tax Revenue	333.4	321.3	287.4	286.4	241.1
Total Commercial Paper Balance	\$455.1	\$407.3	\$376.5	\$386.5	\$241.1
Counties					
Tax-Supported GO	\$324.4	\$24.2	\$36.7	\$93.7	\$83.2
Revenue	0.0	0.0	0.0	0.0	66.5
Total Commercial Paper Balance	\$324.4	\$24.2	\$36.7	\$93.7	\$149.7
Community College Districts					
Tax-Supported GO	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Revenue	0.0	0.0	0.0	0.0	0.0
Total Commercial Paper Balance	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Health/Hospital Districts					
Tax-Supported GO	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Revenue	0.0	0.0	0.0	0.0	0.0
Total Commercial Paper Balance	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
Total Tax-Supported GO	\$487.9	\$189.2	\$181.6	\$523.4	\$264.8
Total Tax-Supported M&O	0.0	20.0	0.0	0.0	0.0
Total Revenue	661.8	804.3	650.9	617.4	854.2
Total Sales Tax Revenue	333.4	321.3	287.4	296.1	247.7
Total Commercial Paper Balance	\$1,483.1	\$1,334.7	\$1,119.9	\$1,437.0	\$1,366.6
	Ψ1,703.1	Ψ1,337./	Ψ19117.7	Ψ1,ΤJ/.0	Ψ1,500.0
*Excludes conduit debt					
Source: Texas Bond Review Board - I	Bond Finance	Office			

As of 2018 fiscal year-end, six Cities reported CP and/or non-public debt authorized and/or outstanding. Also reporting balances were one county, three Independent School Districts (ISDs), two Other Special Districts (OSDs) and two Water Districts (WDs). Additionally, four city conduit issuers and one water district conduit issuer reported balances. No Community/Junior College Districts (CCDs) or Hospital Districts (HHDs) reported authorized or outstanding balances as of year-end.

Figure F.2 shows the difference between the total amount of authorized CP and the reported outstanding balances for each government type as of 2018 fiscal year-end.



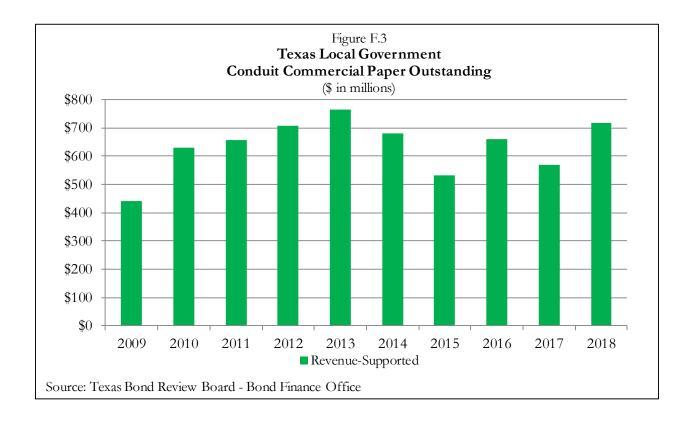
Of the Big 6 Texas Cities (Austin, Dallas, El Paso, Fort Worth, Houston and San Antonio), five had outstanding non-conduit CP balances as of August 31, 2018.

Table F.2 shows outstanding CP balances for the Big 6 cities over the past five years.

Table F.2 Texas "BIG 6" Cities Commercial Paper Outstanding* (\$ in millions)									
			2014		2015		2016	2017	2018
Austin	Tax-Supported	\$	-	\$	-	\$	-	\$ -	\$ -
	Revenue		194.4		200.6		103.7	141.4	243.2
Dallas	Tax-Supported		13.7		-		-	9.7	-
	Revenue		129.1		74.2		43.8	10.0	163.7
El Paso	Tax-Supported		-		-		-	30.7	23.5
	Revenue		-		-		-	-	-
Fort Worth	Tax-Supported		-		-		-	-	-
	Revenue		-		-		-	-	-
Houston	Tax-Supported		29.9		146.9		134.9	244.9	80.0
	Revenue		61.5		179.5		147.0	107.0	100.5
San Antonio	Tax-Supported		-		-		-	-	-
	Revenue		25.2		25.2		-	15.8	12.7
Total Tax	x-Supported	\$	43.6	\$	146.9	\$	134.9	\$ 285.2	\$ 103.5
Total Rev	venue	\$	410.2	\$	479.5	\$	294.5	\$ 274.2	\$ 520.1
Total Ou	tstanding	\$	453.7	\$	626.4	\$	429.4	\$ 559.4	\$ 623.6

^{*}Does not reflect total authorization amount; excludes conduit commercial paper. Source: Texas Bond Review Board - Bond Finance Office

As conduit issuers generally have no taxing authority, most conduit issued CP is revenue supported. The 2018 reported conduit CP total of \$718.0 million showed a 10-year increase of 62.7 percent from \$441.2 million in 2009, a five year increase of 5.6 percent from \$680.2 million in 2014, and an increase of 25.8 percent from the 2017 total of \$570.9 million (Figure F.3).



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Appendix G

Overview of Texas Local Governments with Debt Outstanding

Debt Outstanding totals shown in this Appendix and in the annual report include commercial paper issued by local governments but do not include debt issued by conduit entities created by local governments. See *Appendix B, Conduit Debt* for conduit debt information.

Texas Community and Junior College Districts

Community and Junior College Districts (CCDs) are two-year institutions that primarily serve local taxing jurisdictions and offer vocational, technical and academic courses for certifications or associates degrees. CCDs are governed under the Texas Education Code, Chapter 130. As of August 31, 2018, total CCD debt outstanding was 2.3 percent (\$5.26 billion) of total local debt outstanding.

CCDs issue both tax-supported and revenue debt. Proceeds from CCD debt issuances are used to construct, equip, renovate, expand and improve facilities, acquire information technology equipment and refund outstanding debt. Debt service is paid from either an ad valorem tax or various revenue streams such as tuition, technology and miscellaneous fees or lease revenue. Additionally, CCDs create nonprofit conduit entities to issue debt on behalf of, and for projects to benefit, the CCDs. Most of CCD new obligations are authorized under Chapters 45 and 130 of the Texas Education Code.

Texas Cities, Towns and Villages

Texas cities, towns and villages (Cities) issue both tax-supported and revenue debt. Revenue debt also includes sales tax and lease-revenue obligations. As of August 31, 2018, total city debt outstanding was 32.7 percent (\$75.25 billion) of total local debt outstanding.

Tax-supported debt financing is used for authorized municipal purposes, such as the acquisition of vehicles, road maintenance equipment, road construction and maintenance materials; construction of road and bridge improvements; maintaining public safety (police, fire and EMS); renovation, equipping and construction of city buildings and utility systems; acquisition of real property; and the acquisition of computer equipment and software. Most of Cities new ad valorem tax debt is authorized under Chapters 1331 and 1502 of the Government Code and Chapter 271 of the Local Government Code.

Revenue debt financing is used for such purposes as acquiring, constructing, enlarging, remodeling and renovating authorized municipal systems and infrastructure, such as wastewater and sewer systems, toll roads, and airports.

Cities also issue debt that is supported by a combination of tax and revenue for similar purposes listed above. Such debt is categorized as tax-supported.

Sales tax revenue debt is issued by certain cities for such purposes as constructing and improving municipal parks and recreation facilities/entertainment centers as well as hike and bike trails.

Cities can form nonprofit conduit entities to issue debt for the benefit of the city, as well as to finance the acquisition of land and construction of certain correctional facilities. Pursuant to Texas Government Code, Chapter 1202.008 the BRB does not receive issuance information for all lease-

revenue obligations or conduit issuances. Reported data only reflects the amount of debt issued for certain municipalities.

Texas Counties

Counties issue two types of debt, tax-supported and revenue, which also includes lease-revenue. As of August 31, 2018, county debt was 6.1 percent (\$14.10 billion) of total local debt outstanding.

Tax-supported debt is used for authorized county purposes such as the acquisition of vehicles, road maintenance equipment, road construction and maintenance materials; construction of road and bridge improvements; renovation, equipping and construction of county buildings and jails; acquisition of real property; and the acquisition of computer equipment and software. Most of county new ad valorem tax debt is authorized under Chapters 1301 and 1473 of the Government Code and Chapter 271 of the Local Government Code.

Revenue debt is used for authorized county purposes such as acquiring, constructing, enlarging, remodeling and renovating wastewater and sewer systems, toll roads, and hospitals.

Counties create nonprofit conduit entities to issue debt for projects that benefit the county.

Texas Health/Hospital Districts and Authorities

Health/Hospital districts and authorities (HHDs) provide a legal framework to create hospital systems to provide hospital and medical care facilities, emergency services and mental health services to district residents. As of August 31, 2018, HHD debt outstanding was 1.6 percent (\$3.67 billion) of total local debt outstanding.

HHD tax-supported and revenue debt is used to construct, acquire and/or improve buildings for hospital, fire, emergency and mental health facilities. HHDs can create conduit entities to issue debt on their behalf.

BRB collects debt information on four types of hospital, health and public safety districts: hospital districts (HD), hospital authorities (HA), emergency services districts (ESD) and mental health mental retardation centers (MHMR). They are described as follows:

		Voter	
		Approved	Authorizing Texas
		/Taxing	Health and Safety
District	Purpose	Authority	Code Chapter
Hospital	Creates hospital systems to provide hospital and	Yes/Yes	Chapters 281, 282 or
Districts	medical care facilities. HDs must be voter		283
	approved and have taxing authority.		
Hospital	Creates hospital systems to provide hospital and	No/No	Chapter 262
Authorities	medical care facilities. HAs are created by a		
	municipality's governing board, do not require		
	voter approval and do not have taxing authority.		
Emergency	Provides rural fire prevention and emergency	Yes/Yes	Chapter 775
Service	medical services. ESDs must be voter approved		
Districts	and have taxing authority.		

Mental	Provides child, adolescent and adult mental	No/No	Chapter 534
Health &	health services; substance abuse recovery		_
Mental	services; and skills training. MHMRs do not		
Retardation	require voter approval and do not have taxing		
	authority.		

Texas Public School District Debt

Much of school district debt is authorized under Chapter 45 of the Texas Education Code. School districts issue four types of debt: voter-approved, maintenance and operations (M&O), lease-revenue, and revenue. Charter school debt issued by nonprofit corporations is not included in school district debt. As of August 31, 2018, total school district debt outstanding was 36.6 percent (\$84.16 billion) of total local debt outstanding.

Over 98.3 percent of school district debt outstanding is voter-approved. The proceeds from voter-approved debt can be used for school capital projects such as buildings, renovations, technology, athletic facilities, school transportation and performing arts or to refund M&O debt. Voter-approved debt is subject to the 50-cent test that limits debt service (interest and sinking fund payments) to a maximum of \$0.50 per \$100 of valuation as described in the Texas Education Code, Section 45.0031. This debt must be approved by the voters prior to a school district issuing new debt.

M&O debt proceeds can be used for administration and operational costs of schools (teachers, buses, classrooms, etc.) but cannot be used for the new construction of school facilities. Tax rates for M&O debt are generally limited to a maximum of \$1.50 per \$100 valuation under Chapter 45 of the Texas Education Code. For M&O debt, only the maintenance tax is approved by the voters; once the voters approve the maintenance tax and the maximum rate, the maintenance tax debt may be issued without an election.

Lease-revenue obligations are issued by a public facility corporation created by a school district and used for acquiring, constructing and equipping school facilities.

Proceeds from revenue debt issuances are mainly used to build and maintain sports facilities. Revenue and lease-revenue debt do not require voter approval.

Texas Other Special Districts and Authorities

Other Special Districts and Authorities (OSD) include tollway authorities, transit authorities, housing authorities, regional mobility authorities, power agencies, public utility agencies, road districts, events venue districts, education districts and various economic and community development districts. As of August 31, 2018, total OSD debt outstanding was 7.6 percent (\$17.37 billion) of total local debt outstanding.

OSDs issue both tax-supported and revenue debt including sales tax revenue and lease-revenue debt. OSD tax-supported and revenue debt are both used primarily for road improvements, economic and community development, water and sewer improvements, and developing and maintaining mass transportation systems. OSDs create conduit entities to issue debt on their behalf and for their benefit.

The table below shows the various types of OSDs in the state.

District	Purpose					
Economic and Community	Community development, redevelopment and strategic					
Development District	planning; public improvements necessary to serve the district.					
Education Districts	Provide services to the school districts and are funded by					
	education taxes at the county and the school district levels.					
Events Venue Districts	Items related to creating and maintaining venues.					
Housing Authorities	Programs to provide affordable housing.					
Power Agencies	Improvements to the electric transmission service.					
Public Utility Agencies	An agency created by two or more public entities to plan,					
	finance, construct, own, operate, or maintain facilities.					
Regional Mobility Authorities	Constructing and maintaining highways, tollways, ferries,					
	airports, bikeways, and all-purpose transportation centers.					
Road Districts	Constructing and maintaining roads.					
Tollway Authorities	Develop, construct and maintain toll roads.					
Transit Authorities	Public transportation.					

Texas Water Districts and Authorities

Texas Water Districts and Authorities (WDs) are local governmental entities that provide limited water-related services to customers and residents. WDs can be created by the Texas Commission on Environmental Quality, a county commissioner's court or the legislature. WDs issue both tax-supported and revenue debt. (See generally, Texas Water Code, Chapters 49, 51, 54, 65, and Subtitle G of the Special District Local Laws Code). As of August 31, 2018, total WD debt outstanding was 13.1 percent (\$30.19 billion) of total local debt outstanding.

Texas has many types of WDs. The five most common types that provide services to residential customers are: municipal utility districts (MUD), water control and improvement districts (WCID), special utility districts (SUD), river authorities (RA) and Utility & Reclamation District (U&RD). The function of each is described below.

District	Purpose	Authorizing Water Code Chapter
Municipal Utility	Provides waterworks systems, sanitary	Chapters 49 and 54
Districts	sewer systems and drainage systems	
Water Control	Supplies and stores water for domestic,	Chapters 49 and 51
and	commercial and industrial use; operates	
Improvement	wastewater systems; and provides	
Districts	irrigation, drainage and water quality	
	controls	
Special Utility	Provides water, wastewater and fire-	Chapters 49 and 65
Districts	fighting services	
River Authorities	Operates major reservoirs and sells	Chapter 30
	untreated water on a wholesale basis.	
	Provides for flood control, soil	
	conservation and water quality protection	

Utility and	Provides conservation and development
Reclamation	of all the natural resources within the
Districts	district

Tax-supported and revenue debt issued by WDs is used to pay capital costs to engineer, construct, acquire and/or improve water plants, wastewater treatment facilities and sewer system drainage. Certain WDs can also issue tax debt for road and park construction and create conduit entities to issue conduit revenue debt for pollution control facilities for private entities.

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Appendix H Glossary

Ad Valorem Tax – A tax based on the assessed value of real estate or personal property. Property ad valorem taxes are a major source of revenue for local governments.

Advance Refunding – A refunding in which the refunded obligation remains outstanding for a period of more than 90 days after the issuance of the refunding issue. The Tax Cuts and Jobs Act of 2017 eliminated the option of issuing a tax-exempt advanced refunding of a tax-exempt municipal debt after December 31, 2017.

Allotment – Amount of securities distributed to each member of the underwriting syndicate to fill orders.

Assessed Valuation – A municipality's worth in dollars based on real estate and/or other property for the purpose of taxation, sometimes expressed as a percent of the full market value of the community.

Authorized but Unissued – Debt that has been authorized for a specific purpose by the voters but has not yet been issued.

Average Daily Attendance (ADA) – The number of students in ADA can be found by adding the number of students who are in attendance each day of the school year for the entire school year and then dividing that number by the number of instructional days in the school year.

Bond – A debt instrument in which an investor loans money to the issuer that specifies when the loan is due ("term" or "maturity" such as 20 years), the interest rate the borrower will pay (such as 5 percent), when the debt-service payments will be made (such as monthly, semi–annually, annually), and the revenue source pledged to make the payments.

Bond Counsel – Attorney retained by the issuer to give a legal opinion that the issuer is authorized to issue the proposed securities, the legal requirements necessary for issuance have been met, and the proposed securities will be exempt from federal income taxation and state and local taxation where applicable.

Bond Insurance – A legal commitment by an insurance company to make timely payments of principal and interest in the event the issuer of the debt is unable to make the payments.

Build America Bonds (BABs) – A debt instrument created by the American Recovery and Reinvestment Act of 2009 (ARRA) that could be issued as Tax Credit BABs or Direct-Payment BABs. Tax Credit BABs provide a tax credit to investors equal to 35 percent of the interest payable by the issuer. Direct-Payment BABs provide a direct federal subsidy payment to state and local governmental issuers equal to 35 percent of the interest payable. With the implementation of the Budget Control Act of 2011, the BAB subsidies have been reduced. Authority to issue BABs expired in December 2010. See Appendix E for a discussion on BABs.

Federal Fiscal Year	Sequestration Rate	Effective BAB Federal
(October 1 thru September 30)	Reduction	Subsidy Payment Percentage
2019	6.2%	32.83%
2018	6.6%	32.69%
2017	6.9%	32.59%
2016	6.8%	32.62%
2015	7.3%	32.45%
2014	7.2%	32.48%
2013	8.7%	31.96%

Capital Appreciation Bond (CAB) – A municipal security in which the investment return on an initial principal amount is reinvested at a stated compounded rate until maturity. At maturity, the investor receives a single payment (the "maturity value") representing both the initial principal amount and the total investment return. CABs are distinct from traditional zero coupon bonds because the investment return is considered to be in the form of compounded interest rather than accreted original issue discount. For this reason, only the initial principal amount of a CAB is counted against a municipal issuer's statutory debt limit, rather than the total par value, as in the case of a traditional zero coupon bond. See Chapter 4 for a discussion on CABs.

CAB Maturity Amount – The single payment for a capital appreciation bond an investor receives at maturity. The payment represents both the initial principal amount and interest. For capital appreciation bonds, compound accreted values are calculated as interest in the year of maturity.

CAB Par Amount – The face amount assigned to a capital appreciation bond at issuance and paid to the investor at maturity.

CAB Premium – The amount by which the price paid for a CAB security exceeds par value.

Certificate of Obligation (CO) – An obligation issued by a city, county or certain hospital districts under subchapter C of Chapter 271 of the Local Government Code to finance public projects. CO issuance does not require voter approval unless a valid petition of 5 percent of the voters requesting an election is presented. See Chapter 5 for a discussion on COs.

Certificate of Participation (COP) – A tax-exempt lease-financing agreement used by a municipality or local government in which an investor buys a share or participation in the revenue generated from the lease-purchase of the property or equipment to which the COP is tied. COPs do not require voter approval.

Charter School – Charter schools were created by the Texas Legislature in 1995 as part of the public-school system. Under Texas Education Code, Chapter 12, the purpose of charter schools is to improve student learning, increase the choice of learning opportunities within the public-school system, create professional opportunities that will attract new teachers to the public-school system, establish a new form of accountability for public schools and encourage different and innovative learning methods. See Appendix C for a discussion on charter schools.

Commercial Paper (CP) – Short-term, unsecured promissory notes that mature within 270 days and are backed by a liquidity provider, usually a bank, that stands by to provide liquidity in the event the notes are not remarketed or redeemed at maturity. See Appendix F for a discussion on CP.

Competitive Sale – A sale in which the issuer solicits bids from underwriting firms and sells the securities to the underwriter or syndicate offering the most favorable bid that meets the specifications of the notice of sale.

Component Unit (CU) – A legally separate entity for which the elected officials of the primary government (PG) are financially accountable. The nature and significance of the CUs relationship with the PG is such that exclusion from the PG's financial reports would be misleading or create incomplete financial statements.

Conduit Debt – Per the Governmental Accounting Standards Board (GASB), conduit debt obligations are issued by a state or local governmental entity for the express purpose of providing financing for a specific third party that is not a part of the issuer's financial reporting entity. GASB's most recent development of its definition of a conduit debt obligation states the key characteristic should be that there are at least three participants: the government issuer, the third-party borrower, and the bondholder. Although conduit debt obligations bear the name of the governmental issuer, the issuer has no obligation for such debt beyond the resources provided by a lease or loan with the third party on whose behalf they are issued. See Appendix B for a discussion on conduit debt.

Conduit Issuer – An issuer authorized by law to issue securities to finance revenue–generating projects in which the funds generated are used by a third party (known as the "conduit borrower" or "obligor") for debt-service payments. The conduit issuer is generally not responsible for debt service.

Costs of Issuance – The expenses paid by or on behalf of the issuer in connection with the sale and issuance of bonds, including underwriting costs, legal fees, rating agency fees and other fees associated with the transaction. These costs and fees may vary depending on the type and structure of the financing, among other factors.

Coupon – The interest rate paid on a security.

Counterparty Risk – The risk to each party in a swap contract that the counterparty will not fulfill its contractual obligations.

Current Interest Bond (CIB) – A bond in which interest payments are made on a periodic basis throughout the life of the bond as opposed to a bond such as a capital appreciation bond that pays interest only at maturity. This term is most often used in the context of a combination issuance of bonds that includes both capital appreciation bonds and current interest bonds.

Current Refunding – A refunding transaction in which the municipal securities being refunded will mature or be redeemed within 90 days or less from the date of issuance of the refunding issue.

Committee on Uniform Securities Identification Procedures (CUSIP) – A unique nine-character identification for each class of security approved for trading in the U.S. CUSIPs are used to facilitate clearing and settlement for market trades.

Dealer Fee – Cost of underwriting, trading, or selling securities.

Debt Outstanding – The amount of unpaid principal on a debt that will continue to generate interest until paid off.

Debt per Capita – A measurement of the value of a government's debt expressed in terms of the amount attributable to each citizen under the government's jurisdiction. The formula for calculating this figure is the debt outstanding as of August 31 divided by the estimated residential population of the issuer.

Debt Service – The amount that is required to cover the repayment of principal and interest on a debt for a particular period.

Defeasance – A provision that voids a debt when the borrower sets aside cash, securities or investments sufficient to service the borrower's debt.

Derivative – A financial instrument whose value is based on one or more underlying assets. An example is a swap contract between two counterparties that specifies conditions (especially the dates, underlying variables and notional amounts) under which payments are to be made between the parties.

Disclosure – The act of releasing accurately and completely all material information to investors and the securities markets for outstanding or to be issued securities.

Disclosure Counsel – An attorney or law firm retained by the issuer to provide advice on issuer disclosure obligations and to prepare the official statement and/or continuing disclosure agreement.

Discount – The amount by which the price paid for a security is less than its par value.

Escrow – Fund established to hold monies or securities pledged to pay debt service.

Escrow Agent – Commercial bank or trust company retained to hold the investments purchased with the proceeds of an advance refunding and to use the invested funds to pay debt service on the refunded debt.

Financial Advisor – A securities firm that assists an issuer on matters pertaining to a proposed issue such as structuring, timing, marketing, fairness of pricing, terms and debt ratings.

Fiscal Year – Information is sorted on the fiscal year of the state, September 1 through August 31. Debt-service adjustments have been made for local governments with different fiscal years. Information is provided on cash, not accrual, basis.

Fixed Rate – An interest rate that does not change during the entire term of the obligation.

General Obligation (GO) Debt – Debt backed by the credit and taxing power of the issuing jurisdiction.

Home Rule City – Cities are classified as either "general law" or "home rule." A city may elect home rule status (i.e., draft an independent city charter) once it exceeds 5,000 population and the voters agree to home rule. Otherwise, it is classified as general law and has very limited powers. One example of the difference in the two structures regards annexation. General law cities cannot annex adjacent unincorporated areas without the property owner's consent; home rule cities may annex without consent but must provide essential services within a specified period (generally within three years), or the property owner may file suit to be disannexed and reimbursed. Once a city adopts home rule, it may continue to keep this status even if the population later falls below 5,000.

I&S Debt – Interest & sinking fund debt is the debt-service outstanding on bonds issued by public schools for school capital projects such as buildings, renovations, technology, athletic facilities, school transportation and performing arts or to refund M&O debt. I&S bonds are backed by revenue from the I&S tax rate.

I&S Tax Rate – A public school district's property tax rate consists of an M&O tax rate and an I&S (interest and sinking fund) tax rate. The I&S tax rate provides funds for debt-service payments on debt that finances a district's facilities.

Indenture – Deed or contract, which may be in the form of a resolution, that sets forth the legal obligations between the issuer and the securities holders. The indenture also names the trustee that represents the interests of the securities holders.

Issuer – A legal entity that sells securities for the purpose of financing its operations. Issuers are legally responsible for the obligations of the issue and for reporting financial conditions, material developments and any other operational activities.

Lease Purchase – Financing the purchase of an asset over time through lease payments that include principal and interest. Lease purchases can be financed through a private vendor.

Lease-Revenue Bonds – Bonds issued by a nonprofit corporation or government issuer which are secured by lease payments made by a local government or third-party borrower for use of specified property.

Letter of Credit – A credit enhancement used by an issuer to secure a higher rating for its securities through a contractual agreement with a major financial institution, consisting of an unconditional pledge of the institution's credit to make debt-service payments in the event of a default.

Limited Tax General Obligation Bonds – A type of municipal bond that is guaranteed by the municipal government's pledge to use all legal resources, including the levying of property taxes, up to a set statutory limit. If a municipality exhausts the property tax resources for bond repayment within that limit, other revenue sources must be used for bond repayment.

Liquidity – The relative ability of a security to be readily traded or converted into cash without substantial transaction costs or loss in value.

Liquidity Provider – A financial institution that facilitates the trading of a security by insuring that it will be purchased if tendered to the issuer or its agent because it cannot be immediately remarketed to new investors.

Local Government Names – The names of governments used in this report are taken from the *Texas Property Tax Appraisal District Directory* published by the Texas State Comptroller of Public Accounts.

M&O Debt – Maintenance & operations debt is the debt-service outstanding on bonds issued by public schools to be used for administration and operational costs of schools (teachers, buses, classrooms, etc.) but cannot be used for the new construction of school facilities. M&O bonds are backed by revenue from the M&O tax rate.

M&O Tax Rate – A public school district's property tax rate consists of an M&O tax rate and an I&S tax rate. The M&O tax rate provides funds for the General Operating Fund, which pays for salaries, supplies utilities, insurance, equipment, and other costs of day-to-day operations.

Maintenance Tax – Funds the maintenance and operation costs of a school district but cannot be used for new construction of school facilities.

Management Fee – A component of the underwriting spread that compensates the underwriters for assistance in creating and implementing the financing.

Maturity Date – The date principal is due and payable to the security holder.

Mortgage Credit Certificate – A certificate issued by certain state or local governments that allows a taxpayer to claim a tax credit for some portion of the mortgage interest paid during a given tax year.

Municipal Bond – A debt security issued to finance projects for a state or local government issuer. Municipal securities are typically exempt from federal taxes and from most state and local taxes.

Negotiated Sale – A sale in which an issuer selects an underwriting firm or syndicate to assist with the issuance process. At the time of sale, the issuer negotiates a purchase price for its securities with that underwriting firm or syndicate.

Notice of Sale – Publication by an issuer describing the terms of sale of an anticipated new offering of municipal securities.

Official Statement – The document published by the issuer which provides complete and accurate material information to investors on a new issue of municipal securities including the purposes of the issue, repayment provisions and the financial, economic and social characteristics of the issuing government.

Par – The face value of a security that is due at maturity. A "par bond" is a bond selling at its face value.

Paying Agent – The entity responsible for processing debt-service payments from the issuer to the security holders.

Permanent School Fund – The Texas Permanent School Fund (PSF) was created in 1854 by the 5th Legislature expressly for the benefit of public schools. In addition, the Constitution of 1876 stipulated that certain lands and proceeds from the sale of those lands would also be dedicated to the PSF. The Constitution requires that distributions from the returns on the PSF be made to the Available School Fund to be used for the benefit of public and charter schools and allows the PSF to be used to guarantee bonds issued by public and charter schools.

Permanent School Fund Bond Guarantee (BGP) – The BGP was created in 1983 as an alternative for school districts to avoid the cost of private bond insurance by obtaining a PSF guarantee for voter-approved public school bond issuances. To qualify for the BGP guarantee, school districts and charter schools must be accredited by the state, have investment grade bond ratings (but below AAA), and have their applications approved by the Commissioner of Education. Bonds guaranteed by the BGP are rated AAA.

Premium – The amount by which the price paid for a security exceeds par value.

Premium Capital Appreciation Bond (PCAB) – A type of CAB that has a stated yield or accretion rate that is higher than its actual current yield to investors. This difference results in a lower initial stated par amount which preserves debt capacity. See Chapter 4 for a discussion on PCABs.

Principal – The face value of a bond, exclusive of interest.

Printer – A business that produces the official statement, notice of sale and any bonds required to be transferred between the issuer and purchasers of the bonds. The costs associated with a printer are typically rolled into the costs of issuance.

Private Placement – A securities sale in which an issuer sells its securities directly to investors through a placement agent without a public offering.

Proceeds – An issuer's net proceeds equal the issue price less the issuance fees. An investor's proceeds equal the maturity or sale value plus interest earned up to the maturity date or point of sale.

Put Bond – A bond that allows the holder to force the issuer to repurchase the security at specified dates before maturity. The repurchase price is set at the time of issue and is usually par value.

Qualified Energy Conservation Bonds (QECB) – A bond that enables qualified state, tribal, and local government issuers to borrow money at attractive rates to fund energy conservation projects. While not a grant, a QECB is among the lowest cost public financing tools available because the U.S. Department of the Treasury subsidizes the issuer's borrowing costs.

Qualified School Construction Bonds (QSCB) – QSCBs must meet three requirements: 1) all of the bond proceeds must be used for the construction, rehabilitation, or repair of a public school facility or for the acquisition of land on which such a bond financed facility is to be constructed; 2) the bond is issued by a state or local government within which such school is located; and 3) the issuer designates such bonds as a qualified school construction bond. For more information regarding QSCBs, contact the Texas Education Agency.

Qualified Zone Academy Bonds (QZAB) – QZABs are tax credit bonds where the proceeds are used for renovating school buildings, purchasing equipment, developing curricula, and/or training school personnel. QZABs may not be issued for new construction. To qualify to issue QZABs, school districts must create a Zone Academy that is comprised of empowerment zones or enterprise communities comprised of public schools with 35 percent or more of their student body on the free and/or reduced lunch programs. For more information regarding QZABs, contact the Texas Education Agency.

Rating Agency – An entity that provides publicly available ratings of the credit quality of securities issuers, measuring the probability of the timely repayment of principal and interest on municipal securities.

Refunding Bond – Bonds issued to retire or defease all or a portion of outstanding bonds.

Registrar – An entity responsible for maintaining ownership records on behalf of the issuer.

Remarketing Fee – Compensation to an agent for remarketing a secondary offering of short-term securities, usually for a mandatory or optional redemption or put (return of the security to the issuer).

Revenue Debt – Debt that is legally secured by a specified revenue source(s). Most revenue debt does not require voter approval and usually has a maturity based on the life of the project to be financed.

Sales Tax – A tax imposed by the government at the point of sale on retail goods and services. It is collected by the retailer and passed on to the state. Statutes, such as the Development Corporation Act, authorize certain issuers to pledge certain sales taxes to the repayment of debt for certain projects.

Sales Tax Revenue – Debt that is legally secured by a specified sales tax issued by certain cities for such purposes as constructing and improving municipal parks and recreation facilities/entertainment centers as well as hike and bike trails.

Self-Supporting Debt – Debt that is designed to be repaid with revenues other than state general revenues. Self-supporting debt can be either general obligation debt or revenue debt.

Selling Group – Group of municipal securities brokers and dealers that assist in the distribution of new securities.

Serial Bond – A bond issue in which a portion of the outstanding bonds matures at regular intervals until all of the bonds have matured.

Spread Expenses – A component of the underwriting spread representing the costs of operating the syndicate such as financial advisors, legal counsel, travel, printing, day loans, wire fees and other associated fees.

Structuring Fee – A component of the underwriting spread that compensates the underwriters for assistance with developing a marketable securities offering within the issuer's legal and financial constraints.

Swap – A derivative in which counterparties exchange cash flows of one party's financial instrument for those of the other party's financial instrument.

Syndicate – A group of underwriters formed to purchase a new issue of securities from the issuer and offer it for resale to investors.

Takedown – A component of the underwriting spread representing the discount that the members of the syndicate receive when they purchase the securities from the issuer. Takedown is also known as the selling concession.

Tax or Revenue Anticipation Notes (TRAN) – Short-term loans that the issuer uses to address cash flow needs created when expenditures must be incurred before tax or other revenues are received.

Tax-Supported Debt – For local governments, tax-supported debt (sometimes called tax debt) is generally secured by a pledge of the issuer's ad valorem taxing power. Tax-supported debt can have either a limited or an unlimited authority pledge of tax revenues for repayment. For reporting

purposes, when the public security contains both a tax and revenue pledge, the public security is categorized as tax-supported debt.

Term Bond – A bond issue in which all or a large part of the issue comes due in a single maturity. Term bond issuers make periodic payments into a sinking fund for mandatory redemption of term bonds before maturity or for payment at maturity.

Trustee – A bank or trust company designated by the issuer or borrower under the indenture or resolution as the custodian of funds. The trustee represents the interests of the security holders including making debt-service payments.

Underwriter – An investment banking firm that purchases securities directly from the issuer and resells them to investors.

Underwriting Risk Fee – A portion of the underwriting spread designed to compensate the underwriter for the risk associated with market shifts and interest rate fluctuations.

Underwriting Spread – The amount representing the difference between the price at which securities are bought from the issuer by the underwriter and the price at which they are reoffered to the investor. The underwriting spread generally includes the takedown, management fee, expenses and underwriting risk fee.

Underwriter's Counsel – Attorney who prepares or reviews the issuer's offering documents on behalf of the underwriter and prepares documentation for the underwriting agreement and the agreement among underwriters.

Underwriter's Risk – The risk of loss that could arise due to overestimated demand for an issuance or due to sudden fluctuations in market conditions borne by the underwriters until resale.

Unlimited Tax General Obligation Bond – A municipal bond that is backed by the pledge of the issuer to raise taxes, without limit, to service the debt until it is repaid.

Variable Rate – An interest rate that fluctuates based on market conditions or a predetermined index or formula. (Fixed rates do not change during the life of the obligation.)

Years to Maturity – The period of time for which a financial instrument remains outstanding. Maturity refers to a finite time period at the end of which the financial instrument will cease to exist and the principal is repaid with interest.

Yield – The investor's rate of return.

Zero Coupon Bond – A bond that is issued at a deep discount to its face value but pays no interest.

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