

City of Gainesville

General Employees Pension Plan

Actuarial Valuation Report

As of October 1, 2017

July 2018

July 3, 2018

Board of Trustees City of Gainesville General Employees Pension Plan 200 East University Avenue Gainesville, FL 32601

Dear Board Members:

Conduent HR Consulting, LLC, was retained to prepare this report on the results of an actuarial valuation of the City of Gainesville General Employees Pension Plan ("Plan") as of October 1, 2017. The purpose of this report is to provide a summary of the funded status of the Plan as of October 1, 2017, to determine the contribution requirement in accordance with Chapter 112 of the Florida Statutes for the fiscal year ending September 30, 2019, and to satisfy State reporting requirements. In addition, this report provides a record of any plan amendments or other plan changes affecting the financial status of the Plan.

This report is prepared for the Board of Trustees for use in its review of the operations of the Plan. It is expected that the Board will use the results of this report for the purpose of determining contributions to be made to the Plan, as well as the funding status of Plan benefits. The use of this report by other parties and/or for other purposes may not be appropriate and may result in mistaken conclusions because of failure to understand applicable assumptions, methods or inapplicability of the report for that purpose. Because of the risk of misinterpretation of actuarial results, Conduent should be asked to review any statement to be made on the basis of the results contained in this report. Conduent will not accept any liability for any such statement made without prior review by Conduent.

Summary of Valuation Results

Currently, the Plan receives contributions from the City of Gainesville and active members. The amount of the City contribution varies from year to year, while the member contributions are equal to a fixed percentage of 5.00% of payroll. After taking into account expected member contributions, the total required contribution from the City for the fiscal year ending September 30, 2019 is 18.40% of projected payroll. For comparative purposes, the total required contribution from the City for the fiscal year ending September 30, 2018 was 18.41% of projected payroll.

Discussion of Valuation Results

The contributions received by the Plan are used to pay for the normal cost of the Plan plus a payment toward the unfunded actuarial accrued liability. As of October 1, 2017, the Plan had \$538,735,346 in actuarial accrued liability and \$372,844,666 in assets (actuarial value), resulting in an unfunded actuarial accrued liability of \$165,890,680. The funded percentage (on an actuarial value of assets basis) increased from 66.89% as of October 1, 2016 to 69.21% as of October 1, 2017. This increase in funded percentage was primarily due to better-than-expected investment performance and lower-than-expected pay increases, partially offset by the impact of the decrease in the investment return assumption (from 8.10% to 8.00%).

The funded percentage is a snapshot measure of the funding of the Plan as of the valuation date. It is determined as a ratio of the actuarial value of assets divided by the total actuarial accrued liability on the valuation date. The funded percentage can differ depending on whether the market value of assets is used or the actuarial value of assets. Also, the funded percentages provided in this report are appropriate for evaluating the need and level of future contributions, but make no assessment of the funded status of the Plan if the Plan were to settle (i.e., purchase annuities to cover) a portion or all of its liabilities.

The City's contribution requirement in accordance with Chapter 112 of the Florida Statutes for the fiscal year ending September 30, 2019 is \$16,558,820. This is comprised of the normal cost (including administrative expenses) of \$8,975,668, plus an amortization amount of the unfunded actuarial accrued liability of \$10,400,178, plus the interest adjustment of \$1,681,823, reduced for expected member contributions \$4,498,849.

Actuarial Experience

The Plan's unfunded actuarial accrued liability as of October 1, 2017 is \$11,869,684 less than expected. This is due to an experience gain on liabilities of \$4,840,750 (mostly due to salary increases less than expected) and an actuarial asset gain of \$12,634,010 (the return on actuarial value of assets for the plan year ending September 30, 2017 was 11.79% vs. the assumed return of 8.10%). These gains were partially offset by an increase in the Plan's actuarial accrued liability of \$5,605,076 due to the change in investment return assumption (from 8.10% to 8.00%). A reconciliation of the actuarial experience can be found in Table II.

Changes in Plan Provisions

In preparing the actuarial valuation as of October 1, 2017, we have used the same plan provisions as were reflected in the valuation of October 1, 2016. A summary of the plan provisions can be found in Table XI.

Prescribed Assumptions under Chapter 112

The mortality assumption was established in accordance with the changes that were enacted in the 2015 legislative session to sections 112.63 and 112.664, Florida Statutes, which require local government pension plans to use the mortality tables used in either of the two most recently published actuarial valuation reports of the Florida Retirement System (FRS), including the projection scale for mortality improvement, and appropriate risk and collar adjustments based on plan demographics. The mortality assumptions used in this valuation are the same as those used in the 2016 actuarial valuation of the FRS for "other than special risk" participants.

Changes in Actuarial Assumptions and Methods as of October 1, 2017

The investment rate of return assumption was decreased from 8.10% to 8.00% to better reflect expectations of future investment returns.

The effect of the assumption changes are summarized as follows:

Event	Entry Age Normal Accrued Liability	Entry Age Normal Cost	City Contribution
2016 Valuation Assumptions	\$ 533,130,270	\$ 8,196,544	\$ 16,476,359
Change in Investment Rate of Return	538,735,346	8,370,763	16,558,820

A summary of the actuarial methods and assumptions used in the valuation can be found in Table X.

Basis for the Actuarial Assumptions

The economic and demographic assumptions used in the valuation were adopted by the Board in consultation with Conduent. Conduent recommends a thorough experience review be performed in conjunction with the October 1, 2018 valuation.

In my opinion, the actuarial assumptions used are appropriate for purposes of the valuation and are reasonably related to the experience of the Plan and to reasonable long-term expectations.

Financial and Member Data

This valuation was performed using employee and financial data supplied by the City of Gainesville. The census data was collected as of October 1, 2017. Conduent did not audit this data, but it was reviewed for reasonableness and consistency with the prior year's information. The accuracy of the results of the valuation are dependent on the accuracy of the data. Tables VIII through VIIId provide a summary of the data used in the valuation.

Estimated Impact of Pension Obligation Bond

As requested, we have estimated what the City's contribution rate would be without reflecting the pension obligation bond contribution that occurred in 2003. For this purpose we have excluded from the Plan's assets the special contribution of \$38,634,133 and investment earnings of \$97,333,043 as reported by the Plan. On this basis, the City's contribution rate would have been 27.37% of projected payroll for the fiscal year ending September 30, 2019. In Table Ia we present a comparison of the contribution rates with and without the pension obligation bond contribution.

Certification

This actuarial valuation was prepared under my direct supervision and I acknowledge responsibility for the results. To the best of my knowledge, the results are complete and accurate and, in my opinion, the techniques and assumptions used are reasonable and meet the requirements and intent of Part VII, Chapter 112, Florida Statutes. There is no benefit or expense to be provided by the Plan and/or paid from the Plan's assets for which liabilities or current costs have not been established or otherwise taken into account in the valuation. All known events or trends which may require a material increase in Plan costs or required contribution rates have been taken into account in the valuation.

Future actuarial measurements may differ significantly from current measurements due to plan experience differing from that anticipated by the economic and demographic assumptions, changes expected as part of the natural operation of the methodology used for these measurements, and changes in plan provisions, applicable law or regulations. An analysis of the potential range of such future differences is beyond the scope of this report.

This valuation was prepared in accordance with the standards of practice prescribed by the Actuarial Standards Board, based on the current provisions of the Plan and on actuarial assumptions that are reasonable reflecting long-term expectations of future experience of the Plan. I am a Member of the American Academy of Actuaries and I meet the Academy's Qualification Standards to issue this Statement of Actuarial opinion. I am available to answer questions regarding any of the content within this report. I can be reached at (602) 803-6174.

Conduent Human Resource Services

David J. Kershner, FSA, EA, MAAA, FCA

Principal

Enrollment No. 17-05179

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	0	ctober 1, 2016	0	ctober 1, 2017
1. Number of Members				
a. Active Members		1,519		1,514
b. Deferred Vested Members		428		441
c. Retired Members:				
i. Non-disabled		1,122		1,163
ii. Disabled		39		40
iii. Beneficiaries		105		113
iv. Sub-total d. Total Members		1,266 3,213		1,316 3,271
2. Total Annual Compensation	\$	87,219,116	\$	86,102,369
3. Valuation Payroll	\$	91,143,976	\$	89,976,976
4. Total Retired Member Benefits	\$	31,378,761	\$	32,618,910
5. Annual Cost				
a. Present Value of Future Benefits	\$	590,253,827	\$	602,287,596
b. Present Value of Future Normal Cost		63,927,290		63,552,250
City Portion		29,028,803		29,110,044
Member Portion		34,898,487		34,442,206
c. Actuarial Accrued Liability (AAL)		526,326,537		538,735,346
d. Actuarial Value of Assets		(352,075,915)		(372,844,666)
e. Unfunded AAL (UAAL)	\$	174,250,622	\$	165,890,680
f. Normal Cost	\$	8,361,885	\$	8,370,763
g. Payment to Amortize Unfunded Liability/(Surplus)		10,588,425		10,400,178
h. Administrative Expenses		670,867		604,905
i. Interest adjustment ⁱ		1,713,370		1,681,823
j. Total	\$	21,334,547	\$	21,057,669
j. Expected Member Contributions	\$	4,557,199	\$	4,498,849
I. Estimated City Contributions		16,777,348		16,558,820
m. Total	\$	21,334,547	\$	21,057,669
6. Annual Cost (as a % of Valuation Payroll)				
a. Total Required Contributions		23.41%		23.40%
b. Expected Member Contributions		5.00%		5.00%
d. Estimated City Contributions		18.41%		18.40%

Interest calculation is based on an assumed payment schedule where 1/12 of the City contribution is made in 12 monthly installments commencing one year following the valuation date.

Valuation Results With and Without Pension Bond

Table la

	With Pension Bond				
		ctober 1, 2017	Without Pension Bond October 1, 2017		
1. Number of Members					
a. Active Members		1,514		1,514	
b. Deferred Vested Members		441		441	
c. Retired Members:					
i. Non-disabled		1,163		1,163	
ii. Disabled		40		40	
iii. Beneficiaries		113		113	
iv. Sub-total		1,316		1,316	
d. Total Members		3,271		3,271	
2. Total Annual Compensation	\$	86,102,369	\$	86,102,369	
3. Valuation Payroll	\$	89,976,976	\$	89,976,976	
4. Total Retired Member Benefits	\$	32,618,910	\$	32,618,910	
5. Annual Cost					
a. Present Value of Future Benefits	\$	602,287,596	\$	602,287,596	
b. Present Value of Future Normal Cost		63,552,250		63,552,250	
City Portion		29,110,044		29,110,044	
Member Portion		34,442,206		34,442,206	
c. Actuarial Accrued Liability (AAL)		538,735,346		538,735,346	
d. Actuarial Value of Assets		(372,844,666)		(258,571,119)	
e. Unfunded AAL (UAAL)	\$	165,890,680	\$	280,164,227	
f. Normal Cost	\$	8,370,763	\$	8,370,763	
g. Payment to Amortize Unfunded Liab/(Surpl)	*	10,400,178	•	17,825,794	
h. Administrative Expenses		604,905		604,905	
i. Interest adjustment*		1,681,823		2,326,367	
j. Total	\$	21,057,669	\$	29,127,829	
j. Expected Member Contributions	\$	4,498,849	\$	4,498,849	
I. Estimated City Contributions		16,558,820		24,628,980	
m. Total	\$	21,057,669	\$	29,127,829	
6. Annual Cost (as a % of Valuation Payroll)					
a. Total Required Contributions		23.40%		32.37%	
b. Expected Member Contributions		5.00%		5.00%	
d. Estimated City Contributions		18.40%		27.37%	

1. Act	rual Unfunded Accrued Liability as of October 1, 2016	\$ 174,250,622
	pected Change in Unfunded Liability During the 6/2017 Plan Year	
a.	Due to Employer Normal Cost and Administrative Expenses*	\$ 4,643,900
b.	Due to Interest on the Unfunded Liability	14,114,300
c.	City Contributions	(14,654,934)
d.	Due to Interest on City Contributions	 (593,524)
e.	Total Expected Change	\$ 3,509,742
3. Ex	pected Unfunded Accrued Liability as of October 1, 2017	\$ 177,760,364
	ange in Unfunded Liability During the 6/2017 Plan Year Due to:	
a.	Method Changes	\$ 0
b.	Assumption Changes	5,605,076
c.	Plan Amendments	0
d.	Experience (Gain)/Loss	(17,474,760)
e.	Total Change	\$ (11,869,684)
5. Act	ual Unfunded Accrued Liability as of October 1, 2017	\$ 165,890,680
	velopment of Outstanding Amortization Obligations as of tober 1, 2017	
a.	Expected Outstanding Obligations as of October 1, 2017	\$ 176,918,836
b.	Assumption Changes	5,605,076
c.	Plan Amendments	0
d.	Experience (Gain)/Loss	(17,474,760)
e.	(Gain)/Loss due to Contribution Timing	841,528
f.	Total Outstanding Obligations as of October 1, 2017	\$ 165,890,680

7. Items Affecting Calculation of Accrued Liability

- a. Plan provisions reflected in the accrued liability (see Table XI on page 29)
- b. Plan amendments reflected in item 4.c. above
- c. Actuarial assumptions and methods used to determine accrued liability (see Table X on page 24)
- d. Changes in actuarial assumptions and methods reflected in items 4.a. and 4.b. above (see Table Xa on page 28)

^{*} As requested by the State Actuary, the normal cost represents the employer portion only, net of actual employee contributions and includes actual administrative expenses.

8.	Exp Oct	11.62%			
9.	Net	Actuarial (Gains)/Losses During the 2016/2017 Plan Year			
	a.	Due to Salary/Service/Data	(0.27%)		
	b.	Due to Investment Performance	(0.72%)		
	c.	Due to Turnover/Mortality	(0.07%)		
	d.	Due to New Retirements	0.07%		
	e.	Due to Difference and Timing in Contributions	0.05%		
	f.	Due to New Members	0.00%		
	g.	Total	(0.94%)		
10.	Cha	ange in Unfunded Accrued Liability Rate During the			
	201	6/2017 Plan Year Due to:			
	a.	Method changes	0.00%		
	b.	Assumption changes	0.32%		
	c.	Plan amendments	0.00%		
	d.	Total Change	0.32%		
11.	Oth	er Effects	0.56%		
12.	2. Unfunded Accrued Liability Contribution Rate as of October 1, 2017 11.56%				

13. Comments on Change in Unfunded Accrued Liability Contribution Rate:

<u>Salary/Service/Data:</u> The average salary increase in 2017 was 3.42%, compared to assumed increases of 5.50%. Also, there were adjustments in the reported salary history data.

<u>Investment Performance:</u> The rate of return in 2017 on the actuarial value of assets was 11.79% compared to the 8.10% assumed rate of return.

<u>Turnover/Mortality:</u> The figure shown here is the net effect on valuation liabilities of actual deaths, terminations of employment and disabilities to the extent they are different from what was anticipated on the basis of the assumptions related to those events.

New retirements: Net effect on the valuation liabilities of retirements (including DROP) and refund of employee contributions relative to the assumed rate of retirements.

New members: Liability created by new members entering the plan with past service credit.

<u>Due to Differences and Timing of Contributions:</u> This entry arises from the one-year lag between the date as of which the contribution is determined and the time it is made.

<u>Assumption changes:</u> Please refer to Table Xa for a summary of changes.

Plan amendments: None.

<u>Other effects:</u> Overall payroll increases and adjustments in the amortization of the unfunded actuarial accrued liability.

1. Actuarial Present Value of Accrued Benefits

		Od	tober 1, 2016	Od	tober 1, 2017
a.	Vested Accrued Benefits:				
	i. Inactive members and				
	beneficiaries	\$	382,997,223	\$	392,320,327
	ii. Active members		83,025,364		87,950,869
	iii. Sub-total	\$	466,022,587	\$	480,271,196
b.	Non-vested Accrued Benefits		20,838,435		21,717,320
c.	Total Benefits	\$	486,861,022	\$	501,988,516
d.	Market Value of Assets	\$	357,298,271	\$	396,313,562
e.	Percentage Funded		73.4%		78.9%
f.	Interest Rate		8.10%		8.00%
2. Sta a.	Actuarial Present Value as of October 1, 2016	alue of All Acci	ued Benefits	\$	486,861,022
b.	Increase (Decrease) During 2016/2017 Plan Yea	r Attributable to:			
	i. Interest			\$	37,877,742
	ii. Benefits accumulated				10,573,850
	iii. Benefits paid				(38,469,162)
	iv. Plan amendments				0
	v. Changes in actuarial assumptions				5,145,064
	vi. Net increase (decrease)			\$	15,127,494
c.	Actuarial Present Value as of October 1, 2017			\$	501,988,516

3. Items Affecting Calculation of Actuarial Present Value of Accrued Benefits

- a. Plan provisions reflected in the accrued benefits (see Table XI page 29)
- b. Plan amendments reflected in item 2.b.iv. above
- c. Actuarial assumptions and methods used to determine present values (see Table X on page 24)
- d. Changes in actuarial assumptions and methods reflected in item 2.b.v. above (see Table Xa on page 28)

¹ The information shown in this exhibit under ASC 960 is for informational purposes only. It is not intended to be used for financial reporting purposes (see separate GASB 67 and GASB 68 reports).

Information Required by Florida Statute (Chap. 112)

			Oc	tober 1, 2016	C	October 1, 2017
1.		articipant Data				
	a.	Active members:				
		i. Number	•	1,519	•	1,514
		ii. Total annual payroll	\$	87,219,116	\$	86,102,369
		iii. Valuation annual payroll		91,143,976		89,976,976
	b.	Retired members and beneficiaries:				
		i. Number		1,227		1,276
		ii. Total annualized benefit	\$	31,152,882	\$	32,387,731
	c.	Disabled members receiving benefits:				
		i. Number		39		40
		ii. Total annualized benefit	\$	225,879	\$	231,179
	d.	Terminated vested members:				
		i. Number		428		441
		ii. Total annualized benefit	\$	2,668,659	\$	2,807,245
2.	As	ssets				
	a.	Actuarial Value of Assets	\$	352,075,915	\$	372,844,666
	b.	Market Value of Assets		357,298,271		396,313,562
3.	Lia	abilities				
	a.	Present value of all future expected benefit payments	:			
		i. Active members:				
		Retirement benefits	\$	190,541,237	\$	193,084,001
		Vesting benefits		6,524,183		6,605,052
		Disability benefits		6,044,582		6,068,065
		Death benefits		2,890,938		2,891,844
		Return of member contributions		1,255,664		1,318,307
		Sub-total	\$	207,256,604	\$	209,967,269
		ii. Terminated vested members	\$	10,670,876	\$	11,402,146
		iii. Retired members and beneficiaries:				
		Retired (other than disabled) and beneficiaries	\$	370,489,557	\$	379,041,983
		Disabled members		1,836,790		1,876,198
		Sub-total	\$	372,326,347	\$	380,918,181
		iv. Total present value of all prospective benefits	\$	590,253,827	\$	602,287,596

Information Required by Florida Statute (Chap. 112)

Table IV (continued)

			October 1, 2016		October 1, 2017
	b. Liabilities due and unpaid	\$	0	\$	0
	c. Actuarial accrued liability	\$	526,326,537	\$	538,735,346
	d. Unfunded actuarial accrued liability	\$	174,250,622	\$	165,890,680
4.	Actuarial Present Value of Accrued Benefits	\$	486,861,022	\$	501,988,516
	(refer toTable IV for further details)				
5.	Pension Cost				
	a. Normal cost				
	Retirement benefits	\$	6,767,880	\$	6,754,072
	Vesting benefits		623,422		639,912
	Disability benefits		427,749		429,871
	Death benefits		109,445		109,308
	Return of member contributions		433,389		437,600
	Total normal cost	\$	8,361,885	\$	8,370,763
	As a % of valuation payroll		9.17%		9.30%
	Administrative expenses		670,867		604,905
	Total normal cost including admin expenses	\$	9,032,752	\$	8,975,668
	As a % of valuation payroll		9.91%		9.98%
	b. Payment to amortize unfunded liability	\$	10,588,425	\$	10,400,178
	As a % of valuation payroll		11.62%		11.56%
	d. Amount to be contributed by members	\$	4,557,199	\$	4,498,849
	As a % of valuation payroll		5.00%		5.00%
	e. Expected City Contribution:	\$	16,777,348	\$	16,558,820
	As a % of valuation payroll		16.53%		16.54%
6.	Prior Fiscal Year Contributions for year ending ¹	Sep	tember 30, 2016	Se	ptember 30, 2017
	a. Required Employer contribution	\$	14,098,494	\$	14,625,236
	b. Actual contribution made by:				
	i. Employer	\$	13,481,032	\$	14,654,934
	iii. Members		4,441,258		4,829,122

All results prior to 2016 were developed by the prior actuary.

Information Required by Florida Statute (Chap. 112)

Table IV (continued)

			C	ctober 1, 2016	0	ctober 1, 2017
7.	Ne	t actuarial (gain)/loss	\$	(12,376,691)	\$	(16,633,232)
8.	Otl	her disclosures				
	a.	Present value of active members':				
		i. Future salaries:				
		at attained age	\$	697,969,749	\$	688,844,113
		at entry age		n/a		n/a
		ii. Future contributions:				
		at attained age	\$	34,898,487	\$	34,442,206
		at entry age		n/a		n/a
	b.	Present value of future contributions from City	\$	29,028,803	\$	29,110,044
	c.	Present value of future expected benefit payments		n/a		n/a
		for active members at entry age				
	d.	Amount of active members' accumulated				
		contributions	\$	33,520,452	\$	34,695,119

Projection of Benefit Payments

Table IVa

Fiscal Year Beginning	Active Members		ng Retirees	Retired Members	Total Retired
	Number of Active Members	Number of Members	Projected Benefits	Number of Projected Members Benefits	Number of Projected Members Benefits
2017	1514	0	\$ 969,231	1757 \$ 32,675,135	1757 \$ 33,644,366
2018	1383	82	\$ 2,250,525	1712 \$ 32,683,595	1794 \$ 34,934,120
2019	1272	169	\$ 3,614,325	1695 \$ 32,799,022	1864 \$ 36,413,347
2020	1178	253	\$ 4,958,486	1676 \$ 32,881,809	1930 \$ 37,840,295
2021	1097	335	\$ 6,363,542	1656 \$ 33,011,130	1992 \$ 39,374,672
2022	1019	423	\$ 8,053,364	1636 \$ 33,097,035	2059 \$ 41,150,399
2023	944	508	\$ 9,842,303	1614 \$ 33,232,069	2122 \$ 43,074,372
2024	873	587	\$ 11,531,947	1590 \$ 33,345,597	2178 \$ 44,877,544
2025	806	658	\$ 13,329,024	1566 \$ 33,456,837	2224 \$ 46,785,861
2026	738	729	\$ 15,131,054	1540 \$ 33,443,959	2269 \$ 48,575,013
2027	672	793	\$ 17,005,569	1513 \$ 33,499,224	2306 \$ 50,504,793
2028	605	857	\$ 18,736,830	1485 \$ 33,478,890	2342 \$ 52,215,720
2029	551	906	\$ 20,304,055	1455 \$ 33,347,310	2361 \$ 53,651,365
2030	502	947	\$ 21,820,290	1424 \$ 33,161,234	2371 \$ 54,981,524
2031	455	985	\$ 23,281,415	1392 \$ 32,932,780	2376 \$ 56,214,195

Unfunded Liability Bases

Table IVb

		Outstanding	2016/2017	Outstanding	2017/2018	Years
	Original	Balance as of	Amortization	Balance as of	Amortization	Remaining
Description	Amount ¹	October 1, 2016	Payment	October 1, 2017	Payment	October 1, 2017
Description	Amount	October 1, 2010	i ayınıcını	October 1, 2017	i ayınıenı	October 1, 2017
1. 10/1/2004 2004 Fresh Start	N/A	\$ 10,191,593	\$ 743,559	\$ 10,213,325	\$ 771,856	17
2. 10/1/2006 Actuarial Losses	N/A	7,401,983	500,964	7,460,002	519,643	19
3. 10/1/2007 Actuarial Gains	N/A	(2,651,497)	(173,488)	(2,678,728)	(179,892)	20
4. 10/1/2008 Actuarial Losses	N/A	20,316,676	1,287,948	20,570,055	1,335,008	21
5. 10/1/2009 Actuarial Losses	N/A	42,378,325	2,608,038	42,991,680	2,702,374	22
6. 10/1/2009 Assumption Change	N/A	33,747,171	2,076,861	34,235,605	2,151,984	22
7. 10/1/2010 Actuarial Losses	N/A	1,289,428	77,174	1,310,447	79,938	23
8. 10/1/2010 Assumption Change	N/A	(9,551,650)	(571,682)	(9,707,345)	(592,154)	23
9. 10/1/2011 Actuarial Losses	N/A	40,635,211	2,369,184	41,365,575	2,453,180	24
10. 10/1/2011 Assumption Change	N/A	(9,476,773)	(552,531)	(9,647,106)	(572,120)	24
11. 10/1/2012 Actuarial Losses	N/A	24,922,055	1,417,606	25,408,309	1,467,368	25
12. 10/1/2013 Actuarial Gains	N/A	(2,202,428)	(122,392)	(2,248,519)	(126,646)	26
13. 10/1/2013 Assumption Change	N/A	4,785,225	265,921	4,885,368	275,164	26
14. 10/1/2014 Actuarial Gains	N/A	(12,743,886)	(692,767)	(13,027,260)	(716,609)	27
15. 10/1/2014 Assumption Change	N/A	17,611,179	957,357	18,002,782	990,304	27
16. 10/1/2015 Actuarial Gains	(4,708,126)	(4,825,321)	(256,898)	(4,938,465)	(265,653)	28
17. 10/1/2015 Assumption Change	4,768,798	4,887,503	260,209	5,002,105	269,076	28
18. 10/1/2016 Actuarial Gains	(12,376,691)	(12,376,691)	(646,050)	(12,680,823)	(667,853)	29
19. 10/1/2016 Assumption Change	19,912,519	19,912,519	1,039,412	20,401,829	1,074,490	29
20. 10/1/2017 Actuarial Gains	(16,633,232)			(16,633,232)	(858,617)	30
21. 10/1/2017 Assumption Change	5,605,076			5,605,076	289,337	30
Total		\$174,250,622	\$10,588,425	\$ 165,890,680	\$10,400,178	

Projected Unfunded Liability

Date	Total			
October 1, 2017	165,890,680			
October 1, 2018	167,929,742			
October 1, 2019	169,626,480			
October 1, 2020	0			

All bases established prior to 2016 were developed by the prior actuary. The original amounts of these bases were not available.

Assets Table V

	Oct	ober 1, 2016	October 1, 2017		
1. Market Value of Assets*					
a. Cash and cash equivalents (1%)	\$	5,845,458	\$	3,767,666	
b. U.S. government bonds & notes (0%)		627,188		0	
c. Corporate bonds (0%)		4,471,702		0	
d. Equities (50%)		299,369,535		199,340,207	
e. Mutual funds (45%)		0		176,497,450	
f. Real Estate (1%)		45,197,689		2,165,995	
g. Mortgages/loans (0%)		160,020		0	
h. Other assets (4%)		2,073,133		17,461,245	
i. Accrued income receivable (0%)		203,638		167,312	
j. Contributions receivable (0%)		0		0	
k. Other receivables (0%)		443,476		636,055	
I. Benefits payable (0%)		0		0	
m. Other payables (-1%)		(1,093,568)		(3,722,368)	
n. Other adjustments (0%)		0		0	
o. Market Value of Assets	\$	357,298,271	\$	396,313,562	

^{*} The percentages in parentheses indicate the proportion of assets committed to each type of investment as of October 1, 2017.

Asset Reconciliation Table Va

Year Ending	Sep	tember 30, 2016	September 30, 2017		
1. Market Value of Assets as of					
the beginning of the year	\$	334,603,948	\$	357,298,271	
2. Adjustments Due to:					
a. Misclassification of DROP accounts	\$	0	\$	0	
3. Increases Due to:					
a. Contributions:					
i. Employer	\$	13,481,032	\$	14,654,934	
ii. Members		4,441,258		4,829,122	
iii. Total	\$	17,922,290	\$	19,484,056	
b. Investment income (interest and dividends)		4,384,647		6,005,207	
c. Realized and unrealized gains/(losses)		36,534,605		54,149,414	
d. Total increases	\$	58,841,542	\$	79,638,677	
4. Decreases Due to:					
a. Benefit payments	\$	(26,862,768)	\$	(29,028,436)	
b. DROP pension payments		(6,454,788)		(9,075,750)	
c. Refund of member contributions		(429,621)		(364,976)	
d. Administrative expenses		(670,867)		(604,905)	
e. Investment expenses		(1,729,175)		(1,549,319)	
f. Total decreases	\$	(36,147,219)	\$	(40,623,386)	
5. Market Value of Assets as of					
the end of the year	\$	357,298,271	\$	396,313,562	

Reconciliation of DROP Accounts

Table Vb

Year Ending	Sept	ember 30, 2016	September 30, 2017		
Market Value of Assets as of	¢	42.457.045	ŕ	40.020.046	
the beginning of the year	\$	12,457,815	\$	10,038,916	
2. Increases Due to:	Φ.	0.505.044	•	0.705.040	
a. Contributions to DROP Accounts	\$	3,505,811	\$	2,765,643	
b. Investment Return		530,078		299,283	
c. Total increases	\$	4,035,889	\$	3,064,926	
3. Decreases Due to:					
a. Pension Payments	\$	(6,454,788)	\$	(9,075,750)	
b. Expense Charges		0		0	
c. Total decreases	\$	(6,454,788)	\$	(9,075,750)	
4. Market Value of Assets as of					
the end of the year	\$	10,038,916	\$	4,028,092	

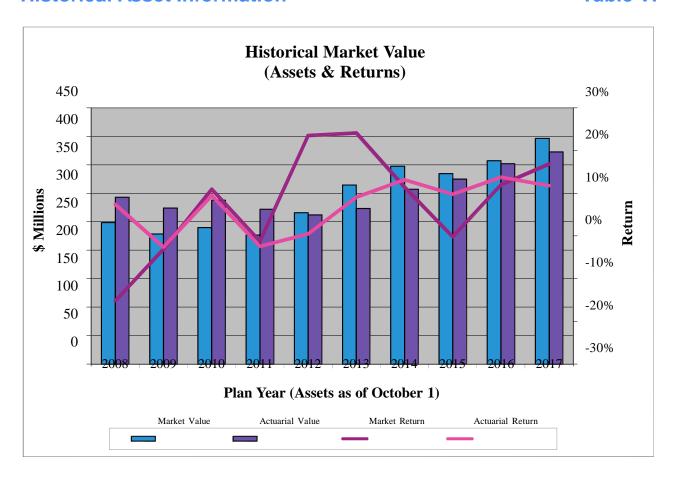
Table Vc

Development of Actuarial Value of Assets

	Year Ending	Se	eptember 30, 2016	Se	eptember 30, 2017
1.	Market Value of Assets, beginning of year				
	a. Market Value including DROP Accounts	\$	334,603,948	\$	357,298,271
	b. DROP Accounts		(12,457,815)		(10,038,916)
	c. Market Value net of DROP Accounts	\$	322,146,133	\$	347,259,355
2.	Net Cash Flow				
	(Contributions less Benefit Payments and				
	Administrative Expenses)	\$	(14,076,855)	\$	(13,579,187)
3.	Gain (Loss) on Investments				
	a. Actual Net Investment Earnings				
	(Net of investment-related expenses	\$	39,190,077	\$	58,605,302
	b. Expected Investment Earnings		25,850,202		27,588,758
	c. Net gain (loss)	\$	13,339,875	\$	31,016,544
4.	Deferral of Gain / (Loss) Recognition in Actuarial Value	9			
	Year Ending Total Gain / (Loss)		Amount Deferred		Amount Deferred
	2013 \$ 38,730,860	\$	7,746,172		
	2014 8,266,792		3,306,717	\$	1,653,358
	2015 (27,504,055)		(16,502,433)		(11,001,622)
	2016 13,339,875		10,671,900		8,003,925
	2017 31,016,544				24,813,235
		\$	5,222,356	\$	23,468,896
5.	End of Year Assets				
	a. Market Value (net of DROP Accounts)	\$	347,259,355	\$	392,285,470
	b. Actuarial Value (prior to the application of the				
	80%/120% corridor)				
	(5.a 4.)	\$	342,036,999	\$	368,816,574
6.	Adjustments to Actuarial Value of Assets				
	a. 80% of Market Value	\$	277,807,484	\$	313,828,376
	b. 120% of Market Value		416,711,226		470,742,564
	c. Actuarial Value of Assets net of DROP Accounts				
	(5.b., not less than 6.a., nor greater than 6.b.)		342,036,999		368,816,574
	d. DROP Accounts		10,038,916		4,028,092
	e. Final Actuarial Value of Assets (6.c. plus 6.d.)		352,075,915		372,844,666

Historical Asset Information

Table VI



Plan Year	Market Value as of	Actuarial Value as of	Benefit	Adr	ninistrative		City and Member	Market Value	Actuarial Value
Ending ¹	October 1	October 1	Payments ²	<u>E</u>	<u>xpenses</u>	Contributions		Return	Return
2007	\$ 306,491,809	\$ 283,130,641							
2008	248,617,329	293,077,340	\$ 17,399,727	\$	627,426	\$	7,210,872	-15.18%	7.41%
2009	228,505,410	274,206,492	18,405,801		636,802		7,611,211	-3.08%	-2.59%
2010	239,911,906	287,894,287	20,104,037		622,604		9,012,253	10.95%	9.47%
2011	226,630,947	271,957,136	22,209,084		548,007		13,704,199	-1.23%	-2.43%
2012	265,874,748	261,967,520	24,120,481		566,863		13,369,217	23.49%	0.50%
2013	314,659,802	273,171,031	26,638,294		552,549		15,147,104	24.12%	9.08%
2014	347,480,566	306,917,954	27,833,871		613,886		15,779,907	11.46%	13.16%
2015	334,603,948	324,954,509	28,306,207		580,988		16,176,224	-0.17%	9.81%
2016	357,298,271	352,075,915	33,747,177		670,867		17,922,290	12.01%	13.77%
2017	396,313,562	372,844,666	38,469,162		604,905		19,484,056	16.86%	11.79%

¹ Asset values from plan years 2014 and later reflect the inclusion of DROP account balances.

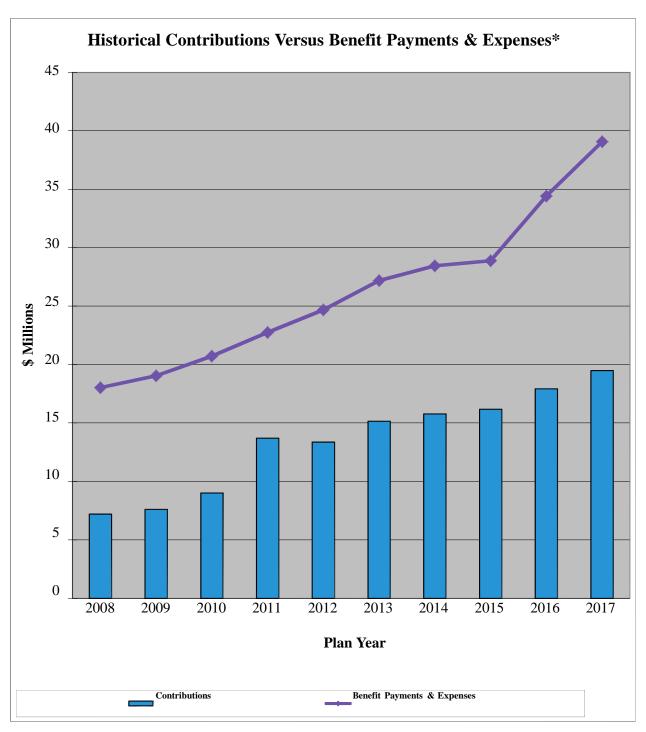
² Includes contributions refunded and payments to DROP accounts.

Revenues by Source and Expenses by Type

Table Vla

				REVEN	JES			
Fiscal		City	Member	Total		Net Invest.		
Year	(Contrib.	Contrib.	Contrib.		Income	Other	Total
2008	\$	3,173,929	\$ 4,036,943	\$ 7,210,872	\$	(45,584,410)	\$ -	\$ (38,373,538)
2009		3,279,364	4,331,847	7,611,211		(7,463,451)	-	147,760
2010		4,431,480	4,580,773	9,012,253		24,324,533	-	33,336,786
2011		8,837,192	4,867,007	13,704,199		(2,886,470)	-	10,817,729
2012		8,684,927	4,684,290	13,369,217		51,765,112	-	65,134,329
2013		10,206,334	4,940,770	15,147,104		62,481,775	-	77,628,879
2014		11,521,139	4,258,768	15,779,907		35,873,600	11,311,721	62,965,228
2015		11,746,935	4,429,289	16,176,224		(565,498)	2,320,442	17,931,168
2016		13,481,032	4,441,258	17,922,290		40,919,252	-	58,841,542
2017		14,654,934	4,829,122	19,484,056		60,154,621	-	79,638,677

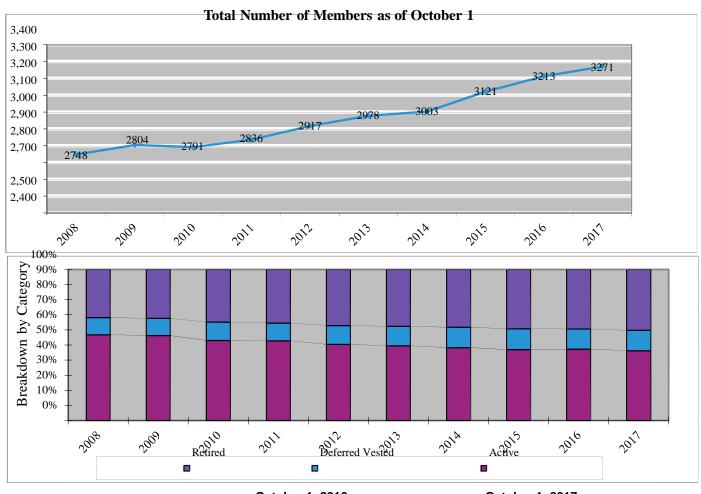
			EXPEN	SES		
Fiscal	Benefits	Member	DROP	Administrative	Investment	
Year	Paid	Refunds	Payments	Expenses	Expenses	Total
2008	\$ 15,522,180	N/A	\$ 1,877,547	\$ 627,426	\$ 1,473,789	\$ 19,500,942
2009	16,265,470	\$ 181,217	1,959,114	636,802	1,217,076	20,259,679
2010	17,890,641	221,221	1,992,175	622,604	1,203,649	21,930,290
2011	19,157,450	293,291	2,758,343	548,007	1,341,597	24,098,688
2012	20,342,550	290,591	3,487,340	566,863	1,203,184	25,890,528
2013	21,669,654	242,428	4,726,212	552,549	1,652,982	28,843,825
2014	23,032,860	289,246	4,511,765	613,886	1,696,708	30,144,465
2015	24,740,015	194,781	3,371,411	580,988	1,920,591	30,807,786
2016	26,862,768	429,621	6,454,788	670,867	1,729,175	36,147,219
2017	29,028,436	364,976	9,075,750	604,905	1,549,319	40,623,386



^{*} Please reference Table VIa for the historical benefit payments, expenses, and contributions.

Summary of Member Data

Table VIII



	October 1, 2016	October 1, 2017
1. Active Members	1,519	1,514
2. Inactive Members not in Receipt	428	441
3. Inactive Members in Receipt		
a. Retirees (excluding DROP)	1,048	1,123
b. DROP Retirees	74	40
c. Disabled	39	40
d. Beneficiaries	<u> </u>	113
e. Sub-total	1,266	1,316
4. Total Members	3,213	3,271

Active Data Table VIIIa

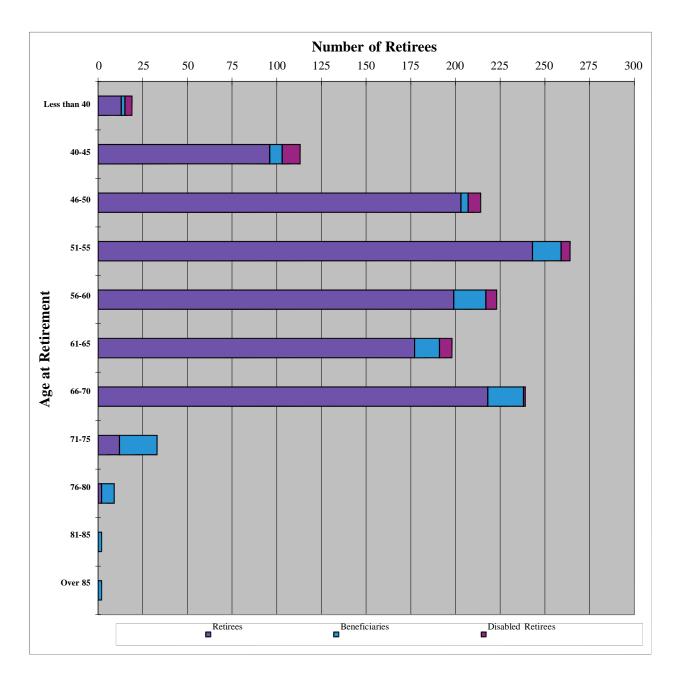
Historical Average Age and Service							
	Total						
	Average	Average					
Date	Service	Age					
10/01/2008	9.5	44.1					
10/01/2009	9.6	44.8					
10/01/2010	9.9	45.3					
10/01/2011	9.8	45.8					
10/01/2012	9.5	45.9					
10/01/2013	9.7	46.2					
10/01/2014	10.0	46.5					
10/01/2015	9.9	46.6					
10/01/2016	9.6	46.2					
10/01/2017	9.7	46.3					

Historical Salary Rate								
Date	Payroll for Fiscal Year	Average Salary						
10/01/2008	76,546,090	49,005						
10/01/2009	79,691,765	50,502						
10/01/2010	76,544,772	51,685						
10/01/2011	75,877,965	50,619						
10/01/2012	74,750,454	50,816						
10/01/2013	77,784,273	52,771						
10/01/2014	76,239,783	52,579						
10/01/2015	76,530,882	52,240						
10/01/2016	87,219,116	57,419						
10/01/2017	86,102,369	56,871						

Historical Salary Increase								
	Assumed	Actual						
	Salary	Salary						
Date	Increase	Increase						
10/01/2007	5.61%	7.91%						
10/01/2008	5.63%	6.14%						
10/01/2009	5.68%	4.40%						
10/01/2010	5.77%	3.00%						
10/01/2011	5.73%	3.01%						
10/01/2012	5.74%	3.45%						
10/01/2013	5.66%	2.65%						
10/01/2014	5.64%	2.74%						
10/01/2015	5.56%	2.74%						
10/01/2016	5.32%	12.39%						
10/01/2017	5.50%	3.42%						

¹ As of October 1, 2017, the 10-year average of historical payroll growth was 1.70%.

Retiree Data Table VIIIb



		Average		
	Avg.	Monthly		
	<u>Age</u>	<u>Benefit</u>		
Non-Disabled Retirees	67.0	\$ 2,191.2	9	
Disabled Retirees	63.7	481.6	2	
Beneficiaries	72.1	1,331.9	3	
All Retired Members	67.3	2,065.5	3	

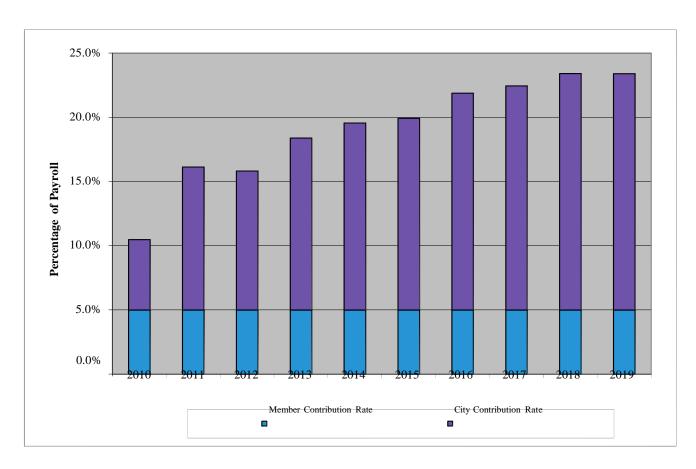
Data Reconciliation

Table VIIIc

		Active	Non-active, Non-retired	Retired	Total
	per of members as of per 1, 2016	1,519	428	1,266	3,213
2. Chan	ge in status during the plan yea	r:			
a.	Actives who became inactive	(59)	59		
b.	Actives who retired	(45)		45	
c.	nactives who became active	1	(1)		
d.	nactives who retired		(19)	19	
e.	Retirees who became active				
3. No lo	nger members due to:				
a.	Death	(7)	(2)	(28)	(37)
b.	Permanent break-in-service				
C.	Receipt of lump sum payment	(60)	(28)		(88)
d.	Expiration of certain period				
e.	Included in error last year	(4)	(5)		(9)
4. New	member due to:				
a.	nitial membership	169			169
b.	Death of another member		1	14	15
c.	Excluded in error last year		8		8
d.	Reinstatement				
5. Numl	per of members as of				
Octol	per 1, 2017	1,514	441	1,316	3,271

Age Under 15 1 to 4 5 to 9 10 to 14 15 to 19 20 to 24 25 to 29 30 to 34 35 to 39 40 & up Total Under 25 17 12 1 37,637 1 30 34,856 36,201 42,197 43,908 100 40,800	Attained					Completed	d Years of S	ervice				
Avg. Pay 33,208 37,637 34,856 25 to 29 27 60 13 100 Avg. Pay 36,201 42,197 43,908 140,800 30 to 34 28 62 36 21 21 Avg. Pay 37,511 43,892 55,095 66,313 141,744 48,623 35 to 39 14 56 48 46 27 27 28 56,300 40 to 44 12 47 41 44 32 14 190 Avg. Pay 42,076 51,597 55,114 65,677 63,867 67,898 58,283 45 to 49 18 43 42 50 57 23 9 242 Avg. Pay 49,128 46,576 56,373 61,032 67,840 71,272 77,575 60,135 55 to 59 15 26 31 45 35 23 16 2 193 Avg. Pay 49,128 46,576 56,373 61,032 67,840 71,272 77,575 60	Age	Under 1	1 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 to 39 4	10 & up	Total
Avg. Pay 33,208 37,637 34,856 25 to 29 27 60 13 100 Avg. Pay 36,201 42,197 43,908 140,800 30 to 34 28 62 36 21 21 Avg. Pay 37,511 43,892 55,095 66,313 141,744 48,623 35 to 39 14 56 48 46 27 27 28 56,300 40 to 44 12 47 41 44 32 14 190 Avg. Pay 42,076 51,597 55,114 65,677 63,867 67,898 58,283 45 to 49 18 43 42 50 57 23 9 242 Avg. Pay 49,128 46,576 56,373 61,032 67,840 71,272 77,575 60,135 55 to 59 15 26 31 45 35 23 16 2 193 Avg. Pay 49,128 46,576 56,373 61,032 67,840 71,272 77,575 60	Under 25	17	12	1								30
Avg. Pay 36,201 42,197 43,908 40,800 30 to 34 28 62 36 21 Avg. Pay 37,511 43,892 55,095 66,313 35 to 39 14 56 48 46 27 Avg. Pay 43,613 45,723 59,754 63,636 66,177 40 to 44 12 47 41 44 32 14 Avg. Pay 42,076 51,597 55,114 65,677 63,867 67,898 45 to 49 18 43 42 50 57 23 9 Avg. Pay 38,842 51,872 55,200 65,131 68,467 79,001 61,603 50 to 54 16 45 48 48 46 23 19 2 247 Avg. Pay 49,128 46,576 56,373 61,032 67,840 71,272 77,575 60,135 55 to 59 15 26 31 45 35 23 16 2 193 Avg. Pay 51,149 </td <td></td>												
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35 to 39 14 56 48 46 27 191 56,300 191 56,300 191 56,300 191 56,300 190 190 56,300 190 </td <td>30 to 34</td> <td></td> <td></td> <td></td> <td>21</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>	30 to 34				21							
Avg. Pay 43,613 45,723 59,754 63,636 66,177 56,300 40 to 44 12 47 41 44 32 14 190 Avg. Pay 42,076 51,597 55,114 65,677 63,867 67,898 58,283 45 to 49 18 43 42 50 57 23 9 242 Avg. Pay 38,842 51,872 55,200 65,131 68,467 79,001 61,603 50 to 54 16 45 48 48 46 23 19 2 247 Avg. Pay 49,128 46,576 56,373 61,032 67,840 71,272 77,575 60,135 55 to 59 15 26 31 45 35 23 16 2 193 Avg. Pay 51,149 44,367 57,085 65,399 62,062 78,322 79,843 62,268 60 to 64 11 19 20 37 27 9 6 1 39 Avg. Pay 47,546	Avg. Pay	37,511	43,892	55,095	66,313							48,623
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	Avg. Pay	40,840	46,448	55,969	63,959	65,867	72,654	76,296				56,934

The average pay shown is the average of the annual rate of pay including any overtime pay and other special compensation.



Fiscal	Member	Expected City		Member	Expected City
Year Ending	Contribution Percentage	Contribution Percentage	Fiscal Year	Contribution Percentage	Contribution Percentage
2010	5.00%	5.48%	2015	5.00%	14.92%
2011	5.00%	11.14%	2016	5.00%	16.88%
2012	5.00%	10.82%	2017	5.00%	17.45%
2013	5.00%	13.39%	2018	5.00%	18.41%
2014	5.00%	14.56%	2019	5.00%	18.40%

Table X: Actuarial Assumptions and Methods

Basis for Assumptions

The mortality assumption was set in accordance with the changes that were enacted in the 2015 legislative session to sections 112.63 and 112.664, Florida Statutes, which require local government pension plans to use the mortality tables used in either of the two most recently published actuarial valuation reports of the Florida Retirement System (FRS), including the projection scale for mortality improvement, and appropriate risk and collar adjustments based on plan demographics. The mortality assumption used in this valuation is the same assumption used in the 2016 FRS valuation as it applies to "other than special risk" participants.

All other assumptions were adopted by the Board in consultation with Conduent.

Actuarial Cost Method

The method used to determine Normal Cost and Accrued Actuarial Liability is the Entry Age Normal Cost Method.

Decrements

Healthy Inactive Mortality

Female: RP-2000 Annuitant Table with White Collar Adjustment projected generationally with Mortality Improvement Scale BB.

Male: RP-2000 Annuitant Table with 50% White Collar and 50% Blue Collar Adjustment projected generationally with Mortality Improvement Scale BB.

Healthy Active Mortality

Female: RP-2000 Combined Healthy Table with White Collar Adjustment projected generationally with Mortality Improvement Scale BB.

Male: RP-2000 Combined Healthy Table with 50% White Collar and 50% Blue Collar Adjustment projected generationally with Mortality Improvement Scale BB.

Disabled Mortality

Female: RP-2000 Disabled Female Retiree Table set forward two years.

Male: RP-2000 Disabled Male Retiree Table set back four years.

Table X: Actuarial Assumptions and Methods (continued)

Retirement

	Membe	rs with Hire D	ates On or Be	efore October	1, 2007	
_			Years of	<u>Service</u>		
<u>Age</u> 56 & Under	<u>10-14</u> 0.0%	<u>15-19</u> 7.5%	<u>20</u> 20.0%	<u>21 - 24</u> 5.0%	<u>25 - 26</u> 10.0%	<u>27+</u> 25.0%
57 - 59	0.0	7.5	30.0	7.5	10.0	25.0
60 - 64	0.0	7.5	30.0	30.0	10.0	25.0
65 & Over	33.0	33.0	50.0	30.0	20.0	100.0
			Years o	f Service		
Age 56 & Under	10-14 0.0%	<u>15-19</u> 5.0%	<u>20-24</u> 5.0%	<u>25</u> 20.0%	<u>26-29</u> 10.0%	30+ 25.0%
57 - 59	0.0	5.0	5.0	30.0	10.0	25.0
60 - 64	0.0	5.0	5.0	30.0	10.0	25.0
65 & Over	33.0	33.0	33.0	50.0	20.0	100.0
_			Years o	f Service		
<u>Age</u> 56 & Under	<u>10-14</u> 0.0%	<u>15-19</u> 5.0%	<u>20-24</u> 5.0%	<u>25</u> 5.0%	<u>26-29</u> 5.0%	<u>30+</u> 25.0%
57 - 59	0.0	5.0	5.0	5.0	5.0	25.0
60 - 61	0.0	5.0	5.0	5.0	5.0	25.0
62	0.0	7.5	15.0	15.0	15.0	50.0
63 - 64	0.0	5.0	5.0	5.0	5.0	50.0
65 & Over	33.0	33.0	33.0	33.0	33.0	100.0

Permanent Withdrawal from Active Status

Permanent witndrawai from Active Status								
Males								
_			Years of	Service				
<u>Age</u>	<u>0 - 1</u>	<u>1 - 2</u>	<u>2 - 3</u>	<u>3 - 4</u>	<u>4 - 5</u>	<u>5+</u>		
Under 30	14.0%	12.0%	8.0%	6.0%	5.0%	4.0%		
30 - 34	14.0	12.0	8.0	6.0	5.0	3.0		
35 - 39	14.0	12.0	8.0	6.0	5.0	2.5		
40 - 64	14.0	12.0	8.0	6.0	5.0	2.0		
65 & Over	14.0	12.0	8.0	6.0	5.0	0.0		
			Years of	Service				
<u>Age</u>	<u>0 - 1</u>	<u>1 - 2</u>	<u>2 - 3</u>	<u>3 - 4</u>	<u>4 - 5</u>	<u>5+</u>		
Under 30	22.0%	16.0%	13.0%	11.0%	10.0%	7.0%		
30 - 34	22.0	16.0	13.0	11.0	10.0	5.0		
35 – 39	22.0	16.0	13.0	11.0	10.0	4.0		
40 - 64	22.0	16.0	13.0	11.0	10.0	3.0		
65 & Over	22.0	16.0	13.0	11.0	10.0	0.0		

Table X: Actuarial Assumptions and Methods (continued)

Disability

Representative values of the assumed annual rates of disability among members in active service are shown in the following table. Two-thirds of disabilities are assumed to be ordinary and one-third is assumed to be service-related. 30% of disabilities are assumed to qualify for Social Security benefits.

Age	Males	Females
25	0.0300%	0.0100%
30	0.0580%	0.0250%
35	0.0730%	0.0480%
40	0.1020%	0.0750%
45	0.1880%	0.1650%
50	0.3130%	0.2850%
55	0.5230%	0.4780%
60	0.6860%	0.5990%
65	0.2390%	0.1500%

Interest Rates

Used for Calculating All Liabilities

8.00% per annum. This interest rate is assumed to be net of investment expenses and commissions.

Underlying Long-term Inflation Rate

3.75% per annum

Marriage Assumption

Percent Married

100% of members are assumed to be married

Age Difference Between Spouses

Male spouses are assumed to be two years older than female spouses

Salary Increases

Salaries are assumed to increase at the annual rates shown in the following table:

Years of Service	Rate
6 and Under	5.00%
7 - 11	4.00
Over 11	3.00

Expenses

Annual administrative expenses, exclusive of investment expenses and commissions, are assumed to be equal to the actual administrative expenses incurred since the previous valuation.

Table X: Actuarial Assumptions and Methods (continued)

Assets

The actuarial value of assets is based on a method that fully recognizes benefit payments, expenses, contributions, interest and dividends for the year, and recognizes gains or losses in the fair market value of assets at the rate of 20% per year. The result cannot be greater than 120% of market value or less than 80% of market value.

Unfunded Liability Bases and Funding Period (Pursuant to Chapter 112, Florida Statutes)

All unfunded liability bases which were established prior to October 1, 2004, as well as those bases established as of that date, were combined into a single, "fresh-start" base effective October 1, 2004. Prior to the October 1, 2016 valuation, this base and new bases established after October 1, 2004 were amortized over a period of 30 years, with a one-year delay in payment.

Effective with the October 1, 2016 valuation, outstanding bases as of October 1, 2015 were re-amortized over their remaining periods without regard to the one-year delay in payment. Those bases were then rolled forward to October 1, 2016. New based established at October 1, 2016 and later will be amortized over a period of 30 years, which is within the maximum amortization period allowed by Chapter 112.64, Florida Statutes. In addition, the annual payment towards the unfunded actuarial accrued liability has been determined as a level percentage of payroll. Total payroll has been assumed to increase at the rate of 4.50% per annum.

Vacation Payout and Accumulated Sick Leave

Service credits were adjusted by 0.15 year for employees in the paid-time-off (PTO) program and 0.25 year for employees not in the PTO program for benefit determination to recognize any accumulated unused sick leave. Final year of earnings was increased by 10% if service greater than 24, 8% if service greater than 17, 6% if service greater than 12, 4% if service greater than 7 and 2% if service 7 or less for benefit determination for non-PTO employees to recognize credits for special pay. No final earnings adjustment was made for PTO employees.

Table Xa: Assumption and Method Changes

The following assumptions have been changed since the prior valuation:

Effective October 1, 2017:

The investment rate of return assumption was decreased from 8.10% to 8.00% to better reflect expectations of future investment returns.

Table XI: Plan Provisions

Ordinances

Original Ordinance: Chapter 2, Article VII, Division 5 (General Employees Pension Plan). Most Recent Ordinance No. 120218 effective September 10, 2012.

Member

All full-time, permanent employees of the City of Gainesville (except police officers and firefighters) or the Gainesville Gas Company are eligible for membership in the Plan upon date of hire.

Member Contributions

5% of Earnings.

Credited Service

Credited Service means the total number of months of service with the City, expressed in terms of full and fractional years. Credited Service will include unused sick leave credits and personal critical leave bank (PLCB) credits. For service earned on or after October 1, 2012, no service shall be credited for unused sick leave or PLCB credits earned on or after October 1, 2012.

Employees who previously chose to participate in the City's 457 plan or defined contribution plan and elect to transfer to this Plan may purchase Credited Service for periods of employment during which they participated in the previous plan.

Earnings

Pay received by a member as compensation for services to the City, including vacation termination pay, overtime pay, longevity pay and certain other specified pay. For members with hire dates on or before October 1, 2012, no more than 300 hours of overtime pay earned after October 1, 2012 will be included, nor will termination vacation pay. For members with hire dates on or after October 2, 2012, no more than 150 hours of overtime pay earned after October 1, 2012 will be included, nor will termination vacation pay.

Final Average Earnings

Final Average Earnings mean average earnings over a consecutive-month period determined by the member's date of hire, according to the following:

For members with hire dates on or before October 1, 2007

For members with hire dates on or after October 2, 2007 but on or before October 1, 2012

48 months

For members with hire dates on or after October 2, 2012

60 months

Table XI: Plan Provisions (continued)

Monthly Accrued Benefit

A monthly benefit payable for life commencing at Normal Retirement Age equal to a percentage of Final Average Earnings multiplied by Credited Service, where the percentage is determined by the member's date of hire, according to the following:

For members with hire dates on or before October 1, 2012 2.00%
For members with hire dates on or after October 2, 2012 1.80%

For Gainesville Gas Company Employees, a monthly benefit payable for life starting at Normal Retirement Age, equal to:

- the accrued benefit earned under the Gainesville Gas Company Employees'
 Pension Plan ("predecessor plan") as of January 10, 1990; plus
- (ii) 2% of Final Average Earnings times Credited Service earned after January 10, 1990; plus
- (iii) for each year of service earned after January 10, 1990, an additional 2% of Final Average Earnings will be credited, not to exceed the service years earned under the accrued benefit formula under the predecessor plan; less
- (iv) for each year of predecessor plan service credited under (iii) above, the portion of the accrued benefit determined under (i) above based on such years.

Normal Retirement Age and Benefit

Eligibility

For members with hire dates on or before October 1, 2007, the eligibility date is the earlier of age 65 and 10 years of Credited Service or 20 years of Credited Service at any age.

For members with hire dates on or after October 2, 2007 and on or before October 1, 2012, the eligibility date is the earlier of age 65 and 10 years of Credited Service or 25 years of Credited Service at any age.

For members with hire dates on or after October 2, 2012, the eligibility date is the earlier of age 65 and 10 years of Credited Service or 30 years of Credited Service at any age.

Amount

Monthly Accrued Benefit

Form of Payment

Life annuity:

Actuarially reduced 66²/₃% joint and contingent annuity (optional);

Actuarially reduced $66^2/_3\%$ joint and last survivor annuity (optional);

Social Security option (optional)

(Note: All forms of payment guarantee at least the return of the Member Contributions.)

Table XI: Plan Provisions (continued)

Early Retirement Age and Benefit

Eligibility

For members with hire dates on or before October 1, 2012, the eligibility date is the attainment of age 55 and 15 years of Credited Service.

For members with hire dates on or after October 2, 2012, the eligibility date is the attainment of age 60 and 20 years of Credited Service.

Amount

Monthly Accrued Benefit reduced by 5% per year for each year that age at retirement precedes age 65.

Form of Payment

Same as for Normal Retirement

Deferred Retirement Option Program (DROP)

Eligibility

A member is eligible for participation in the DROP after completing 27 years of Credited Service

Benefit

Members of the DROP continue as active employees but no longer contribute or accrue benefits. The accrued benefit is calculated at entry into the DROP and is paid into an account within the Plan and is credited with a guaranteed rate of interest, compounded monthly. If a member enters DROP on or before October 1, 2012, the guaranteed interest rate is 6%. For members entering DROP after October 1, 2012, the interest rate is 2.25%.

The maximum period of participation is the earlier of 60 months or the attainment of 35 years of Credited Service. At termination of employment, participant is paid the balance of the account in a lump sum or rollover distribution.

Disability Retirement Eligibility and Benefit

Eligibility

Active members are eligible for a disability benefit provided that they either: (1) become totally and permanently disabled in the line of duty, or (2) have earned at least five consecutive years as a regular employee and become totally and permanently disabled not in the line of duty.

Amount

A monthly benefit equal to Final Average Earnings multiplied by his basic disability percentage, which is a percentage equal to Credited Service multiplied 2.00%, but not less than 42% for disabilities incurred in the line of duty, or 25% for all other disabilities; offset by his disability benefit percentage, up to a maximum of 50%, multiplied by the initial monthly Social Security Primary Insurance Amount (whether or not in payment status) to which a member is entitled. The benefit is limited to \$3,750 per month or an amount equal to his maximum benefit percentage with the above reductions, payable beginning the month of disability or the month following the termination of sick leave payments.

Form of Payment

Monthly benefit payable for life, but in no event will payments be made after the member's recovery from such disability.

Table XI: Plan Provisions (continued)

Termination Benefit

Eligibility

Five years of Credited Service.

Amount

Monthly Accrued Benefit payable at age 65.

Form of Payment

Same as for Normal Retirement

(Note: Members with fewer than 5 years of Credited Service who terminate employment will receive a refund of their Member Contributions without interest.)

Pre-Retirement Death Benefit

In the case of the death of a member prior to retirement, his beneficiary will receive the member's accumulated contributions without interest, or if such member had attained eligibility for normal or early retirement, then his beneficiary will receive the member's benefit accrued as of the date of death and payable in the form chosen by the beneficiary, reduced if paid at the deceased member's Early retirement date and unreduced if paid at the deceased member's normal retirement date.

Cost-of-Living Adjustments

A retired member on or before October 1, 2000 will receive an annual 2% adjustment beginning at the later of October 1, 2000 and the October 1 following his 62nd birthday.

For members with at least 25 years of Credited Service on or before October 1, 2012, a 2% per year increase for retired members and their beneficiaries, commencing at the later of October 1, 2000, or the October 1 following the member's age 60.

For members with at least 20 years of Credited Service (but less than 25) on or before October 1, 2012, a 2% per year increase for retired members and their beneficiaries, commencing at the later of October 1, 2000, or the October 1 following the member's age 62.

For members hired on or before October 1, 2012 who do not have 20 years of Credited Service on or before October 1, 2012, the eligibility date is attainment of age 65 and 25 years of Credited Service.

For new members hired after October 1, 2012, the eligibility date is attainment of age 65 and 30 years of Credited Service.

Cost-of-living increases do not apply during the DROP period.

Actuarial Equivalence

Actuarial equivalence shall mean a benefit of equivalent value to the benefit which otherwise would have been provided to the member, based on the 1994 Group Annuity Mortality Basic Table-Unisex 50/50 and an interest rate of 9.5 percent, unless otherwise specified.