

CITY PENSION FUND FOR FIREFIGHTERS AND POLICE OFFICERS IN THE CITY OF MIAMI BEACH

CHAPTER 112.664, F.S. COMPLIANCE REPORT

In Connection with the October 1, 2014 Funding Actuarial Valuation Report and the Fund's Financial Reporting for the Year Ended September 30, 2014



July 17, 2015

Ms. Donna Brito
Executive Director
City Pension Fund for Firefighters and Police Officers
in the City of Miami Beach
1691 Michigan Avenue, Suite 355
Miami Beach, Florida 33139

Re: October 1, 2014 Chapter 112.664 Compliance Report

#### Dear Donna:

Gabriel, Roeder, Smith & Company (GRS) has been engaged by the Board of Trustees (Board) of the City Pension Fund for Firefighters and Police Officers in the City of Miami Beach (Fund) to prepare a disclosure report to satisfy the requirements set forth in Chapter 112.664, F.S. and as further required pursuant to Chapter 60T-1.0035, F.A.C.

This report was prepared at the request of the Board and is intended for use by the Board and those designated or approved by the Board. This report may be provided to parties other than the Board only in its entirety and only with the permission of the Board.

The purpose of the report is to provide the required information specified in Chapter 112.664, F.S. and to supplement this information with additional exhibits. This report should not be relied on for any purpose other than the purpose described above.

Future actuarial measurements may differ significantly from the current measurements presented in this report due to such factors as the following: plan experience differing from that anticipated by the economic or demographic assumptions; changes in economic or demographic assumptions; increases or decreases expected as part of the natural operation of the methodology used for these measurements (such as the end of an amortization period or additional cost or contribution requirements based on the plan's funded status); and changes in plan provisions or applicable law. The scope of this engagement does not include an analysis of the potential range of such measurements.

This report was based upon information furnished by the City and the Board concerning Fund benefits, Fund provisions and Fund members as used in the corresponding Actuarial Valuation Reports for the Valuation Dates indicated. Financial information was provided by the City and Board as of September 30, 2014. We reviewed the information provided for internal and year-to-year consistency, but did not otherwise audit the data. We are not responsible for the accuracy or completeness of the information provided by the City and Board.

Board of Trustees July 17, 2015 Page 2

Except where specific assumptions are required by Chapter 112.664, F.S, this report was prepared using actuarial assumptions adopted by the Board as described in Section C. The Board's demographic and salary increase assumptions are based on the results of an actuarial experience study for the period October 1, 2003 through September 30, 2009. The Board's investment return assumption is based upon input from the Investment Consultant and based upon a Capital Market Assumption Study completed in 2014. All of the Board's assumptions represent an estimate of future Fund experience. The investment return assumption of 2% higher than the investment return assumption utilized in the Actuarial Valuation Report does not represent an estimate of future Fund experience nor observation of the estimates inherent in market data. This assumption is provided as a counterpart to the Chapter 112.664, F.S. requirement to utilize an investment return assumption of 2% lower than the investment return assumption utilized in the Actuarial Valuation Report. Inclusion of an investment return 2% higher than the investment return assumption utilized in the Actuarial Valuation Report shows a more complete assessment of the range of results as opposed to the one-sided range required by statute.

If all actuarial assumptions are met and if all current and future minimum required contributions are paid Fund assets will be sufficient to pay all Fund benefits. Fund minimum required contributions are determined in compliance with the requirements of the Florida Protection of Public Employee Retirement Benefits Act and for Fire and Police Retirement Chapters 175 and 185 with normal cost determined as a level percent of covered payroll and a level percent of pay amortization payment using a maximum amortization period of 30 years.

The undersigned are members of the American Academy of Actuaries and meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinions contained herein. The signing actuaries are independent of the Fund sponsor.

This report has been prepared by actuaries who have substantial experience valuing public employee retirement systems. To the best of our knowledge the information contained in this report is accurate and presents the actuarial position of the Fund as of the valuation date as required by statute. All calculations have been made in conformity with generally accepted actuarial principles and practices, with the Actuarial Standards of Practice issued by the Actuarial Standards Board and with applicable statutes.

Board of Trustees July 17, 2015 Page 3

With respect to the reporting standards for defined benefit retirement plans or systems contained in Section 112.664(1), F.S., the actuarial disclosures required under this section were prepared and completed by me or 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, meet the requirements of Section 112.664(1), F.S., and Section 60T-1.0035, F.A.C.

Respectfully submitted,

GABRIEL, ROEDER, SMITH AND COMPANY

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Lawrence F. Wilson, M.A.A.A Enrolled Actuary No. 14-02802 Senior Consultant & Actuary

Date: July 17, 2015

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Kelly L. Adams, M.A.A.A Enrolled Actuary No. 14-06857 Consultant & Actuary

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## SECTION A CHAPTER 112.664, F.S. RESULTS

### Net Pension Liability <u>Using Financial Reporting Assumptions per GASB Statements No. 67 and No. 68</u>

	Measurement Date		9/30/2014
A.	Total Pension Liability (TPL)		
	Service Cost	\$	14,763,595
	Interest		75,108,912
	Benefit Changes		0
	Difference Between Actual and Expected Experience		7,685,043
	Assumption Changes		0
	Benefit Payments		(53,605,094)
	Contribution Refunds		0
	Other		0
	Net Change in Total Pension Liability	-	43,952,456
	Total Pension Liability - (beginning of year)		947,553,563
	Total Pension Liability - (end of year)	\$	991,506,019
В.	Plan Fiduciary Net Position		1100
	Contributions - Employer	\$	35,839,777
	Contributions - State	_	120,549
	Contributions - Member		5,258,974
	Net Investment Income		72,259,674
	Benefit Payments		(53,605,094)
	Contribution Refunds		0
	Administrative Expenses		(905,130)
	Other		0
	Net Change in Plan Fiduciary Net Position		58,968,750
	Plan Fiduciary Net Position - (beginning of year)		710,329,822
	Plan Fiduciary Net Position - (end of year)	\$	769,298,572
C.	Net Pension Liability (NPL) - (end of year): (A) - (B)	\$	222,207,447
	Valuation Date		10/1/2013
C			

#### **Certain Key Assumptions**

**Investment Return Assumption** 

8.0%

Mortality Table:

Healthy Members: RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with Blue Collar Adjustment and projected 15 years from valuation date for pre-retirement mortality and 7 years from valuation date for post-retirement mortality with Scale AA. Disabled Members: RP-2000 Disabled Mortality Tables, separate rates for males and females, without projection for future mortality improvement.

#### **Net Pension Liability** Using Assumptions Required Under 112.664(1)(a), F.S.

	Measurement Date		9/30/2014
A.	Total Pension Liability (TPL)		
	Service Cost	S	15,340,449
	Interest	_	77,440,303
	Benefit Changes		0
	Difference Between Actual and Expected Experience		6,145,652
	Assumption Changes		0
	Benefit Payments		(53,605,094)
	Contribution Refunds		0
	Other		0
	Net Change in Total Pension Liability		45,321,310
	Total Pension Liability - (beginning of year)		977,658,476
	Total Pension Liability - (end of year)	\$	1,022,979,786
В.	Plan Fiduciary Net Position		
<b>.</b>	Contributions - Employer	s	35,839,777
	Contributions - State	J	120,549
	Contributions - Member		5,258,974
	Net Investment Income		72,259,674
	Benefit Payments		(53,605,094)
	Contribution Refunds		0
	Administrative Expenses		(905,130)
	Other		0
	Net Change in Plan Fiduciary Net Position		58,968,750
	Plan Fiduciary Net Position - (beginning of year)		710,329,822
	Plan Fiduciary Net Position - (end of year)	\$	769,298,572
C.	Net Pension Liability (NPL) - (end of year): (A) - (B)	\$	253,681,214
	Valuation Date		10/1/2013
Cei	rtain Key Assumptions		
Inv	estment Return Assumption		8.0%

Investment Return Assumption

8.0%

Mortality Table:

RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with fully generational mortality improvements projected to each future payment date with Scale AA.

#### **Net Pension Liability** Using Assumptions Required Under 112.664(1)(b), F.S.

	Measurement Date		9/30/2014
A.	Total Pension Liability (TPL)		
	Service Cost	\$	24,957,422
	Interest	•	76,069,575
	Benefit Changes		0
	Difference Between Actual and Expected Experience		10,851,168
	Assumption Changes		0
	Benefit Payments		(53,605,094)
	Contribution Refunds		(55,005,054)
	Other		0
	Net Change in Total Pension Liability	_	58,273,071
	Total Pension Liability - (beginning of year)		1,260,231,121
	Total Pension Liability - (end of year)	\$	1,318,504,192
	Town I dibloit Diability - (did of your)	_	1,310,304,192
B.	Plan Fiduciary Net Position		
	Contributions - Employer	\$	35,839,777
	Contributions - State	_	120,549
	Contributions - Member		5,258,974
	Net Investment Income		72,259,674
	Benefit Payments		(53,605,094)
	Contribution Refunds		) o
	Administrative Expenses		(905,130)
	Other		` oʻ
	Net Change in Plan Fiduciary Net Position		58,968,750
	Plan Fiduciary Net Position - (beginning of year)		710,329,822
	Plan Fiduciary Net Position - (end of year)	\$	769,298,572
C.	Net Pension Liability (NPL) - (end of year): (A) - (B)	\$	549,205,620
	Valuation Date		10/1/2013
Cer	rtain Key Assumptions		
	estment Return Assumption		6.0%
Mo	rtality Table:		

RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with fully generational mortality improvements projected to each future payment date with Scale AA.

### Net Pension Liability <u>Using Assumptions Required Under 112.664(1)(a), F.S. Plus 2% on Investment Return Assumption</u>

	Measurement Date		9/30/2014
A.	Total Pension Liability (TPL)		
	Service Cost	S	9,844,178
	Interest	-	76,953,085
	Benefit Changes		0
	Difference Between Actual and Expected Experience		3,498,147
	Assumption Changes		0
	Benefit Payments		(53,605,094)
	Contribution Refunds		0
	Other		0
	Net Change in Total Pension Liability		36,690,316
	Total Pension Liability - (beginning of year)		789,085,722
	Total Pension Liability - (end of year)	\$	825,776,038
В.	Plan Fiduciary Net Position		
	Contributions - Employer	S	35,839,777
	Contributions - State	•	120,549
	Contributions - Member		5,258,974
	Net Investment Income		72,259,674
	Benefit Payments		(53,605,094)
	Contribution Refunds		0
	Administrative Expenses		(905,130)
	Other		O O
	Net Change in Plan Fiduciary Net Position		58,968,750
	Plan Fiduciary Net Position - (beginning of year)		710,329,822
	Plan Fiduciary Net Position - (end of year)	\$	769,298,572
C.	Net Pension Liability (NPL) - (end of year): (A) - (B)	\$	56,477,466
	Valuation Date		10/1/2013

#### **Certain Key Assumptions**

**Investment Return Assumption** 

10.0%

Mortality Table:

RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with fully generational mortality improvements projected to each future payment date with Scale AA.

### Asset and Benefit Payment Projection Not Reflecting Any Future Contributions Using Financial Reporting Assumptions per GASB Statements No. 67 and No. 68

	Market Value of	Expected Investment	Projected Benefit	Market Value of Assets
FYE	Assets (BOY)	Return	Payments	(EOY)
2015	754,162,771	57,450,482	58,869,871	752,743,382
2016	752,743,382	57,267,221	60,524,484	749,486,119
2017	749,486,119	56,922,404	62,542,020	743,866,502
2018	743,866,502	56,384,617	64,680,859	735,570,260
2019	735,570,260	55,616,327	67,235,853	723,950,734
2020	723,950,734	54,592,310	69,591,743	708,951,301
2021	708,951,301	53,304,241	71,838,339	690,417,203
2022	690,417,203	51,744,201	73,872,661	668,288,743
2023	668,288,743	49,904,929	75,753,785	642,439,887
2024	642,439,887	47,773,601	77,547,622	612,665,866
2025	612,665,866	45,337,164	79,178,342	578,824,688
2026	578,824,688	42,578,871	80,774,222	540,629,337
2027	540,629,337	39,484,579	82,131,419	497,982,497
2028	497,982,497	36,040,396	83,394,575	450,628,318
2029	450,628,318	32,223,726	84,616,717	398,235,327
2030	398,235,327	28,007,919	85,804,788	340,438,458
2031	340,438,458	23,373,273	86,739,840	277,071,891
2032	277,071,891	18,302,329	87,522,328	207,851,892
2033	207,851,892	12,771,837	88,168,525	132,455,204
2034	132,455,204	6,759,552	88,597,303	50,617,454
2035	50,617,454	968,665	88,838,052	•
2036	-	•	88,880,797	-
2037	-	-	88,735,975	•
2038	-	•	88,422,626	-
2039	-	•	87,920,405	-
2040	-	-	87,230,086	-
2041	•	-	86,346,613	-
2042	-	-	85,271,408	-
2043	-	-	83,997,440	-
2044	•	-	82,519,801	•
2045	-	-	80,835,461	-
2046	-	-	78,943,955	•
2047	-	•	76,843,976	-
2048	-	•	74,540,365	

Number of years for which current market value of assets are adequate to sustain the payment of expected retirement benefits reflecting no contributions from the Employer, Employee or State:

20.50

#### **Certain Key Assumptions**

Investment return assumption

7.95%

Mortality Table:

Healthy Members: RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with Blue Collar Adjustment and projected 15 years from valuation date for pre-retirement mortality and 7 years from valuation date for post-retirement mortality with Scale AA. Disabled Members: RP-2000 Disabled Mortality Tables, separate rates for males and females, without projection for future mortality improvement.

Note: As required in Section 112.664(c) of the Florida Statutes, the projection of Fund assets does not include future contributions from the City, Member or State. For this reason, this projection should not be viewed as representative of the amount of time the Fund can sustain benefit payments. Under the Government Accounting Standards Board standards which include City, Member and State contributions, the Fund is expected to be able to pay all future benefit payments.



### Asset and Benefit Payment Projection Not Reflecting Any Future Contributions <u>Using Assumptions Required Under 112.664(1)(a), F.S.</u>

	Market Value of	Expected Investment	Projected Benefit	Market Value of Assets
FYE	Assets (BOY)	Return	Payments	(EOY)
2015	754,162,771	57,450,288	58,874,408	752,738,651
2016	752,738,651	57,263,726	60,597,758	749,404,620
2017	749,404,620	56,909,199	62,700,056	743,613,763
2018	743,613,763	56,353,881	64,930,937	735,036,706
2019	735,036,706	55,558,996	67,586,264	723,009,439
2020	723,009,439	54,497,893	70,051,895	707,455,436
2021	707,455,436	53,160,639	72,418,254	688,197,822
2022	688,197,822	51,537,482	74,584,107	665,151,196
2023	665,151,196	49,619,088	76,609,223	638,161,061
2024	638,161,061	47,390,338	78,560,242	606,991,157
2025	606,991,157	44,835,612	80,362,856	571,463,913
2026	571,463,913	41,935,291	82,146,385	531,252,819
2027	531,252,819	38,672,061	83,707,678	486,217,203
2028	486,217,203	35,028,523	85,192,832	436,052,893
2029	436,052,893	30,978,229	86,655,050	380,376,073
2030	380,376,073	26,490,333	88,102,192	318,764,214
2031	318,764,214	21,540,531	89,316,012	250,988,732
2032	250,988,732	16,106,392	90,396,570	176,698,555
2033	176,698,555	10,159,252	91,361,608	95,496,198
2034	95,496,198	3,670,972	92,129,776	7,037,394
2035	7,037,394	-	92,729,271	•
2036	-	-	93,149,581	•
2037	-	•	93,399,383	•
2038	-	-	93,497,850	-
2039	-	-	93,422,570	-
2040	-	-	93,171,855	-
2041	-	-	92,739,152	-
2042	-	-	92,120,873	-
2043	-	15 -	91,306,140	•
2044	-	-	90,284,684	•
2045	-	-	89,048,539	-
2046	-	•	87,594,421	•
2047	-	-	85,912,374	-
2048	-	-	84,001,043	-

Number of years for which current market value of assets are adequate to sustain the payment of expected retirement benefits reflecting no contributions from the Employer, Employee or State:

20.00

#### **Certain Key Assumptions**

Investment return assumption

7.95%

Mortality Table:

RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with fully generational mortality improvements projected to each future payment date with Scale AA.

Note: As required in Section 112.664(c) of the Florida Statutes, the projection of Fund assets does not include future contributions from the City, Member-or-State. For this reason, this projection should not be viewed as representative of the amount of time the Fund can sustain benefit payments. Under the Government Accounting Standards Board standards which include City, Member and State contributions, the Fund is expected to be able to pay all future benefit payments.

### Asset and Benefit Payment Projection Not Reflecting Any Future Contributions Using Assumptions Required Under 112.664(1)(b), F.S.

	Market Value of	Expected Investment	Projected Benefit	Market Value of Assets
FYE	Assets (BOY)	Return	Payments	(EOY)
2015	754,162,771	42,991,966	58,874,408	738,280,329
2016	738,280,329	41,991,909	60,597,758	719,674,479
2017	719,674,479	40,817,704	62,700,056	697,792,127
2018	697,792,127	39,444,439	64,930,937	672,305,629
2019	672,305,629	37,843,169	67,586,264	642,562,534
2020	642,562,534	35,994,691	70,051,895	608,505,330
2021	608,505,330	33,892,695	72,418,254	569,979,772
2022	569,979,772	31,531,237	74,584,107	526,926,902
2023	526,926,902	28,904,900	76,609,223	479,222,579
2024	479,222,579	26,004,168	78,560,242	426,666,505
2025	426,666,505	22,819,498	80,362,856	369,123,148
2026	369,123,148	19,338,694	82,146,385	306,315,457
2027	306,315,457	15,551,762	83,707,678	238,159,541
2028	238,159,541	11,449,042	85,192,832	164,415,751
2029	164,415,751	7,014,577	86,655,050	84,775,277
2030	84,775,277	2,235,012	88,102,192	•
2031	-	-	89,316,012	-
2032	-	-	90,396,570	-
2033	-	-	91,361,608	•
2034	-	-	92,129,776	•
2035	~	-	92,729,271	-
2036	-	-	93,149,581	•
2037	-	-	93,399,383	•
2038	-	-	93,497,850	-
2039	-	-	93,422,570	-
2040	-	-	93,171,855	•
2041	-	-	92,739,152	-
2042	-	•	92,120,873	- 10
2043	-	-	91,306,140	•
2044	-	•	90,284,684	•
2045	-	-	89,048,539	•
2046	-	-	87,594,421	•
2047	•	•	85,912,374	-
2048	•	•	84,001,043	-

Number of years for which current market value of assets are adequate to sustain the payment of expected retirement benefits reflecting no contributions from the Employer, Employee or State:

15.92

#### **Certain Key Assumptions**

Investment return assumption

5.95%

Mortality Table:

RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with fully generational mortality improvements projected to each future payment date with Scale AA.

Note: As required in Section 112.664(c) of the Florida Statutes, the projection of Fund assets does not include future contributions from the City, Member or State. For this reason, this projection should not be viewed as representative of the amount of time the Fund can sustain benefit payments. Under the Government Accounting Standards Board standards which include City, Member and State contributions, the Fund is expected to be able to pay all future benefit payments.



#### Asset and Benefit Payment Projection Not Reflecting Any Future Contributions

#### Using Assumptions Required Under 112.664(1)(a), F.S. Plus 2% on Investment Return Assumption

	Market Value of	Expected Investment	Projected Benefit	Market Value of Assets
FYE	Assets (BOY)	Return	Payments	(EOY)
2015	754,162,771	71,912,087	58,874,408	767,200,450
2016	767,200,450	73,117,801	60,597,758	779,720,493
2017	779,720,493	74,251,882	62,700,056	791,272,319
2018	791,272,319	75,282,795	64,930,937	801,624,177
2019	801,624,177	76,171,768	67,586,264	810,209,681
2020	810,209,681	76,895,064	70,051,895	817,052,849
2021	817,052,849	77,450,270	72,418,254	822,084,865
2022	822,084,865	77,835,917	74,584,107	825,336,675
2023	825,336,675	78,051,908	76,609,223	826,779,360
2024	826,779,360	78,091,827	78,560,242	826,310,944
2025	826,310,944	77,949,474	80,362,856	823,897,562
2026	823,897,562	77,614,610	82,146,385	819,365,787
2027	819,365,787	77,080,771	83,707,678	812,738,880
2028	812,738,880	76,342,510	85,192,832	803,888,558
2029	803,888,558	75,384,237	86,655,050	792,617,745
2030	792,617,745	74,185,926	88,102,192	778,701,479
2031	778,701,479	72,736,786	89,316,012	762,122,253
2032	762,122,253	71,029,759	90,396,570	742,755,442
2033	742,755,442	69,051,504	91,361,608	720,445,337
2034	720,445,337	66,790,847	92,129,776	695,106,408
2035	695,106,408	64,237,781	92,729,271	666,614,919
2036	666,614,919	61,380,553	93,149,581	634,845,891
2037	634,845,891	58,206,267	93,399,383	599,652,775
2038	599,652,775	54,699,322	93,497,850	560,854,247
2039	560,854,247	50,842,867	93,422,570	518,274,544
2040	518,274,544	46,619,503	93,171,855	471,722,192
2041	471,722,192	42,010,527	92,739,152	420,993,567
2042	420,993,567	36,995,869	92,120,873	365,868,563
2043	365,868,563	31,554,205	91,306,140	306,116,628
2044	306,116,628	25,663,142	90,284,684	241,495,086
2045	241,495,086	19,298,957	89,048,539	171,745,504
2046	171,745,504	12,436,109	87,594,421	96,587,191
2047	96,587,191	5,047,198	85,912,374	15,722,016
2048	15,722,016	83,431	84,001,043	

Number of years for which current market value of assets are adequate to sustain the payment of expected retirement benefits reflecting no contributions from the Employer, Employee or State:

33.17

#### **Certain Key Assumptions**

Investment return assumption

9.95%

Mortality Table:

RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with fully generational mortality improvements projected to each future payment date with Scale AA.

Note: As required in Section 112.664(c) of the Fiorida Statutes, the projection of Fund assets does not include future contributions from the City, Member or State. For this reason, this projection should not be viewed as representative of the amount of time the Fund can sustain benefit payments. Under the Government Accounting Standards Board standards which include City, Member and State contributions, the Fund is expected to be able to pay all future benefit payments.



		PΑC	TUARIAL )	DETER	ACTUARIAL DETERMINED CONTRIBUTION	TRIBUTION						
		Valuation Assumptions	ptions	3	112.664(1)(a), F.S. Assumptions	۶۰. در		112.664(1)(b), F.S. Assumptions	સ જ.	Y	112.664(1)(a), F.S. Assumptions Plus 2% on Investment Return Assumption	F.S. thru
A. Valuation Date		October 1, 2014	4		October 1, 2014	114		October 1, 2014	714		October 1, 2014	114
B. Actuarial Determined Contribution to Be Paid During Fiscal Year Ending		9/30/2016			9/30/2016			9/30/2016	24		9/30/2016	
C. Annual Payroll of Active Employees	8	49,356,212	_	S	49,356,212		57	49,356,212		s,	49,356,212	
D. Total Minimum Funding Requirement 1. Total Normal Cost	59	17,003,690		S	17,650,215		•	28,021,652		v	11,702,279	
Actuarial Liability 3. Interest Adjustment		21,803,554			23,778,495			36,145,978			11,783,472	
4. Expected Service Buyback	-	135,730			135,730			135,730			135,730	
5. Total Minimum Funding Requirement	<b>5</b>	39,129,244		S	41,750,710		49	64,445,401		S	23,850,371	
<ul><li>Expected Payroll of Active Employees for Following Plan Year (\$ / % of pay)</li></ul>	ø	50,491,405 102.30%	102.30%	62	50,491,405 102.30%	102.30%	s	50,491,405 102.30%	102.30%	s	50,491,405	102.30%
F. Expected Contribution Sources (\$ / % of pay)  1. City	· ·	34,850,092	69.02%	٠,	37,531,851	74.33%	•	60,748,520	120.31%	s	19,219,805	38.07%
2. Meliber 3. State		5,058,576 120,549	0.24%		5,058,576 120,549	10.02% 0.24%		5,058,576 120,549	10.02% 0.24%		5,058,576 120,549	10.02% 0.24%
4. Total	<b>"</b>	40,029,217	79.28%	S	42,710,976	84.59%	ss.	65,927,645	130.57%	s	24,398,930	48.32%

Unfunded Actuarial Accrued Liabilities Bases and Amortization Payments
Amort

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			, ,				Remaining
	Amortization Base	Liabilities	Valuations Assumptions	112.004(1)(a), F.S. <u>Assumptions</u>	112.664(1)(b), F.S. <u>Assumptions</u>	112.664(1)(a), F.S. Assumptions Plus 2%	Funding <u>Period</u>
10/01/2001	Initial Unfunded Liability	\$ 12,038,678 \$	1,051,837	\$ 1,051,837	\$ 923,733	\$ 1.185,539	17 years
10/01/2002	Method Change	13,645,910	1,151,909	1,151,909	1,004,582	1,306,069	18 years
10/01/2003	Plan Amendment	1,174,307	96,048	96,048	83,192	109,532	19 years
10/01/2003	Actuarial (Gain) / Loss	35,355,861	2,891,784	2,891,784	2,504,718	3,297,773	19 years
10/01/2004	Actuarial (Gain) / Loss	37,846,476	3,006,934	3,006,934	2,587,012	3,448,367	20 years
10/01/2005	Method Change	(33,495,283)	(2,590,982)	(2,590,982)	(2,214,501)	(2,987,565)	21 years
10/01/2005	Assumption Change	6,737,252	521,151	521,151	445,425	600,920	21 years
10/01/2005	Actuarial (Gain) / Loss	25,018,853	1,935,299	1,935,299	1,654,092	2,231,522	21 years
10/01/2006	Method Change	(5,024,223)	(379,157)	(379,157)	(321,976)	(439,507)	22 years
10/01/2006	Actuarial (Gain) / Loss	21,748,853	1,641,297	1,641,297	1,393,768	1,902,537	22 years
10/01/2007	Actuarial (Gain) / Loss	25,293,112	1,865,621	1,865,621	1,574,249	2,173,671	23 years
10/01/2008	Assumption Change	6,010,626	434,046	434,046	363,987	508,233	24 years
10/01/2008	Actuarial (Gain) / Loss	33,175,314	2,395,695	2,395,695	2,009,008	2,805,163	24 years
10/01/2009	Assumption Change	23,543,225	1,667,001	1,667,001	1,389,440	1,961,336	25 years
10/01/2009	Actuatial (Gain) / Loss	67,758,290	4,797,691	4,797,691	3,998,862	5,644,800	25 years
10/01/2010	Assumption Change	4,547,266	316,136	316,136	261,929	373,692	26 years
10/01/2010	Actuarial (Gain) / Loss	17,183,948	1,194,664	1,194,664	989,821	1,412,168	26 years
10/01/2011	Plan Amendment	(3,078,131)	(210,383)	(210,383)	(173,293)	(249,811)	27 years
10/01/2011	Assumption Change	16,999,039	1,161,845	1,161,845	957,014	1,379,586	27 years
10/01/2011	Actuarial (Gain) / Loss	30,238,124	2,066,706	2,066,706	1,702,350	2,454,027	27 years
10/01/2012	Assumption Change	7,738,225	520,556	520,556	426,333	620,820	28 years
10/01/2012	Actuarial (Gain) / Loss	26,053,631	1,752,648	1,752,648	1,435,410	2,090,223	28 years
10/01/2012	Plan Amendment	(19,912,706)	(1,339,543)	(1,339,543)	(1,097,079)	(1,597,551)	28 years
10/01/2013	Actuarial (Gain) / Loss	1,539,997	102,073	102,073	83,129	122,248	29 years
10/01/2013	Method Change	(63,886,872)	(4,234,491)	(4,234,491)	(3,448,617)	(5,071,483)	29 years
10/01/2014	Actuarial (Gain) / Loss	(5,882,483)	(384,536)	(384,536)	(311,454)	(462,431)	30 years
10/01/2014	Assumption Change	2,686,196	371,705	371,705	301,062	447,000	30 years
10/01/2014	Assumption Change - 112.664(1)(a), F.S. Assumptions	30,211,871	N/A	1,974,941	N/A	N/A	30 years
10/01/2014	Assumption Change - 112.664(1)(b), F.S. Assumptions	332,863,130	N/A	N/A	17,623,782	N/A	30 years
10/01/2014	Assumption Change - 112.664(1)(a), F.S. Assumptions Plus 2%	(171,519,623)	N/A	N/A	N/A	(13,483,406)	30 years

### SECTION B SUMMARY OF PLAN PROVISIONS

### Outline of Principal Provisions of the Retirement Plan (as of October 1, 2014)

#### A. Relevant Provisions:

The Plan was created under Chapter 23414, Laws of Florida, Special Act of 1945, as amended by Ordinance No. 2014-3848 adopted March 5, 2014.

#### B. Eligibility Requirements:

Any full-time employee of the City who is certified as a Firefighter or Police Officer as a condition of employment.

#### C. Membership Tiers:

- Tier 1 Members hired prior to July 14, 2010
- Tier 2 Members hired on or after July 14, 2010 but prior to September 30, 2013
- Tier 3 Members hired on or after September 30, 2013

#### D. Credited Service:

All periods of employment as an Employee for which contributions have been made to the Fund together with all service in the uniformed services of the United States required to be included.

#### E. Pre-Employment Service:

Effective September 30, 2013 members with at least 5 years of service may contribute an additional amount of 10% for those hired prior to September 30, 2013 and 10.5% for those hired on or after September 30, 2013 to receive credit for pre-employment military service. A member may purchase up to 2 total years of additional service credit at the 3% accrual rate for time spent on active military duty. The total of all combinations of pre-employment benefit purchased cannot exceed a 12% increase in accrual.

Pre-employment benefit service must be purchased within 36 months following September 30, 2013, or upon completion of 5 years of creditable pension service under the pension plan, whichever occurs later.

Effective September 30, 2013, members will no longer be able to purchase an increase in benefit multiplier or pre-employee public safety service credit as a Police Officer or Firefighter.

#### Outline of Principal Provisions of the Retirement Plan (as of October 1, 2014)

#### F. Pensionable Pay:

Salary is defined as base pay, longevity pay, overtime, shift differential and extra compensation allowance such as uniform allowance and any pays which are negotiated as pensionable. Effective July 14, 2010, off-duty pay is pensionable for any member who is eligible for overtime and receives off-duty compensation through the City. Effective September 30, 2013, overtime is limited to 300 hours a year.

- 1. Overtime and Off-Duty pay included in pension computation for Police Officers:
  - Off-Duty and overtime pay not exceeding 300 hours per calendar year is limited in each year to an amount that is equal to 11% of highest annualized pay rate for the same salary rank that the member is in at time of retirement.
  - The 11% limitation shall not apply to any member who holds the rank of sergeant or lieutenant on September 30, 2013, or any Police Officer promoted to the rank of sergeant prior to the date the 2013 Certified Police Sergeant Promotional Register expires in 2015. For these members, the inclusion of overtime and/or off duty in the member's salary for the 2 highest paid years, or the last 2 paid years, as the case may be, shall be limited in each year to an amount which is equal to 70% of the difference between the member's annualized pay rate at retirement and the highest annualized pay rate for the next higher salary rank.
- 2. Overtime and Off-Duty pay included in pension computation for Firefighters:
  - Off-Duty and overtime pay not exceeding 300 hours per calendar year is limited in each year to an amount that is equal to 11% of highest annualized pay rate for the same salary rank that the member is in at time of retirement.

#### G. Final Average Monthly Earnings (FAME):

Tier 1 and eligible to retire prior to September 30, 2015 - the greater of the average of the 2 highest paid years prior to date of retirement or the 2 last paid years after taking into consideration the overtime limit.

Tier 1 and eligible to retire on or after September 30, 2015 - the greater of the average of the 3 highest paid years prior to date of retirement or the 3 last paid years after taking into consideration the overtime limit.

Tier 2 - the greater of the average of the 3 highest paid years prior to date of retirement or the 3 last paid years after taking into consideration the overtime limit.

Tier 3 - the greater of the average of the 5 highest paid years prior to date of retirement or the 5 last paid years after taking into consideration the overtime limit.

### Outline of Principal Provisions of the Retirement Plan (as of October 1, 2014)

#### H. Normal Retirement:

#### 1. Eligibility:

Tier 1 and eligible to retire prior to September 30, 2013 - the earlier of attainment of age 50 or Rule of 70

Tier 1 and eligible to retire on or after September 30, 2013 - the earlier of attainment of age 50 or Rule of 70 (must attain age 47)

Tier 2 and Tier 3 - the earlier of attainment of age 50 or Rule of 70 (must attain age 48)

#### 2. Benefit:

Tier 1 and eligible to retire prior to September 30, 2013:

3% x FAME x Credited Service up to 15 years + 4% x Credited Service after 15 years Benefit shall not exceed 90% of FAME.

Tier 1 and eligible to retire on or after September 30, 2013 but prior to September 30, 2015: 3% x FAME x Credited Service up to 20 years + 4% x Credited Service after 20 years Benefit shall not exceed 85% of FAME (exception if exceeded 85% as of September 30, 2013).

Tier 1 and eligible to retire on or after September 30, 2015, Tier 2 and Tier 3: 3% x FAME x Credited Service up to 20 years + 4% x Credited Service after 20 years Benefit shall not exceed 85% of FAME.

A member's benefit multiplier for credited service earned before October 1, 2013 shall not be reduced.

#### I. Deferred Retirement:

#### 1. Eligibility:

Any first day of a month past Normal Retirement Date.

#### 2. Benefit:

Benefit calculated as for Normal Retirement based upon service and pay to Deferred Retirement Date.

#### J. Disability Retirement:

#### 1. Eligibility:

Totally and permanently disabled meaning incapacity to perform regular duty as Firefighter or Police Officer (and completion of at least 5 years of Credited Service for non-service incurred disability).

#### 2. Benefit:

Accrued benefit (minimum of 85% of current salary at time of disability for service incurred disability).

### Outline of Principal Provisions of the Retirement Plan (as of October 1, 2014)

#### K. Death Benefit:

#### 1. Service Incurred:

Greater of accrued benefit and 85% of compensation payable as a monthly benefit to the widow until death or remarriage, to a Domestic Partner until death, marriage or entry into another Domestic Partnership, to unmarried children in equal shares until age 18 (until age 22 if a full-time student or until recovery from handicap if handicapped), or to dependent parents in equal shares.

#### 2. Non-Service Incurred:

For members with at least 5 years of service, accrued benefit is payable for the first 12 months after death and 75% of the accrued benefit is payable thereafter (with a minimum benefit of 25% of average monthly salary); Benefits are payable to the widow until death or remarriage, to a Domestic Partner until death, marriage or entry into another Domestic Partnership, to unmarried children in equal shares until age 18 (until age 22 if a full-time student or until recovery from handicap or until marriage if handicapped), or to dependent parents in equal shares. However, if the member has been married for less than 10 years, benefits are payable to the spouse only for the life expectancy of the deceased member at time of death.

#### L. Withdrawal Benefit:

#### 1. Eligibility:

Any age prior to 50 with at least 5 years of service for members who terminate employment on or after September 30, 2013.

#### 2. Benefit:

Return of employee contributions or accrued benefit upon attainment of age 50. If a member withdrawals with less than 10 years of service and passes away prior to the normal retirement date the return of employee contributions is the only benefit.

#### M. Employee Contributions:

10% of salary per year (on a pre-tax basis) for members hired prior to September 30, 2013 and 10.5% of salary per year (on a pre-tax basis) for members hired on or after September 30, 2013; If contributions are refunded to the member or to his beneficiaries, then interest is credited at the rate of 3% per annum.

### Outline of Principal Provisions of the Retirement Plan (as of October 1, 2014)

#### N. Normal Form of Payment of Retirement Income:

For members except those retiring prior to November 5, 2003, the normal form of payment is a 75% joint and survivor annuity with a specified beneficiary as provided under the plan. The specified beneficiary will receive a survivor annuity equal to 100% of the total benefit for one year following the death of the member and thereafter the greater of 75% of the total benefit or 25% of the average monthly salary for the two highest paid years. However, upon death, if the member has been married for less than 10 years, the survivor annuity is payable only for the life expectancy of the deceased member at time of death.

The members may also elect the actuarial equivalent of the 10 year certain and life annuity, with a designated beneficiary, any of the following optional forms of payment:

- 75% joint and contingent survivor annuity with a designated beneficiary
- 66 3/3% joint and contingent annuity with a designated beneficiary
- 50% joint and contingent annuity with a designated beneficiary
- 25% joint and contingent annuity with a designated beneficiary
- 10 year certain and life annuity with a designated beneficiary

Members who retired prior to November 5, 2003 were subject to different normal and optional forms of payment.

#### O. <u>Deferred Retirement Option Program (DROP):</u>

Police Officers and Firefighters are eligible to participate in a Deferred Retirement Option Program (DROP) upon meeting any one of the following criteria:

- the attainment of age 50 or
- the sum of the member's age and creditable service equal to at least 70 (minimum age may apply)

#### Operations of the DROP:

- The member's monthly retirement benefit, based on final average earnings and service, will be calculated as of the date prior to them entering the DROP.
- The member's monthly pension will be deposited into the selected investment vehicles.
- The member will cease to accrue additional pension benefits (with the exception of the COLA under the pension plan).
- The member will no longer be eligible for Disability or Service Connected Death benefits from the Pension Plan.
- Member contributions to the Pension Plan will cease upon entering the DROP.

### Outline of Principal Provisions of the Retirement Plan (as of October 1, 2014)

- Upon entering the DROP, the member will select the length of the DROP period. The maximum period of participation in the DROP is 36 months for members who enter the DROP prior to September 1, 2012 and 60 months for members who enter the DROP on or after September 1, 2012. Notwithstanding the above, participation may not continue beyond the date when the member's combined years of creditable service and time in the DROP equals 352 months for members who enter the DROP prior to September 1, 2012 and 408 for members who enter the DROP on or after September 1, 2012.
- The member will not have access or be able to borrow against any of the funds accumulated in their DROP account.
- The member may sever employment with the City at any time during the DROP period. Such separation will terminate their participation in the DROP.
- No payment will be made from the DROP account until the member severs employment with the City.
- Following severance of employment, the funds in the DROP will be paid under the options the
  member selected. The member will also start receiving their monthly pension which was previously
  being deposited in the DROP.
- A 2.5% COLA (1.5% per year for participants hired on or after July 14, 2010) is paid annually on
  the anniversary date of the member's retirement. For members who enter the DROP after September
  1, 2012 and before September 30, 2013 no cost of living adjustment for the third and fourth annual
  anniversary date, if the member participates in the DROP for six months or longer. Any member who
  exits the DROP within 6 months following the date of DROP entry, shall be eligible for the 2.5%
  COLA annually on the anniversary date of the member's retirement.

#### P. Cost-of-Living Adjustment:

Effective October 1, 2010, benefits are increased by 2.5% per year (1.5% per year for participants hired on or after July 14, 2010), compounded annually, on the anniversary date of each member's retirement. Members whose grandfathered Base Plan benefit is greater than the benefit otherwise provided by this plan will receive the applicable cost-of-living adjustment on that basis (2% a year beginning the October three years after retirement) until such time as the benefit from this plan with 2.5% cost-of-living exceeds that comparable grandfathered Base Plan benefit.

For members retired prior to October 1, 2010, benefit increases occur on the first of October each year.

#### Q. Changes Since Previous Actuarial Valuation

None.

#### **SECTION C**

### ACTUARIAL ASSUMPTIONS AND COST METHODS USED FOR FUNDING

### Actuarial Assumptions and Actuarial Cost Methods Used in the Valuation (as of October 1, 2014)

#### A. Mortality

For healthy participants, RP-2000 Combined Healthy Participant Mortality Tables, separate rates for males and females, with Blue Collar Adjustment and projected 15 years from valuation date for pre-retirement mortality and 7 years from valuation date for post-retirement mortality with Scale AA.

For disabled participants, RP-2000 Disabled Mortality Tables, separate rates for males and females, without projection for future mortality improvement.

#### B. Investment Return

7.95%, compounded annually, net of investment expenses.

#### C. Expenses

Prior year's actual administrative expenses.

#### D. Employee Withdrawal Rates

Representative values of the assumed annual rates of withdrawal among members in active service are as follows:

Age	Withdrawal Rate	Age	Withdrawal Rate
20	0.50%	35	1,50%
25	1.00%	40	0.75%
30	1.25%	45	025%

#### E. Disability Rates

Representative values of the assumed annual rates of disability among members in active service are as follows:

Age	Disability Rates	Age	Disability <u>Rate</u>
20	0.0007	45	0.0058
25	0.0011	50	0.0099
30	0.0016	55	0.0142
35	0.0022	60	0.0200
40	0.0032	64	0.0269

55% of disabilities are assumed to be ordinary - 45% accidental.

### Actuarial Assumptions and Actuarial Cost Methods Used in the Valuation (as of October 1, 2014)

#### F. Salary Increase Factors

Representative values of the assumed annual rates of future salary increase are as follows:

Age	Salary Increase	Age	Salary Increase
20	5.88%	45	4.88%
25	9.89%	50	4.88%
30	8,89%	55	4.88%
35	5.88%	60	3.88%
40	4.88%	64	2.88%

The average assumed salary increase rates shown above are reduced by the expected cost of living increases of 2.18% for FY 2014 and increased by a 3.0% cost of living increase in FY 2015.

#### G. Payroll Increase Assumption

The aggregate compensation used to compute the accrued liability contribution rate was assumed to increase at a rate of 3.50% per year - not greater than historical 10-year average (2.30% as of October 1, 2014).

#### H. Loadings for Contingencies

Compensation: Salary rates have been increased by 16.00% to load for overtime and other pays.

**Pre-Employment Service:** A City contribution of 0.275% of loaded compensation is assumed sufficient to provide for the purchase (or *buyback*) of pre-employment service by the membership.

#### I. Loading for Projected Pensionable Payroll

The Projected Base Pay is loaded by 16.00% to estimate the projected pensionable payroll used to determine expected member contributions.

#### J. Marital Assumptions

- 1. 77% of members are assumed married or entitled to benefits for dependents, including registered domestic partners.
- 2. Male spouses are assumed to be three years older than female spouses.

### Actuarial Assumptions and Actuarial Cost Methods Used in the Valuation (as of October 1, 2014)

#### K. Retirement

All members are assumed to retire at age 50 with 26.25 years of service, but not later than age 65. Members under age 50 meeting the Rule of 70 are assumed to retire at the rate of 40% per year. Otherwise, retirement is assumed to occur in accordance with the following rates:

	Rate of	Retirement
Service	Meeting Rule of 70	Not Meeting/Rule of 70
Less than 20	20%	2%
20	30%	.5%
21	50%	10%
22	30%	10%
23	30%	20%
24	45%	60%
25	65%	60%
26	100%	100%
More than 26	100%	100%

#### L. DROP Assumption

It is assumed that upon retirement 80% of all active participants will participate in the DROP.

#### M. Smoothed Asset Valuation Method

The method used for determining the smoothed actuarial value of assets phases in the deviation between the expected and actual return on assets at the rate of 20% per year. The smoothed actuarial value of assets will be further adjusted to the extent necessary to fall within the corridor whose lower limit is 80% of the fair market value of plan assets and whose upper limit is 120% of the fair market value of plan assets.

### Actuarial Assumptions and Actuarial Cost Methods Used in the Valuation (as of October 1, 2014)

#### N. Actuarial Cost Method

Normal Retirement, Termination, Disability, and Death Benefits: Entry-Age-Actuarial Cost Method.

Under this method the normal cost for each active employee is the amount which is calculated to be a level percentage of pay that would be required annually from his age at hire to his assumed retirement age to fund his estimated benefits, assuming the Plan had always been in effect. The normal cost for the Plan is the sum of such amounts for all employees. The actuarial accrued liability as of any valuation date for each active employee or inactive employee who is eligible to receive benefits under the Plan is the excess of the actuarial present value of estimated future benefits over the actuarial present value of current and future normal costs. The unfunded actuarial accrued liability as of any valuation date is the excess of the actuarial accrued liability over the smoothed actuarial value of assets of the Plan.

#### O. Changes Since Previous Actuarial Valuation

#### **Investment Return was:**

8.0%, compounded annually, net of investment expenses.

#### Payroll Increase Assumption was:

The aggregate compensation used to compute the accrued liability contribution rate was assumed to increase at a rate of 3.50% per year.

### Assumption Change History (as of October 1, 2014)

#### A. Effective October 1, 2002:

The actuarial cost method was changed from frozen initial liability to entry age.

The amortization of the unfunded accrued liability was changed from level dollar to level percentage of pay, with aggregate payroll assumed to increase at 3.50% per year.

#### B. Effective October 1, 2005:

The "fresh start" method was applied to the actuarial value of assets to begin a new five-year phase-in of realized and unrealized gains and losses.

The retirement rates were increased to reflect retirement experience for participants meeting the age 50 and "Rule of 70" eligibility criteria.

The loadings for contingencies and pre-employment service were increased from 5.00% to 7.00% and from 4.50% to 5.50% respectively.

#### C. Effective October 1, 2006:

The actuarial valuation system used by Buck Consultants was upgraded effective October 1, 2006. The gain resulting from this upgrade was amortized over 30 years.

#### D. Effective October 1, 2008:

The interest rate used to calculate all liabilities was reduced to 8.40% from 8.50%.

The salary scale used to project future pay increases was reduced by 50 basis points at each age to reflect the current and projected economic climate.

The loadings for contingencies were increased by 100 basis points (50 basis points for salary rates and 50 basis points for buybacks).

The retirement assumption was updated to reflect an increase in the level of retirements starting at age 45.

#### E. Effective October 1, 2009:

The interest rate used to calculate all liabilities was reduced from 8.40% to 8.30%.

The mortality rates were changed from the 1983 Group Annuity Mortality Table to the RP-2000 Combined Mortality Table with a blue collar adjustment for healthy lives and the RP-2000 Disabled Mortality Table for disabled participants.

A load of 20% was added to the projected base payroll to estimate the projected pensionable payroll used to determine the expected member contributions.

#### Assumption Change History (as of October 1, 2014)

#### E. Effective October 1, 2009 (cont'd):

An experience study was performed on the plan over the 5 year period October 1, 2003 through October 1, 2008 and the following assumptions were changed to more accurately reflect the plans experience:

- Retirement Rates: The retirement assumption was changed to reflect the results of the experience study.
- Withdrawal Rates: The withdrawal assumption was changed to reflect the results of the experience study.
- Salary Increase Rates: The salary increase assumption was changed to an average increase of 3.83% for plan year 2009 to reflect the freeze on COLA for the plan year and to an average increase of 6.00% for all subsequent plan years.
- Load for Overtime and Other Pays: The load for overtime and other pays was changed from 7.50% to 16.00% to reflect the results of the experience study.

#### F. Effective October 1, 2010:

The interest rate used to calculate all liabilities was reduced from 8.30% to 8.20%.

The freeze on the cost of living increase component of the salary scale was extended to March 31, 2012.

#### G. Effective October 1, 2011:

The interest rate used to calculate all liabilities was reduced from 8.20% to 8.10%.

The mortality tables for healthy pre and post retirement participants was projected 15 and 7 years respectively from the valuation date to reflect mortality improvements.

The contingency compensation load for overtime and other pays was increased from 16% to 18% to account for the expected increase in pensionable pay due to the inclusion of off duty pay in the computation of pensionable pay.

#### H. Effective October 1, 2012:

The interest rate used to calculate all liabilities was reduced from 8.10% to 8.00%.

The expected salary increases for FY2013 and 2014 were reduced by 2.17% to reflect a freeze in the cost of living increases and increased by 3.0% to reflect a 3.0% cost of living increase in FY2015.

#### Assumption Change History (as of October 1, 2014)

#### H. Effective October 1, 2012 (cont'd):

The contingency compensation load for overtime and other pays was decreased from 18% to 16% to account for the expected decrease in pensionable pay due to the cap on overtime hours in the computation of pensionable pay.

The contingency pre-employment service load was decreased from 6.000% to 0.275% to account for the elimination of certain buybacks.

The expected salary increases were adjusted to account for the extension of ranges for Firefighter I, Police Officer, Sergeant of Police and Police Lieutenant effective April 1, 2015.

#### I. Effective October 1, 2013:

The asset valuation method was updated to phase in the deviation between the expected and actual return on assets at the rate of 20% per year - further adjusted to the extent necessary to fall within the corridor whose lower limit is 80% of the fair market value of plan assets and whose upper limit is 120% of the fair market value of plan assets.

The load for projected pensionable payroll was decreased from 20% to 16% to account for the expected decrease in pensionable pay due to the cap on overtime hours in the computation of pensionable pay.

#### J. Effective October 1, 2014:

The interest rate used to calculate all liabilities was reduced from 8.00% to 7.95%. Payroll growth assumption is limited to 10 year average.

#### GLOSSARY

Actuarial Accrued Liability

The difference between the Actuarial Present Value of Future Benefits, and the Actuarial Present Value of Future Normal Costs.

**Actuarial Assumptions** 

Assumptions about future plan experience that affect costs or liabilities, such as: mortality, withdrawal, disablement, and retirement; future increases in salary; future rates of investment earnings; future investment and administrative expenses; characteristics of members not specified in the data, such as marital status; characteristics of future members; future elections made by members and other items.

Actuarial Cost Method

A procedure for allocating the Actuarial Present Value of Future Benefits between the Actuarial Present Value of Future Normal Costs and the Actuarial Accrued Liability.

Actuarial Equivalent

Of equal Actuarial Present Value, determined as of a given date and based on a given set of Actuarial Assumptions.

Actuarial Present Value

The amount of funds required to provide a payment or series of payments in the future. It is determined by discounting the future payments with an assumed interest rate and with the assumed probability each payment will be made.

Actuarial Present Value of Future Benefits

The Actuarial Present Value of amounts which are expected to be paid at various future times to active members, retired members, beneficiaries receiving benefits and inactive, non-retired members entitled to either a refund or a future retirement benefit. Expressed another way, it is the value that would have to be invested on the valuation date so that the amount invested plus investment earnings would provide sufficient assets to pay all projected benefits and expenses when due.

**Actuarial Valuation** 

The determination, as of a valuation date, of the Normal Cost, Actuarial Accrued Liability, Actuarial Value of Assets, and related Actuarial Present Values for a plan. An Actuarial Valuation for a governmental retirement system typically also includes calculations of items needed for compliance with GASB No. 67.

Actuarial Value of Assets

The value of the assets as of a given date, used by the actuary for valuation purposes. This may be the market or fair value of plan assets or a smoothed value in order to reduce the year-to-year volatility of calculated results, such as the funded ratio and the actuarially required contribution.

#### Amortization Method

A method for determining the Amortization Payment. The most common methods used are level dollar and level percentage of payroll. Under the Level Dollar method, the Amortization Payment is one of a stream of payments, all equal, whose Actuarial Present Value is equal to the UAAL. Under the Level Percentage of Pay method, the Amortization Payment is one of a stream of increasing payments, whose Actuarial Present Value is equal to the UAAL. Under the Level Percentage of Pay method, the stream of payments increases at the rate at which total covered payroll of all active members is assumed to increase.

#### **Amortization Payment**

That portion of the plan contribution which is designed to pay interest on and to amortize the Unfunded Actuarial Accrued Liability.

#### **Amortization Period**

The period used in calculating the Amortization Payment.

### Annual Required Contribution

The employer's periodic required contributions, expressed as a dollar amount or a percentage of covered plan compensation. The annual required contribution consists of the Employer Normal Cost and Amortization Payment plus interest adjustment.

#### **Closed Amortization Period**

A specific number of years that is reduced by one each year, and declines to zero with the passage of time. For example if the amortization period is initially set at 30 years, it is 29 years at the end of one year, 28 years at the end of two years, etc.

#### **Employer Normal Cost**

The portion of the Normal Cost to be paid by the employer. This is equal to the Normal Cost less expected member contributions.

#### Equivalent Single Amortization Period

For plans that do not establish separate amortization bases (separate components of the UAAL), this is the same as the Amortization Period. For plans that do establish separate amortization bases, this is the period over which the UAAL would be amortized if all amortization bases were combined upon the current UAAL payment.

#### Experience Gain/Loss

A measure of the difference between actual experience and that expected based upon a set of Actuarial Assumptions, during the period between two actuarial valuations. To the extent that actual experience differs from that assumed, Unfunded Actuarial Accrued Liabilities emerge which may be larger or smaller than projected. Gains are due to favorable experience, e.g., the assets earn more than projected, salaries do not increase as fast as assumed, members retire later than assumed, etc. Favorable experience means actual results produce actuarial liabilities not as large as projected by the actuarial assumptions. Losses are the result of unfavorable experience, i.e., actual results that produce Unfunded Actuarial Accrued Liabilities which are larger than projected.

#### Funded Ratio

The ratio of the Actuarial Value of Assets to the Actuarial Accrued Liability.

#### **GASB**

Governmental Accounting Standards Board.

GASB No. 67 and GASB No. 68 These are the governmental accounting standards that set the accounting rules for public retirement plans and the employers that sponsor or contribute to them. Statement No. 67 sets the accounting rules for the plans themselves, while Statement No. 68 sets the accounting rules for the employers that sponsor or contribute to public retirement plans.

Normal Cost

The annual cost assigned, under the Actuarial Cost Method, to the current plan year.

**Open Amortization Period** 

An open amortization period is one which is used to determine the Amortization Payment but which does not change over time. In other words, if the initial period is set as 30 years, the same 30-year period is used in determining the Amortization Period each year. In theory, if an Open Amortization Period is used to amortize the Unfunded Actuarial Accrued Liability, the UAAL will never completely disappear, but will become smaller each year, either as a dollar amount or in relation to covered payroll.

Unfunded Actuarial Accrued Liability

The difference between the Actuarial Accrued Liability and Actuarial Value of Assets.

Valuation Date

The date as of which the Actuarial Present Value of Future Benefits are determined. The benefits expected to be paid in the future are discounted to this date.

# Miami Beach Police and Fire Section 112.664 DISCLOSURE

		•		Plan Allocation	cation	
Fiscal Year Ending	Plan Return (net)	<b>Assumed Rate</b>	Equity	Fixed	Alternatives	Cash
9/30/2014	9.98%	8.00%	25.50%	36.50%	4.90%	3.10%
9/30/2013	12.80%	8.10%	61.00%	33.00%	3.40%	2.60%
9/30/2012	19.45%	8.20%	26.90%	36.60%	3.30%	3.20%
9/30/2011	-1.04%	8.30%	26.90%	36.80%	3.50%	2.80%
/30/2010	10.66%	8.40%	56.40%	39.80%	2.90%	0.90%
9/30/2009	1.89%	8.50%	52.10%	43.90%	3.00%	1.00%

