City of Boynton Beach Municipal Police Officers' Retirement Fund

Chapter 112.664, F.S. Compliance Report

In Connection with the October 1, 2018 Funding Actuarial Valuation Report and the Plan's Financial Reporting for the Year Ending September 30, 2018





August 19, 2019

Board of Trustees City of Boynton Beach Municipal Police Officers' Retirement Fund Boynton Beach, Florida

Dear Board Members:

Gabriel, Roeder, Smith & Company (GRS) has been engaged by the City of Boynton Beach Municipal Police Officers' Retirement Fund (Plan) to prepare a disclosure report to satisfy the requirements set forth in Ch. 112.664, F.S. and as further required pursuant to Ch. 60T-1.0035, F.A.C.

This report was prepared at the request of the Board and is intended for use by the Retirement Board and those designated or approved by the Board. This report may be provided to parties other than the System 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 Ch. 112.664, F.S. as well as supplement this information with additional exhibits. This report should not be relied on for any purpose other than the purpose described above.

The findings in this report are based on data or other information through September 30, 2018. 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 Plan benefits, financial transactions, plan provisions and active members, terminated members, retirees and beneficiaries. We checked for internal and year-to-year consistency, but did not audit the data. We are not responsible for the accuracy or completeness of the information provided by the City.

Except as otherwise indicated as required for the disclosures contained herein, this report was prepared using certain assumptions selected by the Board as described in our October 1, 2018 actuarial valuation report. This report is also based on the Plan Provisions, census data, and financial information as summarized in our October 1, 2018 actuarial valuation report. Please refer to the October 1, 2018 actuarial valuation report, dated June 17, 2019, for summaries and descriptions of this information.

The use of an investment return assumption that is 2% higher than the investment return assumption used to determine the funding requirements does not represent an estimate of future Plan experience nor does it reflect an observation of future return estimates inherent in financial market data. The use of this investment return assumption is provided as a counterpart to the Chapter 112.664, Florida Statutes requirement to utilize an investment return assumption that is 2% lower than the assumption used to determine the funding requirements. The inclusion of the additional exhibits showing the effect of using a 2% higher investment return assumption shows a more complete assessment of the range of possible results as opposed to showing a one-sided range as required by Florida Statutes.

Peter N. Strong and Jeffrey Amrose 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 plan 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 fairly presents the actuarial position of the Retirement Plan as of the valuation date. 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.

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 us or under our direct supervision, and we acknowledge responsibility for the results. To the best of our knowledge, the results are complete and accurate, and in our 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

Peter N. Strong, FSA

Enrolled Actuary No. 17-06975 Senior Consultant & Actuary

Jeffres//Amrose, MAAA

Enrolled Actuary No. 17-06599

Senior Consultant & Actuary



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CH. 112.664, Florida Statutes

RESULTS



Schedule of Changes in the Employers' Net Pension Liability Using Financial Reporting Assumptions per GASB Statement No. 67

Fiscal year ending September 30,	2018	
1. Total pension liability	·	
a. Service Cost	\$	3,199,467
b. Interest		10,007,776
c. Benefit Changes		-
d. Difference between actual & expected experience & Other		1,933,723
e. Assumption Changes		3,525,859
f. Benefit Payments		(6,817,205)
g. Contribution Refunds		(122,701)
h. Net Change in Total Pension Liability		11,726,919
i. Total Pension Liability - Beginning		133,418,274
j. Total Pension Liability - Ending	\$	145,145,193
2. Plan Fiduciary Net Position		
a. Contributions - Employer	\$	5,355,058
b. Contributions - Employer (From State)		825,507
c. Contributions - Non-Employer Contributing Entity		-
d. Contributions - Member		1,214,260
e. Net Investment Income		6,379,064
f. Benefit Payments		(6,817,205)
g. Contribution Refunds		(122,701)
h. Administrative Expense		(163,266)
i. Other		102,504
j. Net Change in Plan Fiduciary Net Position		6,773,221
k. Plan Fiduciary Net Position - Beginning		95,209,495
I. Plan Fiduciary Net Position - Ending	\$	101,982,716
3. Net Pension Liability / (Asset)		43,162,477
Certain Key Assumptions		
Valuation Date		10/01/2017
Measurement Date		9/30/2018
Investment Return Assumption		7.25%
Mortality Table	Florida F	Retirement System -
•		ecial Risk Mortality



Schedule of Changes in the Employers' Net Pension Liability Using Assumptions required under 112.664(1)(a), F.S.

Fiscal year ending September 30,		2018	
1. Total pension liability			
a. Service Cost	\$	3,199,467	
b. Interest		10,007,776	
c. Benefit Changes		-	
d. Difference between actual & expected experience & Other		1,933,723	
e. Assumption Changes		3,525,859	
f. Benefit Payments		(6,817,205)	
g. Contribution Refunds		(122,701)	
h. Net Change in Total Pension Liability		11,726,919	
i. Total Pension Liability - Beginning		133,418,274	
j. Total Pension Liability - Ending	\$	145,145,193	
2. Plan Fiduciary Net Position			
a. Contributions - Employer	\$	5,355,058	
b. Contributions - Employer (From State)		825,507	
c. Contributions - Non-Employer Contributing Entity		-	
d. Contributions - Member		1,214,260	
e. Net Investment Income		6,379,064	
f. Benefit Payments		(6,817,205)	
g. Contribution Refunds		(122,701)	
h. Administrative Expense		(163,266)	
i. Other		102,504	
j. Net Change in Plan Fiduciary Net Position		6,773,221	
k. Plan Fiduciary Net Position - Beginning		95,209,495	
I. Plan Fiduciary Net Position - Ending	\$	101,982,716	
3. Net Pension Liability / (Asset)		43,162,477	
Certain Key Assumptions			
Valuation Date		10/01/2017	
Measurement Date		9/30/2018	
Investment Return Assumption		7.25%	
Mortality Table	Florida F	Retirement System -	
		ecial Risk Mortality	



Schedule of Changes in the Employers' Net Pension Liability Using Assumptions required under 112.664(1)(b), F.S.

Fiscal year ending September 30,		2018
1. Total pension liability		
a. Service Cost	\$	5,235,050
b. Interest		9,160,239
c. Benefit Changes		-
d. Difference between actual & expected experience & Other		578,453
e. Assumption Changes		-
f. Benefit Payments		(6,817,205)
g. Contribution Refunds	<u> </u>	(122,701)
h. Net Change in Total Pension Liability		8,033,836
i. Total Pension Liability - Beginning		172,426,420
j. Total Pension Liability - Ending	\$	180,460,256
		_
2. Plan Fiduciary Net Position		
a. Contributions - Employer	\$	5,355,058
b. Contributions - Employer (From State)		825,507
c. Contributions - Non-Employer Contributing Entity		-
d. Contributions - Member		1,214,260
e. Net Investment Income		6,379,064
f. Benefit Payments		(6,817,205)
g. Contribution Refunds		(122,701)
h. Administrative Expense		(163,266)
i. Other	<u> </u>	102,504
j. Net Change in Plan Fiduciary Net Position		6,773,221
k. Plan Fiduciary Net Position - Beginning		95,209,495
l. Plan Fiduciary Net Position - Ending	\$	101,982,716
3. Net Pension Liability / (Asset)		78,477,540
Certain Key Assumptions		
Valuation Date		10/01/2017
Measurement Date		9/30/2018
Investment Return Assumption		5.25%
Mortality Table	Florida F	Retirement System -
	Sp	ecial Risk Mortality



Schedule of Changes in the Employers' Net Pension Liability Using Assumptions under 112.664(1)(b), F.S. except 2% higher investment return assumption

Fiscal year ending September 30,		2018
1. Total pension liability		
a. Service Cost	\$	2,246,426
b. Interest		10,507,398
c. Benefit Changes		-
d. Difference between actual & expected experience & Other		578,453
e. Assumption Changes		-
f. Benefit Payments		(6,817,205)
g. Contribution Refunds		(122,701)
h. Net Change in Total Pension Liability		6,392,371
i. Total Pension Liability - Beginning		114,527,787
j. Total Pension Liability - Ending	\$	120,920,158
2. Plan Fiduciary Net Position		
a. Contributions - Employer	\$	5,355,058
b. Contributions - Employer (From State)		825,507
c. Contributions - Non-Employer Contributing Entity		-
d. Contributions - Member		1,214,260
e. Net Investment Income		6,379,064
f. Benefit Payments		(6,817,205)
g. Contribution Refunds		(122,701)
h. Administrative Expense		(163,266)
i. Other		102,504
j. Net Change in Plan Fiduciary Net Position		6,773,221
k. Plan Fiduciary Net Position - Beginning		95,209,495
I. Plan Fiduciary Net Position - Ending	\$	101,982,716
3. Net Pension Liability / (Asset)		18,937,442
Certain Key Assumptions		
Valuation Date		10/01/2017
Measurement Date		9/30/2018
Investment Return Assumption		9.25%
Mortality Table	Florida F	etirement System -
	Sp	ecial Risk Mortality



Asset and Benefit Payment Projection Not Reflecting Any Contributions from the Employer, State or Employee Using Assumptions from Plan's most recent actuarial valuation

	Market Value of	Expected	Projected Benefit	Market Value of
FYE	Assets (BOY)	Investment Return	Payments	Assets (EOY)
2019	86,399,855	6,005,083	7,142,255	85,262,683
2020	85,262,683	5,911,995	7,435,844	83,738,834
2021	83,738,834	5,792,907	7,673,331	81,858,410
2022	81,858,410	5,646,210	7,959,312	79,545,308
2023	79,545,308	5,467,458	8,264,183	76,748,583
2024	76,748,583	5,255,583	8,515,562	73,488,604
2025	73,488,604	5,008,242	8,818,817	69,678,029
2026	69,678,029	4,720,888	9,124,675	65,274,242
2027	65,274,242	4,389,588	9,456,405	60,207,425
2028	60,207,425	4,018,113	9,570,367	54,655,171
2029	54,655,171	3,607,699	9,787,607	48,475,263
2030	48,475,263	3,154,966	9,916,977	41,713,252
2031	41,713,252	2,663,266	9,957,110	34,419,408
2032	34,419,408	2,134,254	9,962,840	26,590,822
2033	26,590,822	1,566,116	9,978,433	18,178,505
2034	18,178,505	957,368	9,946,845	9,189,028
2035	9,189,028	309,214	9,848,006	-
2036	-	-	9,782,531	-
2037	-	-	9,682,630	-
2038	-	-	9,572,044	-
2039	-	-	9,424,304	-
2040	-	-	9,270,273	-
2041	-	-	9,103,410	-
2042	-	-	8,935,164	-
2043	-	-	8,762,478	-
2044	-	-	8,584,067	-

Number of years for which current market value of assets is adequate to sustain the payment of expected retirement benefits, <u>reflecting no contributions from the Employer</u>, <u>Employee or State</u>, <u>contrary to Florida Statutes and Plan provisions</u>:

16.92

Certain Key Assumptions

Valuation Investment return assumption 7.25%
Valuation Mortality Table Florida Retirement System - Special Risk Mortality

Note: As required in Section 112.664(1)(c) of the Florida Statutes, the projection of the Fund assets <u>do not include contributions from the Employer, Employee or State, which is contrary to Florida Statutes and Plan provisions</u>. For this reason, these projections should not be viewed as a representation of the amount of time the Fund can sustain benefit payments. Under the GASB standards which DO include contributions from the employer, employee and State, the Fund is expected to be able to sustain the benefit payment demands in the near-term and long-term future.



Asset and Benefit Payment Projection Not Reflecting Any Contributions from the Employer, State or Employee Using Assumptions required under 112.664(1)(a), F.S.

	Market Value of	Expected	Projected Benefit	Market Value of
FYE	Assets (BOY)	Investment Return	Payments	Assets (EOY)
2019	86,399,855	6,005,083	7,142,255	85,262,683
2020	85,262,683	5,911,995	7,435,844	83,738,834
2021	83,738,834	5,792,907	7,673,331	81,858,410
2022	81,858,410	5,646,210	7,959,312	79,545,308
2023	79,545,308	5,467,458	8,264,183	76,748,583
2024	76,748,583	5,255,583	8,515,562	73,488,604
2025	73,488,604	5,008,242	8,818,817	69,678,029
2026	69,678,029	4,720,888	9,124,675	65,274,242
2027	65,274,242	4,389,588	9,456,405	60,207,425
2028	60,207,425	4,018,113	9,570,367	54,655,171
2029	54,655,171	3,607,699	9,787,607	48,475,263
2030	48,475,263	3,154,966	9,916,977	41,713,252
2031	41,713,252	2,663,266	9,957,110	34,419,408
2032	34,419,408	2,134,254	9,962,840	26,590,822
2033	26,590,822	1,566,116	9,978,433	18,178,505
2034	18,178,505	957,368	9,946,845	9,189,028
2035	9,189,028	309,214	9,848,006	-
2036	-	-	9,782,531	-
2037	-	-	9,682,630	-
2038	-	-	9,572,044	-
2039	-	-	9,424,304	-
2040	-	-	9,270,273	-
2041	-	-	9,103,410	-
2042	-	-	8,935,164	-
2043	-	-	8,762,478	-
2044	-	-	8,584,067	-

Number of years for which current market value of assets is adequate to sustain the payment of expected retirement benefits, <u>reflecting no contributions from the Employer</u>, <u>Employee</u> or State, contrary to Florida Statutes and Plan provisions:

16.92

Certain Key Assumptions

Valuation Investment return assumption 7.25%
Valuation Mortality Table Florida Retirement System - Special Risk Mortality

Note: As required in Section 112.664(1)(c) of the Florida Statutes, the projection of the Fund assets <u>do not include contributions from the Employer, Employee or State, which is contrary to Florida Statutes and Plan provisions</u>. For this reason, these projections should not be viewed as a representation of the amount of time the Fund can sustain benefit payments. Under the GASB standards which DO include contributions from the employer, employee and State, the Fund is expected to be able to sustain the benefit payment demands in the near-term and long-term future.



Asset and Benefit Payment Projection Not Reflecting Any Contributions from the Employer, State or Employee Using Assumptions required under 112.664(1)(b), F.S.

	Market Value of	Expected	Projected Benefit	Market Value of
FYE	Assets (BOY)	Investment Return	Payments	Assets (EOY)
2019	86,399,855	4,348,508	7,142,255	83,606,108
2020	83,606,108	4,194,130	7,435,844	80,364,394
2021	80,364,394	4,017,706	7,673,331	76,708,769
2022	76,708,769	3,818,278	7,959,312	72,567,735
2023	72,567,735	3,592,871	8,264,183	67,896,423
2024	67,896,423	3,341,029	8,515,562	62,721,890
2025	62,721,890	3,061,405	8,818,817	56,964,478
2026	56,964,478	2,751,112	9,124,675	50,590,915
2027	50,590,915	2,407,792	9,456,405	43,542,302
2028	43,542,302	2,034,749	9,570,367	36,006,684
2029	36,006,684	1,633,426	9,787,607	27,852,503
2030	27,852,503	1,201,936	9,916,977	19,137,462
2031	19,137,462	743,343	9,957,110	9,923,695
2032	9,923,695	259,469	9,962,840	220,324
2033	220,324	-	9,978,433	-
2034	-	-	9,946,845	-
2035	-	-	9,848,006	-
2036	-	-	9,782,531	-
2037	-	-	9,682,630	-
2038	-	-	9,572,044	-
2039	-	-	9,424,304	-
2040	-	-	9,270,273	-
2041	-	-	9,103,410	-
2042	-	-	8,935,164	-
2043	-	-	8,762,478	-
2044	-	-	8,584,067	-

Number of years for which current market value of assets is adequate to sustain the payment of expected retirement benefits, <u>reflecting no contributions from the Employer</u>, <u>Employee</u> or State, contrary to Florida Statutes and Plan provisions:

14.00

Certain Key Assumptions

Valuation Investment return assumption 5.25%
Valuation Mortality Table Florida Retirement System - Special Risk Mortality

Note: As required in Section 112.664(1)(c) of the Florida Statutes, the projection of the Fund assets <u>do not include contributions from the Employer, Employee or State, which is contrary to Florida Statutes and Plan provisions</u>. For this reason, these projections should not be viewed as a representation of the amount of time the Fund can sustain benefit payments. Under the GASB standards which DO include contributions from the employer, employee and State, the Fund is expected to be able to sustain the benefit payment demands in the near-term and long-term future.



Asset and Benefit Payment Projection Not Reflecting Any Contributions from the Employer, State or Employee Using Assumptions under 112.664(1)(b), F.S. except 2% higher investment return assumption

	Market Value of	Expected	Projected Benefit	Market Value of
FYE	Assets (BOY)	Investment Return	Payments	Assets (EOY)
2019	86,399,855	7,661,657	7,142,255	86,919,257
2020	86,919,257	7,696,123	7,435,844	87,179,536
2021	87,179,536	7,709,216	7,673,331	87,215,421
2022	87,215,421	7,699,308	7,959,312	86,955,417
2023	86,955,417	7,661,158	8,264,183	86,352,392
2024	86,352,392	7,593,752	8,515,562	85,430,582
2025	85,430,582	7,494,459	8,818,817	84,106,224
2026	84,106,224	7,357,810	9,124,675	82,339,359
2027	82,339,359	7,179,032	9,456,405	80,061,986
2028	80,061,986	6,963,104	9,570,367	77,454,723
2029	77,454,723	6,711,885	9,787,607	74,379,001
2030	74,379,001	6,421,397	9,916,977	70,883,421
2031	70,883,421	6,096,200	9,957,110	67,022,511
2032	67,022,511	5,738,801	9,962,840	62,798,472
2033	62,798,472	5,347,356	9,978,433	58,167,395
2034	58,167,395	4,920,442	9,946,845	53,140,992
2035	53,140,992	4,460,071	9,848,006	47,753,057
2036	47,753,057	3,964,716	9,782,531	41,935,242
2037	41,935,242	3,431,188	9,682,630	35,683,800
2038	35,683,800	2,858,044	9,572,044	28,969,800
2039	28,969,800	2,243,832	9,424,304	21,789,328
2040	21,789,328	1,586,763	9,270,273	14,105,818
2041	14,105,818	883,755	9,103,410	5,886,163
2042	5,886,163	131,219	8,935,164	-
2043	-	-	8,762,478	-
2044	-	-	8,584,067	-

Number of years for which current market value of assets is adequate to sustain the payment of expected retirement benefits, <u>reflecting no contributions from the Employer</u>, <u>Employee</u> or State, contrary to Florida Statutes and Plan provisions:

Certain Key Assumptions

Valuation Investment return assumption 9.25%
Valuation Mortality Table Florida Retirement System - Special Risk Mortality

Note: As required in Section 112.664(1)(c) of the Florida Statutes, the projection of the Fund assets <u>do not include contributions from the Employer, Employee or State, which is contrary to Florida Statutes and Plan provisions</u>. For this reason, these projections should not be viewed as a representation of the amount of time the Fund can sustain benefit payments. Under the GASB standards which DO include contributions from the employer, employee and State, the Fund is expected to be able to sustain the benefit payment demands in the near-term and long-term future.



23.58

ACTUARIALLY DETERMINED CONTRIBUTION					
	Plan's Latest Actuarial Valuation	112.664(1)(a) F.S. Assumptions	112.664(1)(b) F.S. Assumptions	112.664(1)(b) F.S. except 2% Higher Investment Return Assumption	
A. Valuation Date	October 1, 2018	October 1, 2018	October 1, 2018	October 1, 2018	
B. Actuarially Determined Contribution (ADC) to Be Paid During Fiscal Year Ending	9/30/2020	9/30/2020	9/30/2020	9/30/2020	
C. Assumed Dates of Employer Contributions	10/1/2019	10/1/2019	10/1/2019	10/1/2019	
D. Annual Payment to Amortize Unfunded Actuarial Liability	\$ 3,605,293	\$ 3,605,293	\$ 5,408,821	\$ 1,994,126	
E. Employer Normal Cost	2,522,537	2,522,537	4,256,743	1,476,433	
F. Employer ADC if Paid on Valuation Date: D + E	6,127,830	6,127,830	9,665,564	3,470,559	
G. Employer ADC Adjusted for Frequency of Payments	6,127,830	6,127,830	9,665,564	3,470,559	
H. Employer ADC Adjusted for Frequency of Payments as % of Covered Payroll	54.86 %	54.86 %	86.54 %	31.07 %	
Assumed Rate of Increase in Covered Payroll to Contribution Year	2.50 %	2.50 %	2.50 %	2.50 %	
J. Covered Payroll for Contribution Year	11,448,417	11,448,417	11,448,417	11,448,417	
K. Employer ADC for Contribution Year: H x J	6,280,602	6,280,602	9,907,460	3,557,023	
L. Allowable Credit for State Revenue in Contribution Year*	465,087	465,087	465,087	465,087	
M. Net Employer ADC in Contribution Year	5,815,515	5,815,515	9,442,373	3,091,936	
N. Net Employer ADC as % of Covered Payroll in Contribution Year: M ÷ J	50.80 %	50.80 %	82.48 %	27.01 %	
O. Expected Member Contribution	801,389	801,389	801,389	801,389	
P. Total Contribution (Including Members) in Contribution Year	7,081,991	7,081,991	10,708,849	4,358,412	
Q. Total Contribution as % of Covered Payroll in Contribution Year: P ÷ J	61.86 %	61.86 %	93.54 %	38.07 %	
R. Certain Key Assumptions Investment Return Assumption Mortality Table	7.25 % Florida Retirement System - Special Risk Mortality	System - Special	System - Special		

