

### Town of Wellesley Contributory Retirement System

Actuarial Valuation and Review as of January 1, 2015

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116 Huntington Ave., 8th Floor Boston, MA 02116 T 617.424.7300 www.segalco.com

September 9, 2015

Retirement Board Town of Wellesley Contributory Retirement System Town Hall 525 Washington Street Wellesley, MA 02482

Dear Board Members:

We are pleased to submit this Actuarial Valuation and Review as of January 1, 2015. It summarizes the actuarial data used in the valuation, establishes the funding requirements for fiscal 2016 and later years and analyzes the preceding two years' experience.

This report was prepared in accordance with generally accepted actuarial principles and practices at the request of the Board to assist in administering the Retirement System. The census information and financial information on which our calculations were based was prepared by the staff of the Wellesley Retirement System. That assistance is gratefully acknowledged.

The measurements shown in this actuarial valuation may not be applicable for other purposes. 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); and changes in plan provisions or applicable law.

An actuarial valuation is a measurement at a specific date – it is not a prediction of a plan's future financial condition. We have not been retained to perform an analysis of the potential range of financial measurements, except where otherwise noted.

The actuarial calculations were directed under my supervision. I am a member of the American Academy of Actuaries and I meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion herein. To the best of my knowledge, the information supplied in the actuarial valuation is complete and accurate. Further, in my opinion, the assumptions as approved by the Board are reasonably related to the experience of and the expectations for the Plan.

We look forward to reviewing this report at your next meeting and to answering any questions. Sincerely,

Segal Consulting, a Member of The Segal Group, Inc.

Mithlen, By:

Kathleen A. Riley, FSA, MAAA, EA Senior Vice President and Actuary

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#### Purpose

This report has been prepared by Segal Consulting to present a valuation of the Town of Wellesley Contributory Retirement System as of January 1, 2015. The valuation was performed to determine whether the assets and contributions are sufficient to provide the prescribed benefits. The contribution requirements presented in this report are based on:

- > The benefit provisions of the Massachusetts General Law Chapter 32;
- > The characteristics of covered active participants, inactive participants, and retired participants and beneficiaries as of January 1, 2015;
- > The assets of the Plan as of December 31, 2014;
- > Economic assumptions regarding future salary increases and investment earnings; and
- > Other actuarial assumptions, regarding employee terminations, retirement, death, etc.

In addition, this report includes certain disclosure information required by Governmental Accounting Standards Board Statement Numbers 67 and 68 as of December 31, 2014 for the Town of Wellesley Contributory Retirement System, a cost-sharing multiple-employer defined benefit pension plan.

#### **Significant Issues in Valuation Year**

The following key findings were the result of this actuarial valuation:

- 1. The actuarial valuation report as of January 1, 2015 is based on financial information as of that date. Changes in the value of assets subsequent to that date are not reflected.
- 2. During the plan years ending December 31, 2013 and December 31, 2014, the market value rates of return were 14.53% and 7.53%, respectively. Using the five-year smoothing of market value gains and losses with a fresh start as of January 1, 2013 results in an actuarial value of assets as of December 31, 2014 of \$146.7 million, or 95.9% of the market value of assets of \$153.0 million (as reported in the Annual Statement). The actuarial rates of return for the plan years ending December 31, 2013 and December 31, 2014 were 8.51% and 8.90%, respectively. With this valuation, we have used an actuarial value of assets with a fresh start of January 1, 2015.

- 3. The following actuarial assumptions and method were changed with this valuation:
  - > The investment return assumption was decreased from 7.00% to 6.75%.
  - The mortality assumption was changed from the RP-2000 Healthy Employee and Annuitant Mortality Tables projected 15 years with Scale AA to the RP-2014 Blue Collar Healthy Employee and Annuitant Mortality Tables with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D.
  - The mortality assumption for disabled participants was changed from the RP-2000 Healthy Annuitant Mortality Table set forward 3 years for males to the RP-2014 Blue Collar Healthy Annuitant Mortality Table set forward 3 years for males projected with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D.
  - ➤ The asset valuation method described in Exhibit III of Section 4 was changed from an actuarial value of assets with a fresh start as of January 1, 2013 to an actuarial value of assets with a fresh start as of January 1, 2015.
  - > The retirement rates were reduced for certain ages.
  - ➤ The retirement age for inactive vested participants was changed from age 55 to age 60 for Group 1 and 2 members and from age 45 to age 50 for Group 4 members.

Changing these assumptions and asset method resulted in a net increase in the unfunded actuarial accrued liability of \$4,366,416 and a net increase in normal cost of \$389,700.

- 4. The unfunded liability has decreased by \$5.5 million from \$60.5 million as of January 1, 2013 to \$55.0 million as of January 1, 2015. Based on our prior valuation, the expected unfunded liability was \$60.3 million. The decrease of \$5.3 million from the expected to the actual unfunded liability is primarily due to an investment gain on an actuarial basis of \$4.6 million and an experience gain of \$5.1 million primarily due to salaries increasing less than expected for continuing actives and fewer pensioner deaths than expected, partially offset by assumption and method changes described in item 3 above.
- 5. The contribution for fiscal year 2016 is the previously budgeted amount of \$7,285,897. The results of this valuation will first be reflected in the fiscal year 2017 appropriation. The payment on the 2010 ERI is a level amortization payment through June 30, 2022 and the payment on the remaining unfunded liability is an increasing (3.5% per year) payment through 2030. This is the same funding schedule as approved by the Board with the prior valuation. The fiscal 2017 appropriation is \$7,562,273 or 3.8% higher than the fiscal 2016 appropriation. Chart 15 in Section 2 shows the recommended contribution through fiscal 2030 based on this funding schedule.

- 6. The funded ratio has increased from 67.50% as of January 1, 2013 to 73.56% as of January 1, 2015.
- 7. The Governmental Accounting Standards Board (GASB) approved two new Statements affecting the reporting of pension liabilities for accounting purposes. Statement 67 replaces Statement 25 and is for plan reporting. Statement 68 replaces Statement 27 and is for employer reporting. Statement 67 is effective with the fiscal year ending December 31, 2014 for Plan reporting and Statement 68 is effective with the fiscal year ending June 30, 2015 for employer reporting.
  - > It is important to note that the new GASB rules only redefine pension liability and expense for financial reporting purposes, and do not apply to contribution amounts for pension funding purposes. Employers and plans can still develop and adopt funding policies under current practices.
  - The Net Pension Liability (NPL) is equal to the difference between the Total Pension Liability (TPL) and the Plan's Fiduciary Net Position. The Plan's Fiduciary Net Position is equal to the market value of assets and therefore, the NPL measure is very similar to an Unfunded Actuarial Accrued Liability (UAAL) on a market value basis. The NPL increased from \$51.4 million as of December 31, 2013 to \$55.0 million as of December 31, 2014 and the Plan's Fiduciary Net Position as a percent of the TPL increased from 73.47% to 73.56%.
  - > The NPL was measured as of December 31, 2014 and 2013 and determined based upon the results of the actuarial valuations as of January 1, 2015 and January 1, 2013, respectively.
  - > The discount rate used to determine the TPL and NPL as of December 31, 2014 was 6.75% and as of December 31, 2013 was 7.00%.

#### **Important Information About Actuarial Valuations**

An actuarial valuation is a budgeting tool with respect to the financing of future projected obligations of a pension plan. It is an estimated forecast – the actual long-term cost of the plan will be determined by the actual benefits and expenses paid and the actual investment experience of the plan.

In order to prepare a valuation, Segal Consulting ("Segal") relies on a number of input items. These include:

- Plan of benefits Plan provisions define the rules that will be used to determine benefit payments, and those rules, or the interpretation of them, may change over time. Even where they appear precise, outside factors may change how they operate. It is important to keep Segal informed with respect to plan provisions and administrative procedures, and to review the plan summary included in our report to confirm that Segal has correctly interpreted the plan of benefits.
- Participant data An actuarial valuation for a plan is based on data provided to the actuary by the Town of Wellesley Contributory Retirement System. Segal does not audit such data for completeness or accuracy, other than reviewing it for obvious inconsistencies compared to prior data and other information that appears unreasonable. It is important for Segal to receive the best possible data and to be informed about any known incomplete or inaccurate data.
- > <u>Assets</u> The valuation is based on the market value of assets as of the valuation date, as provided by the Town of Wellesley Contributory Retirement System. The Town of Wellesley Contributory Retirement System uses an "actuarial value of assets" that differs from market value to gradually reflect year-to-year changes in the market value of assets in determining the contribution requirements.
- > <u>Actuarial assumptions</u> In preparing an actuarial valuation, Segal projects the benefits to be paid to existing plan participants for the rest of their lives and the lives of their beneficiaries. This projection requires actuarial assumptions as to the probability of death, disability, withdrawal, and retirement of each participant for each year. In addition, the benefits projected to be paid for each of those events in each future year reflect actuarial assumptions as to salary increases and cost-of-living adjustments. The projected benefits are then discounted to a present value, based on the assumed rate of return that is expected to be achieved on the plan's assets. There is a reasonable range for each assumption used in the projection and the results may vary materially based on which assumptions are selected. It is important for any user of an actuarial valuation to understand this concept. Actuarial assumptions are periodically reviewed to ensure that future valuations reflect emerging plan experience. While future changes in actuarial assumptions may have a significant impact on the reported results, that does not mean that the previous assumptions were unreasonable.

The user of Segal's actuarial valuation (or other actuarial calculations) should keep the following in mind:

- > The actuarial valuation is prepared at the request of the Town of Wellesley Contributory Retirement System. Segal is not responsible for the use or misuse of its report, particularly by any other party.
- > An actuarial valuation is a measurement of the plan's assets and liabilities at a specific date. Accordingly, except where otherwise noted, Segal did not perform an analysis of the potential range of future financial measures. The actual long-term cost of the plan will be determined by the actual benefits and expenses paid and the actual investment experience of the plan.
- > If the Town of Wellesley Contributory Retirement System is aware of any event or trend that was not considered in this valuation that may materially change the results of the valuation, Segal should be advised, so that we can evaluate it.
- Segal does not provide investment, legal, accounting, or tax advice. Segal's valuation is based on our understanding of applicable guidance in these areas and of the plan's provisions, but they may be subject to alternative interpretations. The Town of Wellesley Contributory Retirement System should look to their other advisors for expertise in these areas.

As Segal Consulting has no discretionary authority with respect to the management or assets of the Plan, it is not a fiduciary in its capacity as actuaries and consultants with respect to the Plan.

#### **Summary of Key Valuation Results**

	2015	2013
Contributions for fiscal year beginning July 1:		
Recommended for fiscal 2016 and 2014	\$7,285,897	\$5,940,854
Recommended for fiscal 2017 and 2015	7,562,273	7,040,036
Funding elements for plan year beginning January 1:		
Normal cost, including administrative expenses	\$5,879,329	\$5,146,616
Market value of assets	152,955,923	125,714,763
Actuarial value of assets	152,955,923	125,714,763
Actuarial accrued liability	207,928,237	186,235,650
Unfunded actuarial accrued liability	54,972,314	60,520,887
Funded ratio based on market value of assets	73.56%	67.50%
Funded ratio based on actuarial value of assets	73.56%	67.50%
GASB 67/68		
Measurement date	December 31, 2014	N/A
Total pension liability	\$207,928,237	N/A
Plan fiduciary net position	152,955,923	N/A
Net pension liability	54,972,314	N/A
Pension expense	6,330,890	N/A
Demographic data for plan year beginning January 1:		
Number of retired participants and beneficiaries	407	407
Number of inactive participants entitled to a return of their employee contributions	198	207
Number of inactive participants with a vested right to a deferred or immediate benefit	7	10
Number of active participants	685	662
Total payroll*	\$34,685,775	\$32,708,462
A 115	50 (2)	40,400

\* Payroll figures are for the prior calendar year and reflect annualized salaries for participants hired during the year.

#### A. PARTICIPANT DATA

The Actuarial Valuation and Review considers the number and demographic characteristics of covered participants, including active participants, inactive participants, retired participants and beneficiaries. This section presents a summary of significant statistical data on these participant groups.

More detailed information for this valuation year and the preceding valuation can be found in Section 3, Exhibits A and B.

#### A historical perspective of how the participant population has changed over the past eight valuations can be seen in this chart.

#### CHART 1

Participant Population: 2002 - 2014

Year Ended December 31	nded Active Inactive per 31 Participants Participants		Retired Participants and Beneficiaries		
2002	600	179	419		
2003	595	163	414		
2005	636	144	415		
2007	669	182	407		
2009	663	201	402		
2011	669	203	406		
2012	662	217	407		
2014	685	205	407		

#### **Active Participants**

Plan costs are affected by the age, years of service and payroll of active participants. In this year's valuation, there were 685 active participants with an average age of 45.6, average years of service of 10.7 years and average payroll of \$50,636. The 662 active participants in the prior valuation had an average age of 45.6, average service of 10.8 years and average payroll of \$49,409.

Among the active participants, there were none with unknown age and/or service information.

#### **Inactive Participants**

In this year's valuation, there were 7 participants with a vested right to a deferred or immediate vested benefit and 198 participants entitled to a return of their employee contributions.

#### These graphs show a distribution of active participants by age and by years of service.

#### CHART 2

Distribution of Active Participants by Age as of December 31, 2014



#### CHART 3

Distribution of Active Participants by Years of Service as of December 31, 2014



#### **Retired Participants and Beneficiaries**

As of December 31, 2014, 348 retired participants and 59 beneficiaries were receiving total monthly benefits of \$861,568, excluding COLAs reimbursed by the Commonwealth. For comparison, in the previous valuation, there were 340 retired participants and 67 beneficiaries receiving monthly benefits of \$796,195, excluding COLAs reimbursed by the Commonwealth.

These graphs show a distribution of the current retired participants and beneficiaries based on their monthly amount and age, by type of pension.

#### CHART 4

Distribution of Retired Participants and Beneficiaries by Type and by Monthly Amount as of December 31, 2014



#### CHART 5

Distribution of Retired Participants and Beneficiaries by Type and by Age as of December 31, 2014



#### Beneficiary

Accidental Disability

Ordinary Disability

Superannuation



#### **B.** FINANCIAL INFORMATION

Retirement plan funding anticipates that, over the long term, both contributions (less administrative expenses) and net investment earnings (less investment fees) will be needed to cover benefit payments. Retirement plan assets change as a result of the net impact of these income and expense components. Additional financial information, including a summary of these transactions for the valuation year, is presented in Section 3, Exhibits C and D.

#### **CHART 6**

The chart depicts the components of changes in the actuarial value of assets over the last ten years. Note: The first bar represents increases in assets during each year while the second bar details the decreases.





The amount of the adjustment to recognize market value is treated as income, which may be positive or negative. Realized and unrealized gains and losses are treated equally and, therefore, the sale of assets has no immediate effect on the actuarial value. In the prior valuation, the method was fresh started as of January 1, 2013.

# The chart shows the determination of the actuarial value of assets as of the valuation date.

#### CHART 7 Determination of Actuarial Value of Assets for Year Ended December 31, 2014

1. Market value of assets, December 31, 2014			\$152,955,923
	Original	Unrecognized	
2. Calculation of unrecognized return*	Amount	Return	
(a) Year ended December 31, 2014	\$757,536	\$606,029	
(b) Year ended December 31, 2013	9,402,779	5,641,667	
(c) Year ended December 31, 2012	N/A	0	
(d) Year ended December 31, 2011	N/A	0	
(e) Year ended December 31, 2010	N/A	0	
(f) Total unrecognized return			6,247,696
3. Preliminary actuarial value: (1) - (2f)			146,708,227
4. Adjustment to be within 20% corridor			0
5. Final actuarial value of assets as of December 31, 2014: (3) + (4)			\$146,708,227
6. Actuarial value as a percentage of market value: $(5) \div (1)$			95.9%
7. Amount deferred for future recognition: (1) - (5)			\$6,247,696

\* Unrecognized return is the difference between the total return and expected return on a market value basis and is recognized over a five-year period.

With this valuation, the Board changed the asset valuation method by changing the fresh start date of the actuarial value of assets from January 1, 2013 to January 1, 2015. This change increased the actuarial value of assets by \$6.25 million, from \$146.71 million to \$152.96 million.



#### C. ACTUARIAL EXPERIENCE

To calculate the required contribution, assumptions are made about future events that affect the amount and timing of benefits to be paid and assets to be accumulated. Each year actual experience is measured against the assumptions. If overall experience is more favorable than anticipated (an actuarial gain), the contribution requirement will decrease from the previous year. On the other hand, the contribution requirement will increase if overall actuarial experience is less favorable than expected (an actuarial loss).

Taking account of experience gains or losses in one year without making a change in assumptions reflects the belief that the single year's experience was a short-term development and that, over the long term, experience will return to the original assumptions. For contribution requirements to remain stable, assumptions should approximate experience.

If assumptions are changed, the contribution requirement is adjusted to take into account a change in experience anticipated for all future years.

The net experience gain for the two-year period ending December 31, 2014 is \$9,680,847. A discussion of the major components of the actuarial experience is on the following pages.

#### CHART 9

summary of the actuarial experience over the past two years.

This chart provides a

Actuarial Experience for Two-Year Period Ended December 31, 2014

1.	Net gain from investments*	\$4,570,814
2.	Net gain from administrative expenses	61,610
3.	Net gain from other experience**	<u>5,048,423</u>
4.	Net experience gain: $(1) + (2) + (3)$	\$9,680,847

\* Details in Chart 10

\*\* Details in Chart 13

#### **Investment Rate of Return**

A major component of projected asset growth is the assumed rate of return. The assumed return should represent the expected long-term rate of return, based on the Wellesley Retirement System's investment policy. For valuation purposes, the assumed rate of return on the actuarial value of assets was 7.00% for 2014 and 2013. The actual rate of return on an actuarial basis for the 2014 and 2013 plan years were 8.90% and 8.51%, respectively. Since the actual return for the year was greater than the assumed return, the Wellesley Retirement System experienced an actuarial gain of \$4,570,814 (including an adjustment for interest) during the two-year period ending December 31, 2014 with regard to its investments.

## This chart shows the gain/(loss) due to investment experience.

#### CHART 10

#### **Actuarial Value Investment Experience**

	Year Ended		
	December 31, 2014	December 31, 2013	
1. Actual return	\$11,992,248	\$10,627,187	
2. Average value of assets	134,766,089	124,951,886	
3. Actual rate of return: $(1) \div (2)$	8.90%	8.51%	
4. Assumed rate of return	7.00%	7.00%	
5. Expected return: $(2) \times (4)$	\$9,433,626	\$8,746,632	
6. Actuarial gain/(loss): $(1) - (5)$	<u>\$2,558,619</u>	<u>\$1,880,555</u>	

Because actuarial planning is long term, it is useful to see how the assumed investment rate of return has followed actual experience over time. The chart below shows the rate of return on an actuarial basis for the last ten years, including five-year and ten-year averages. Based upon this experience and future expectations, we have decreased the assumed rate of return from 7.00% to 6.75%.

#### CHART 11

Investment Return – Actuarial Value vs. Market Value: 2005 - 2014

Actuarial V Investment F	alue Return	Market Value Investment Return		
Amount	Percent	Amount	Percent	
\$8,365,527	6.88%	\$8,365,527	6.88%	
19,224,207	15.49	19,224,208	15.49	
9,969,052	7.26	9,969,052	7.26	
-41,672,424	-29.51	-41,672,425	-29.51	
15,912,151	16.88	15,912,151	16.88	
4,283,430	3.36	13,630,109	12.88	
-721,843	-0.56	-160,131	-0.14	
175,966	0.14	14,925,118	13.29	
10,627,187	8.51	18,149,411	14.53	
11,992,245	8.90	10,717,718	7.53	
\$59,741,240		\$69,060,739		
Five-year average return	4.12%	Five-year average return	9.53%	
Ten-year average return	4.75%	Ten-year average return	5.66%	
	Amount           \$8,365,527           19,224,207           9,969,052           -41,672,424           15,912,151           4,283,430           -721,843           175,966           10,627,187           11,992,245           \$59,741,240           Five-year average return           Ten-year average return	AmountPercent\$8,365,5276.88%19,224,20715.499,969,0527.26-41,672,424-29.5115,912,15116.884,283,4303.36-721,843-0.56175,9660.1410,627,1878.5111,992,2458.90\$59,741,240-12%Five-year average return4.12%Ten-year average return4.75%	Actuality value Investment ReturnMarket value Investment RAmountPercentAmount\$8,365,5276.88%\$8,365,52719,224,20715.4919,224,2089,969,0527.269,969,052-41,672,424-29.51-41,672,42515,912,15116.8815,912,1514,283,4303.3613,630,109-721,843-0.56-160,131175,9660.1414,925,11810,627,1878.5118,149,41111,992,2458.9010,717,718\$59,741,240\$69,060,739Five-year average return4.12%Five-year average returnTen-year average return4.75%Ten-year average return	

Note: Each year's yield is weighted by the average asset value in that year.

Subsection B described the actuarial asset valuation method that gradually takes into account fluctuations in the market value rate of return. The effect of this is to stabilize the actuarial rate of return, which contributes to leveling pension plan costs.

#### **Administrative Expenses**

Administrative expenses for the years ended December 31, 2013 and 2014 were \$224,217 and \$226,954, respectively, compared to the assumption of \$250,000 for 2013 and \$258,750 for 2014. This resulted in a gain of \$61,610 for the year, including an adjustment for interest. We have reset the assumption to \$250,000 for the 2015 calendar year.



This chart illustrates how this leveling effect has actually worked over the years 2010 - 2014.

#### **Other Experience**

There are other differences between the expected and the actual experience that appear when the new valuation is compared with the projections from the previous valuation. These include:

- > the extent of turnover among the participants,
- > retirement experience (earlier or later than expected),
- > mortality (more or fewer deaths than expected),
- > the number of disability retirements, and
- > salary increases different than assumed.

The net gain from this other experience for the two-year period ending December 31, 2014 amounted to \$5,048,423, which is 2.4% of the actuarial accrued liability.

A brief summary of the demographic gain/(loss) experience of the Wellesley Retirement System for the two-year period ending December 31, 2014 is shown in the chart on the following page. This valuation reflects the following changes in actuarial assumptions and method:

- The investment return assumption was decreased from 7.00% to 6.75%.
- The mortality assumption was changed from the RP-2000 Healthy Employee and Annuitant Mortality Tables projected 15 years with Scale AA to the RP-2014 Blue Collar Healthy Employee and Annuitant Mortality Tables with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D.
- The mortality assumption for disabled participants was changed from the RP-2000 Healthy Annuitant Mortality Table set forward 3 years for males to the RP-2014 Blue Collar Healthy Annuitant Mortality Table projected with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D set forward 3 years for males.
- The asset valuation method described in Exhibit III of Section 4 was changed from an actuarial value of assets with a fresh start as of January 1, 2013 to an actuarial value of assets with a fresh start as of January 1, 2015.
- > The retirement rates were reduced for certain ages.

The retirement age for inactive vested participants was changed from age 55 to age 60 for Group 1 and 2 members and from age 45 to age 50 for Group 4 members.

Changing these assumptions and asset method resulted in a net increase in the unfunded actuarial accrued liability of \$4,366,416 and a net increase in normal cost of \$389,700.

#### The chart shows elements of the experience gain/(loss) for the most recent years.

#### CHART 13

#### Experience Due to Changes in Demographics for Two-Year Period Ended December 31, 2014

1.	Fewer deaths than expected among retired members and beneficiaries	-\$260,049
2.	Salary increase for continuing actives less than expected	2,217,522
3.	Miscellaneous experience gain	<u>3,090,950</u>
4.	Total	\$5,048,423

The unfunded liability was expected to decrease from \$60.5 million as of January 1, 2013 to \$60.3 million as of January 1, 2015. The actuarial unfunded liability as of January 1, 2015 of \$55.0 million is \$5.3 million lower than expected as detailed in Chart 13 below.

#### CHART 14

#### Development of Unfunded Actuarial Accrued Liability and (Gain)/Loss

	Year Ended				
	December 31, 2014	December 31, 201	3		
1. Unfunded actuarial accrued liability at beginning of year	\$61,227,691	\$60,5	20,887		
2. Normal cost at beginning of year	5,326,748	5,1	46,616		
3. Total contributions	-10,590,865	-8,7	58,953		
4. Interest					
(a) For whole year on $(1) + (2)$	\$4,658,810	\$4,596,725			
(b) For half year on (3)	<u>-335,639</u>	<u>-277,584</u>			
(c) Total interest	4,323,171	<u>4,3</u>	19,141		
5. Expected unfunded actuarial accrued liability	\$60,286,745	\$61,2	27,691		
6. Changes due to:					
(a) Experience gain	-\$9,680,847				
(b) Assumption changes	10,614,112				
(c) Asset methodology	<u>-6,247,696</u>				
(d) Total changes	<u>-5,314,431</u>				
7. Unfunded actuarial accrued liability at end of year	<u>\$54,972,314</u>				

#### **D. RECOMMENDED CONTRIBUTION**

The amount of annual contribution required to fund the Plan is comprised of an employer normal cost payment and a payment on the unfunded actuarial accrued liability. The contribution for fiscal year 2016 is the previously budgeted amount of \$7,285,897. The results of this valuation will first be reflected in the fiscal year 2017 appropriation. The payment on the 2010 ERI is a level amortization payment through June 30, 2022 and the payment on the remaining unfunded liability is an increasing (3.5% per year) payment through 2030. This is the same funding schedule as approved by the Board with the prior valuation. The fiscal 2017 appropriation is \$7,562,273 or 3.8% higher than the fiscal 2016 appropriation.

Chart 16 shows the recommended contribution through fiscal 2030 based on this funding schedule.

The chart compares this valuation's recommended contribution with the prior valuation.

#### CHART 15

#### **Recommended Contribution**

	Year Beginning January 1				
	2015	6	2013		
	Amount	% of Payroll	Amount	% of Payroll	
1. Total normal cost	\$5,629,329	15.65%	\$4,896,616	14.39%	
2. Administrative expenses	250,000	0.70%	250,000	0.73%	
3. Expected employee contributions	-3,410,805	<u>-9.49%</u>	-3,192,423	-9.38%	
4. Employer normal cost: $(1) + (2) + (3)$	\$2,468,524	6.86%	\$1,954,193	5.74%	
5. Actuarial accrued liability	207,928,237		186,235,650		
6. Actuarial value of assets	<u>152,955,923</u>		<u>125,714,763</u>		
7. Unfunded actuarial accrued liability: (5) - (6)	\$54,972,314		\$60,520,887		
8. Employer normal cost projected to July 1, 2015 and 2013, adjusted for timing	2,552,698	6.98%	1,988,097	5.71%	
9. Projected unfunded actuarial accrued liability	56,797,335		62,603,292		
10. Payment on projected unfunded actuarial accrued liability, adjusted for timing	4,733,199	12.94%	3,952,757	11.36%	
11. Total recommended contribution: $(8) + (10)^*$	\$7,285,897	<u>19.92%</u>	<u>\$5,940,854</u>	<u>17.07%</u>	
12. Projected payroll as of July 1	\$36,583,610		\$34,794,393		

\*Recommended contributions are assumed to be paid on October 1 for 2015 and July 1 for 2013.



#### CHART 16

Funding Schedule

(1) Fiscal Year Ended June 30	(2) Employer Normal Cost	(3) Amortization of 2010 ERI Liability	(4) Amortization of Remaining Liability	(5) Total Plan Cost: (2) + (3) + (4)	(6) Total Unfunded Actuarial Accrued Liability at Beginning of Year
2016	\$2,552,698	\$15,582	\$4,717,617	\$7,285,897	\$56,797,335
2017	2,651,080	15,582	4,895,610	7,562,273	55,660,305
2018	2,753,236	15,582	5,066,957	7,835,775	54,259,595
2019	2,859,310	15,582	5,244,300	8,119,192	52,584,387
2020	2,969,451	15,582	5,427,851	8,412,884	50,609,855
2021	3,083,815	15,582	5,617,826	8,717,223	48,309,276
2022	3,202,563	15,582	5,814,450	9,032,595	45,653,894
2023	3,325,862		6,017,955	9,343,818	42,612,777
2024	3,453,887		6,228,584	9,682,471	39,169,026
2025	3,586,817		6,446,585	10,033,402	35,271,618
2026	3,724,840		6,672,215	10,397,055	30,882,188
2027	3,868,151		6,905,742	10,773,893	25,959,513
2028	4,016,950		7,147,444	11,164,394	20,459,304
2029	4,171,447		7,397,604	11,569,051	14,333,994
2030	4,331,860		7,656,520	11,988,380	7,532,505
2031	4,498,415			4,498,415	

Notes: Recommended contributions are assumed to be paid on October 1.

Assumes amortization payments of remaining liability increase at 3.50% per year.

Assumes contribution of budgeted amount for fiscal year 2016.

Projected normal cost does not reflect the impact of pension reform for future hires.

Item (2) increases at 3.5% per year, plus an additional 0.15% adjustment to total normal cost to reflect the effects of mortality improvement due to generational mortality assumption.

#### EXHIBIT A

#### Table of Plan Coverage

	Year Ended		
Category	2014	2012	– Change From Prior Year
Active participants in valuation:			
Number	685	662	3.5%
Average age	45.6	45.6	N/A
Average years of service	10.7	10.8	N/A
Total payroll*	\$34,685,775	\$32,708,462	6.0%
Average payroll*	50,636	49,409	2.5%
Member contributions	32,198,294	29,528,888	9.0%
Inactive participants with a vested right to a deferred or immediate benefit	7	10	-30.0%
Inactive participants entitled to a return of employee contributions	198	207	-4.4%
Retired participants:			
Number in pay status	314	304	3.3%
Average age	75.2	74.9	N/A
Average monthly benefit	\$2,156	\$1,982	8.8%
Disabled participants:			
Number in pay status	34	36	-5.6%
Average age	61.9	62.1	N/A
Average monthly benefit	\$3,157	\$3,043	3.8%
Beneficiaries in pay status:	59	67	-11.9%
Average age	77.1	77.1	N/A
Average monthly benefit	\$1,118	\$1,044	7.1%

\* Payroll figures are for the prior year and reflect annualized salaries for participants hired during the year.

#### EXHIBIT B

Participants in Active Service as of December 31, 2014 By Age, Years of Service, and Average Payroll

	Years of Service									
Age	Total	0-4	5-9	10-14	15 - 19	20 - 24	25 - 29	30 - 34	35 - 39	40 & over
Under 25	47	47								
	\$27,319	\$27,319								
25 - 29	84	78	6							
	35,353	33,902	\$54,220							
30 - 34	69	38	23	8						
	45,699	38,665	53,264	\$57,365						
35 - 39	50	23	10	12	5					
	54,472	40,869	55,809	68,559	\$80,564					
40 - 44	63	16	6	20	18	3				
	63,782	48,171	50,136	65,165	75,585	\$94,305				
45 - 49	64	15	11	9	11	10	8			
	55,033	38,323	52,332	57,309	61,247	67,988	\$62,765			
50 - 54	104	28	14	19	7	13	15	7	1	
	55,563	34,927	46,846	54,996	60,847	66,792	75,452	\$86,036	\$71,577	
55 - 59	104	22	17	12	15	12	13	8	3	2
	57,745	43,278	38,335	47,433	62,116	71,134	73,612	84,352	71,153	\$100,961
60 - 64	61	7	9	12	12	6	6	3	4	2
	57,041	29,251	56,416	56,127	64,842	53,890	60,312	52,930	81,482	72,718
65 - 69	25	3	3	5	5	4	3	2		
	47,770	29,986	30,288	41,234	53,240	59,330	47,933	79,976		
70 & over	14	1	1	4	4	2		1	1	
	39,794	24,494	16,254	35,451	40,313	47,023		49,434	65,835	
Total	685	278	100	101	77	50	45	21	9	4
	\$50,636	\$35,728	\$49,073	\$56,835	\$64,940	\$66,788	\$68,812	\$78,345	\$75,193	\$86,839

#### EXHIBIT C

#### Summary Statement of Income and Expenses on an Actuarial Value Basis

	Year Ended Dece	ember 31, 2014	Year Ended Dece	ember 31, 2013
Net assets at actuarial value at the beginning of the year		\$134,816,197		\$125,714,763
Contribution income:				
Employer contributions	\$7,040,036		\$5,944,279	
Employee contributions	3,393,034		2,790,514	
Other contributions	30,431		24,160	
Less administrative expenses	-226,954		-224,217	
Net contribution income		10,236,547		8,534,736
Net investment income		11,992,246		10,627,187
Total income available for benefits		\$22,228,793		\$19,161,923
Less benefit payments:				
Pensions	-\$8,640,386		-\$8,259,279	
Net 3(8)(c) reimbursements	77,051		74,435	
Refunds, annuities, Option B refunds and transfers	-1,885,942		-2,015,799	
State reimbursements	104,514		140,154	
Workers' compensation	8,000		<u>0</u>	
Net benefit payments		-\$10,336,763		-\$10,060,489
Change in actuarial asset method		\$6,247,696		
Change in reserve for future benefits		\$11,892,030		\$9,101,434
Net assets at actuarial value at the end of the year		\$152,955,923		\$134,816,197

#### EXHIBIT D

Development of the Fund Through December 31, 2014

Employer Contributions	Employee Contributions	Other Contributions	Net Investment Return*	Administrative Expenses	Benefit Payments	Actuarial Value of Assets at End of Year
\$0	\$2,159,914	\$36,251	\$8,365,528	\$100,450	\$8,016,877	\$127,011,492
0	2,130,208	36,028	19,224,208	124,122	7,903,043	140,374,772
0	2,287,845	35,939	9,969,052	142,789	8,226,694	144,298,124
0	2,051,512	39,623	-41,672,425	139,646	8,080,623	96,496,566
1,000,000	3,012,679	46,230	37,497,893	154,822	8,384,093	129,514,453
2,010,429	2,867,996	47,213	4,283,430	192,808	8,907,068	129,623,644
3,138,566	2,920,656	34,125	-721,844	241,583	9,328,950	125,424,614
3,829,620	2,685,904	32,956	3,247,769	216,436	9,289,664	125,714,763
5,944,279	2,790,514	24,160	10,627,187	224,217	10,060,489	134,816,197
7,040,036	3,393,034	30,431	18,239,942	226,954	10,336,763	152,955,923
	Employer Contributions \$0 0 0 1,000,000 2,010,429 3,138,566 3,829,620 5,944,279 7,040,036	Employer ContributionsEmployee Contributions\$0\$2,159,91402,130,20802,287,84502,051,5121,000,0003,012,6792,010,4292,867,9963,138,5662,920,6563,829,6202,685,9045,944,2792,790,5147,040,0363,393,034	Employer ContributionsEmployee ContributionsOther Contributions\$0\$2,159,914\$36,25102,130,20836,02802,287,84535,93902,051,51239,6231,000,0003,012,67946,2302,010,4292,867,99647,2133,138,5662,920,65634,1253,829,6202,685,90432,9565,944,2792,790,51424,1607,040,0363,393,03430,431	Employer ContributionsEmployee Other Other Net Investment Return*\$0\$2,159,914\$36,251\$8,365,52802,130,20836,02819,224,20802,287,84535,9399,969,05202,051,51239,623-41,672,4251,000,0003,012,67946,23037,497,8932,010,4292,867,99647,2134,283,4303,138,5662,920,65634,125-721,8443,829,6202,685,90432,9563,247,7695,944,2792,790,51424,16010,627,1877,040,0363,393,03430,43118,239,942	Employer ContributionsEmployee ContributionsOther Other Net InvestmentAdministrative Expenses\$0\$2,159,914\$36,251\$8,365,528\$100,45002,130,20836,02819,224,208124,12202,287,84535,9399,969,052142,78902,051,51239,623-41,672,425139,6461,000,0003,012,67946,23037,497,893154,8222,010,4292,867,99647,2134,283,430192,8083,138,5662,920,65634,125-721,844241,5833,829,6202,685,90432,9563,247,769216,4365,944,2792,790,51424,16010,627,187224,2177,040,0363,393,03430,43118,239,942226,954	Employer ContributionOther OtherNet InvestmentAdministrative ExpensesBenefit Benefit\$\%\$\$2,159,914\$36,251\$8,365,528\$100,450\$8,016,877\$\%\$2,30,20836,02819,224,208124,1227,903,043\$\%\$2,287,84535,9399,969,052142,7898,226,694\$\%\$02,051,51239,623-41,672,425139,6468,080,623\$\\$\$0,012,67946,23037,497,893154,8228,384,093\$\\$\$2,867,99647,2134,283,430192,8088,907,068\$\\$\$,138,5662,920,65634,125-721,844241,5839,328,950\$\\$\$,944,2792,685,90432,9563,247,769216,4369,289,664\$\\$\$,944,2792,790,51424,16010,627,187224,21710,060,489\$\\$\$,040,3563,93,03430,43118,239,422226,95410,336,763

\* Net of investment fees. Reflects change in asset method in 2009, 2012 and 2014.

#### SECTION 3: Supplemental Information for the Town of Wellesley Contributory Retirement System

#### EXHIBIT E

**Table of Amortization Bases** 

Туре	Outstanding Balance as of July 1, 2015	Annual Fiscal Year 2016 Payment	Outstanding Balance as of July 1, 2016	Annual Fiscal Year 2017 Payment	Rate of Increase	Years Remaining as of July 1, 2015
2010 ERI liability	\$88,965	\$15,582	\$78,606	\$15,582	0.0%	7.00
Remaining unfunded liability	56,708,370	4,717,617	<u>55,581,699</u>	<u>4,895,610</u>	3.5%	15.00
Total	\$56,797,335	\$4,733,199	\$55,660,305	\$4,911,192		

Note: Payments assumed to be made on October 1.



#### EXHIBIT F

Group Results as of January 1, 2015

	Category	Group 1	Percent of Pay	Group 4	Percent of Pay	Total	Percent of Pay
1.	Participant counts						
	a) Active employees	576		109		685	
	b) Inactive members entitled to a return of their employee contributions	197		1		198	
	c) Inactive members with a vested right to a deferred or immediate benefit	7		0		7	
	d) Retired members	<u>291</u>		<u>116</u>		<u>407</u>	
	e) Total members: $(a) + (b) + (c) + (d)$	1,071		226		1,297	
2.	Projected payroll for calendar year 2015	\$27,127,115		\$8,832,612		\$35,959,727	
3.	Normal cost						
	a) Total normal cost	\$3,800,831	14.01%	\$1,828,498	20.70%	\$5,629,329	15.65%
	b) Expense allowance	168,796	0.62%	81,204	0.92%	250,000	0.70%
	c) Employee contributions	(2,561,579)	-9.44%	(849,226)	-9.61%	(3,410,805)	-9.49%
	d) Employer normal cost: $(a) + (b) + (c)$	\$1,408,048	5.19%	\$1,060,476	12.01%	\$2,468,524	6.86%
4.	Total actuarial accrued liability	128,247,194		79,681,043		207,928,237	
5.	Actuarial value of assets	<u>94,341,049</u>		<u>58,614,874</u>		<u>152,955,923</u>	
6.	Unfunded actuarial accrued liability: (4) - (5)	\$33,906,145		\$21,066,169		\$54,972,314	

#### EXHIBIT G

Department Results as of January 1, 2015

		Housing	Water	Light	School	Veteran	All Other	Total
1.	Participant counts							
	a) Active employees*	7	32	28	311	1	306	685
	b) Inactive members entitled to a return of their employee contributions	0	0	1	174	1	22	198
	c) Inactive members with a vested right to a deferred or immediate benefit	1	0	0	2	0	4	7
	d) Retired members	<u>4</u>	<u>14</u>	<u>34</u>	<u>121</u>	<u>1</u>	<u>233</u>	407
	e) Total members : $(a) + (b) + (c) + (d)$	12	46	63	608	3	565	1,297
2.	Projected payroll for calendar year 2015	\$302,733	\$1,970,652	\$2,303,625	\$11,117,705	\$52,568	\$20,212,444	\$35,959,727
3.	Normal Cost							
	a) Total normal cost	\$41,794	\$256,963	\$458,499	\$1,544,568	\$8,083	\$3,319,422	\$5,629,329
	b) Expense allowance	1,856	11,412	20,362	68,595	359	147,416	250,000
	c) Employee contributions	(28,013)	(180,359)	(216,987)	(1,034,959)	(5,182)	(1,945,305)	(3,410,805)
	d) Employer normal cost : $(a) + (b) + (c)$	\$15,637	\$88,016	\$261,874	\$578,204	\$3,260	\$1,521,533	\$2,468,524
4.	Total actuarial accrued liability	1,394,442	11,587,819	19,116,592	42,066,536	279,985	133,482,863	207,928,237
5.	Actuarial value of assets	1,025,778	8,524,218	14,062,525	30,944,935	205,962	98,192,505	152,955,923
6.	Unfunded actuarial accrued liability : (4) - (5)	\$368,664	\$3,063,601	\$5,054,067	\$11,121,601	\$74,023	\$35,290,358	\$54,972,314
7.	Projected Employer Normal Cost, adjusted for timing	16,170	91,017	270,804	597,920	3,371	1,573,416	2,552,698
8.	Projected unfunded actuarial accrued liability	380,903	3,165,310	5,221,857	11,490,826	76,480	\$36,461,959	\$56,797,335
9.	2010 ERI Payment	0	0	15,582	0	0	0	15,582
10	. Payment on projected remaining unfunded actuarial accrued liability	34,723	218,104	488,321	631,695	4,203	3,340,571	4,717,617
11	. Budgeted contribution for fiscal 2016: (7) + (9) + (10)	\$50,893	\$309,121	\$774,707	\$1,229,615	\$7,574	\$4,913,987	\$7,285,897

#### SECTION 3: Supplemental Information for the Town of Wellesley Contributory Retirement System

	Housing	Water	Light	School	Veteran	All Other	Total
12. Recommended contribution for fiscal 2017	\$49,649	\$367,560	\$744,853	\$1,612,181	\$10,097	\$4,777,932	\$7,562,273
<ol> <li>Recommended contribution for fiscal 2018</li> </ol>	51,456	380,852	771,140	1,671,178	10,464	4,950,685	7,835,775

\* Certain employees have benefit accruals allocated to multiple departments.



#### EXHIBIT H

#### **Definitions of Pension Terms**

The following list defines certain technical terms for the convenience of the reader:

Assumptions or actuarial	
assumptions:	The estimates on which the cost of the Plan is calculated including:
	<ul> <li>(a) <u>Investment return</u> — the rate of investment yield that the Plan will earn over the long-term future;</li> </ul>
	<ul> <li>(b) <u>Mortality rates</u> — the death rates of employees and pensioners; life expectancy is based on these rates;</li> </ul>
	(c) <u>Retirement rates</u> — the rate or probability of retirement at a given age;
	(d) <u>Withdrawal rates</u> — the rates at which employees of various ages are expected to leave employment for reasons other than death, disability, or retirement.
Normal cost:	The amount of contributions required to fund the benefit allocated to the current year of service.
Actuarial accrued liability	
for actives:	The value of all projected benefit payments for current members less the portion that will be paid by future normal costs.
Actuarial accrued liability	
for pensioners:	The single-sum value of lifetime benefits to existing pensioners. This sum takes account of life expectancies appropriate to the ages of the pensioners and the interest that the sum is expected to earn before it is entirely paid out in benefits.
Unfunded actuarial accrued	
liability:	The extent to which the actuarial accrued liability of the Plan exceeds the assets of the Plan. There are many approaches to paying off the unfunded actuarial accrued liability, from meeting the interest accrual only to amortizing it over a specific period of time.

Amortization of the unfunded actuarial accrued liability:	Payments made over a period of years equal in value to the Plan's unfunded actuarial accrued liability.
Investment return:	The rate of earnings of the Plan from its investments, including interest, dividends and capital gain and loss adjustments, computed as a percentage of the average value of the fund. For actuarial purposes, the investment return often reflects a smoothing of the capital gains and losses to avoid significant swings in the value of assets from one year to the next.

#### EXHIBIT I

#### **Summary of Actuarial Valuation Results**

The	e valuation was made with respect to the following data supplied to us:		
1.	Retired participants as of the valuation date (including 59 beneficiaries in pay status)		407
2.	Participants active during the year ended December 31, 2014 with total accumulated contributions of \$32,198,294 and projected payroll as of January 1, 2015 of \$35,959,727		685
3.	Inactive participants with a right to a return of their employee contributions as of December 31, 2014		198
4.	Inactive participants with a vested right to a deferred or immediate benefit as of December 31, 2014		7
The	e actuarial factors as of the valuation date are as follows:		
1.	Normal cost, including administrative expenses		\$5,879,329
2.	Expected employee contributions		-3,410,805
3.	Employer normal cost: $(1) + (2)$		2,468,524
4.	Actuarial accrued liability		207,928,237
	Retired participants and beneficiaries	\$103,754,051	
	Active participants	101,684,411	
	Inactive participants	2,489,775	
5.	Actuarial value of assets (\$152,955,923 at market value as reported in the Annual Statement )		152,955,923
6.	Unfunded actuarial accrued liability: (4) – (5)		54,972,314
The	e actuarial factors projected to July 1, 2015 are as follows:		
1.	Employer normal cost projected to July 1, 2015, adjusted for timing		\$2,552,698
2.	Projected unfunded actuarial accrued liability		56,797,335
3.	Payment on projected unfunded actuarial accrued liability, adjusted for timing		4,733,199
4.	Total recommended contribution: $(1) + (3)$		<u>\$7,285,897</u>
5.	Projected payroll as of July 1, 2015		\$36,583,610
6.	Total budgeted appropriation as a percentage of projected payroll: $(4)/(5)$		19.92%

Note: Recommended contributions are assumed to be paid on October 1.

#### EXHIBIT II Funded Ratio

A critical piece of information regarding the Plan's financial status is the funded ratio. This ratio compares the actuarial value of assets to the actuarial accrued liabilities of the Plan as calculated. High ratios indicate a well-funded plan with assets sufficient to cover the plan's actuarial accrued liabilities. Lower ratios may indicate recent changes to benefit structures, funding of the plan below actuarial requirements, poor asset performance, or a variety of other factors.

These measurements are not necessarily appropriate for assessing the sufficiency of Plan assets to cover the estimated cost of settling the Plan's benefit obligation or the need for or the amount of future contributions.

The chart below depicts a history of the funded ratios for this plan. The funded ratio on both an actuarial and market value basis has increased from 67.50% as of January 1, 2013 to 73.56% as of January 1, 2015.



★ Segal Consulting

#### EXHIBIT III

Actuarial Assumptions and Actuarial Cost Method

Mortality Rates:	
Healthy:	RP-2014 Blue Collar Healthy Employee and Annuitant Mortality Tables with MP- 2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D (Previously, RP-2000 Healthy Employee and Annuitant Mortality Tables projected 15 years with Scale AA)
Disabled:	RP-2014 Blue Collar Healthy Annuitant Mortality Table with MP-2014 improvement projections backed out to a base year of 2006 projected generationally with Scale BB2D set forward 3 years for males (Previously, RP-2000 Healthy Annuitant Mortality Table set forward 3 years for males)
	The mortality tables reasonably reflect the projected mortality experience of the Plan as of the measurement date based on historical and current demographic data. As part of the analysis, a comparison was made between the actual number of retiree deaths and the projected number based on the prior years' assumption over the most recent five years. The mortality tables were then adjusted to future years using generational projection under Scale BB2D to reflect future mortality improvement.

<b>Termination Rates before Retirement:</b>			Group	s 1 and 2 -	Rate per year	(%)
			Mort	ality		
		Current		Previously		
	Age	Male	Female	Male	Female	Disability
	20	0.07	0.02	0.03	0.01	0.01
	25	0.07	0.02	0.03	0.02	0.02
	30	0.06	0.02	0.04	0.02	0.03
	35	0.07	0.03	0.07	0.04	0.05
	40	0.10	0.05	0.10	0.06	0.10
	45	0.16	0.09	0.12	0.09	0.15
	50	0.26	0.13	0.16	0.13	0.19
	55	0.38	0.19	0.23	0.22	0.24
	60	0.64	0.31	0.38	0.36	0.28

Notes: Mortality rates do not reflect generational projection.

55% of the disability rates shown represent accidental disability.

- 40% of the accidental disabilities will die from the same cause as the disability.
- 55% of the death rates shown represent accidental death.

		Gr	oup 4 - Rat	te per year (%)	
	Cu	rrent	Prev	iously	
Age	Male	Female	Male	Female	Disability
20	0.07	0.02	0.03	0.01	0.10
25	0.07	0.02	0.03	0.02	0.20
30	0.06	0.02	0.04	0.02	0.30
35	0.07	0.03	0.07	0.04	0.30
40	0.10	0.05	0.10	0.06	0.30
45	0.16	0.09	0.12	0.09	1.00
50	0.26	0.13	0.16	0.13	1.25
55	0.38	0.19	0.23	0.22	1.20
60	0.64	0.31	0.38	0.36	0.85

Notes: Mortality rates do not reflect generational projection.

90% of the disability rates shown represent accidental disability.
40% of the accidental disabilities will die from the same cause as the disability.
90% of the death rates shown represent accidental death.

★ Segal Consulting

SECTION 4: Reporting information for the rown of wellesley Contributory Retirement Syst	tem
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Withdrawal	Rates:
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Rate per year (%)			
Years of		Years of	
Service	Groups 1 and 2	Service	Group 4
0	15.0	0 - 10	1.5
1	12.0	11+	0.0
2	10.0		
3	9.0		
4	8.0		
5	7.6		
6	7.5		
7	6.7		
8	6.3		
9	5.9		
10	5.4		
11	5.0		
12	4.6		
13	4.1		
14	3.7		
15	3.3		
16 - 20	2.0		
21 - 29	1.0		
30+	0.0		
21 – 29 30+	1.0 0.0		

The termination rates and disability rates were based on historical and current demographic data, adjusted to reflect economic conditions of the area and estimated future experience and professional judgment. As part of the analysis, a comparison was made between the actual number of terminations and disability retirements and the projected number based on the prior years' assumption over the most recent five years.

**Retirement Rates:** 

			Rate	(%)		
		Current			Previous	
	Groups	s 1 and 2	Group 4	Group	s 1 and 2	Group 4
Age	Male	Female		Male	Female	
50			2.0	1.0	1.5	2.0
51			2.0	1.0	1.5	2.0
52			2.0	1.0	2.0	2.0
53			2.0	1.0	2.5	5.0
54			2.0	2.0	2.5	7.5
55	1.00	2.750	10.0	2.0	5.5	15.0
56	1.25	3.250	5.0	2.5	6.5	10.0
57	1.25	3.250	5.0	2.5	6.5	10.0
58	2.50	3.250	5.0	5.0	6.5	10.0
59	3.25	3.250	15.0	6.5	6.5	15.0
60	9.00	3.750	20.0	12.0	5.0	20.0
61	15.00	9.750	20.0	20.0	13.0	20.0
62	22.50	11.250	25.0	30.0	15.0	25.0
63	18.75	9.375	25.0	25.0	12.5	25.0
64	16.50	13.500	30.0	22.0	18.0	30.0
65	40.00	15.000	100.0	40.0	15.0	100.0
66	25.00	20.000	100.0	25.0	20.0	100.0
67	25.00	20.000	100.0	25.0	20.0	100.0
68	30.00	25.000	100.0	30.0	25.0	100.0
69	30.00	20.000	100.0	30.0	20.0	100.0
70	100.00	100.000	100.0	100.0	100.0	100.0

The retirement rates were based on historical and current demographic data, adjusted to reflect economic conditions of the area and estimated future experience and professional judgment. As part of the analysis, a comparison was made between the

	actual number of retirements by age and the projected number based on the prior years' assumption over the most recent five years.
<b>Retirement Age for Inactive Vested Participants:</b>	Age 60 for Groups 1 and 2 and age 50 for Group 4 (Previously, age 55 for Groups 1 and 2 and age 45 for Group 4).
	The retirement age for inactive vested participants was based on historical and current demographic data, adjusted to reflect economic conditions of the area and estimated future experience and professional judgment.
Unknown Data for Participants:	Same as those exhibited by participants with similar known characteristics.
Family Composition:	80% of participants are assumed to be married. None are assumed to have dependent children. Females are assumed to be three years younger than their spouses.
Benefit Election:	All participants are assumed to elect Option A. The benefit election reflects the fact that all benefit options are actuarially equivalent.
Net Investment Return:	6.75% (Previously, 7.00%)
	The net investment return assumption is a long-term estimate derived from historical data, current and recent market expectations, and professional judgment. As part of the analysis, a building block approach was used that reflects inflation expectations and anticipated risk premiums for each of the portfolio's asset classes, as well as the Plan's target asset allocation.
Interest on Employee Contributions:	3.50%

#### SECTION 4: Reporting Information for the Town of Wellesley Contributory Retirement System

Salary Increases:				
	Years of Service	Groups 1 and 2	Group 4	
	0	7.00%	8.00%	-
	1	6.50%	7.50%	
	2	6.00%	7.00%	
	3	5.50%	6.50%	
	4	5.25%	6.00%	
	5	5.00%	5.50%	
	6	4.75%	5.25%	
	7	4.50%	5.00%	
	8	4.25%	4.75%	
	9	4.00%	4.50%	
	10	3.75%	4.25%	
	11+	3.50%	4.00%	
	The salary current and	scale assumption is a d recent market expec	long-term estimatations, and profe	ate derived from historical data, essional judgment.
Administrative Expenses:	\$250,000 1	for calendar 2015 incr	easing 3.5% per	year.
	The admin by the Ret	iistrative expense assu irement System.	mption is based	on information on expenses provided
Total Service	Total cred service.	itable service reported	in the data, plus	additional anticipated buy-back
2014 Salary:	2014 salar were annu	ies are equal to salarie alized.	es provided in the	e data, except salaries for new hires
Net 3(8)(c) Liability:	No liabilit	y is valued for benefit	s paid to or recei	ved from other municipal systems.

#### SECTION 4: Reporting Information for the Town of Wellesley Contributory Retirement System

Actuarial Value of Assets:	Market value of assets less unrecognized return in each of the last five years with a fresh start as of January 1, 2015. Unrecognized return is equal to the difference between the actual market value return and the expected market value return and is recognized over a five-year period, further adjusted, if necessary, to be within 20% of the market value. (Previously, market value of assets less unrecognized return in each of the last five years with a fresh start as of January 1, 2013. Unrecognized return is equal to the difference between the actual market value return and the expected market value return and is recognized over a five-year period, further adjusted, if necessary, to be within 20% of the market value return and the expected market value return and is recognized over a five-year period, further adjusted, if necessary, to be within 20% of the market value.)	
Actuarial Cost Method:	Entry Age Normal Actuarial Cost Method. Entry Age is the attained age of the participant minus total creditable service. Normal Cost and Actuarial Accrued Liability are calculated on an individual basis and are allocated by salary. Normal Cost is determined by using the plan of benefits applicable to each participant.	
Changes in Assumptions:	The following actuarial assumptions were changed with this valuation:	
	> The investment return assumption was decreased from 7.00% to 6.75%.	
	The mortality assumption was changed from the RP-2000 Healthy Employee and Annuitant Mortality Tables projected 15 years with Scale AA to the RP-2014 Blue Collar Healthy Employee and Annuitant Mortality Tables with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D.	
	The mortality assumption for disabled participants was changed from the RP-2000 Healthy Annuitant Mortality Table set forward 3 years for males to the RP-2014 Blue Collar Healthy Annuitant Mortality Table projected with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D set forward 3 years for males.	
	The asset valuation method was changed from an actuarial value of assets with a fresh start as of January 1, 2013 to an actuarial value of assets with a fresh start as of January 1, 2015.	

- > The retirement rates were reduced for certain ages.
- The retirement age for inactive vested participants was changed from age 55 to age 60 for Group 1 and 2 members and from age 45 to age 50 for Group 4 members.

#### EXHIBIT IV

#### Summary of Plan Provisions

This exhibit summarizes the major provisions of Chapter 32 of the Laws of Massachusetts.

Plan Year:	January 1 – Decer	nber 31		
Retirement Benefits				
	Employees covered by the Contributory Retirement Law are classified into one of four groups depending on job classification. Group 1 comprises most positions in state and local government. It is the general category of public employees. Group 4 comprises mainly police and firefighters. Group 2 is for other specified hazardous occupations. (Officers and inspectors of the State Police are classified as Group 3.)			
	For employees hir allowance is based number of years a multiplied by a pe member at retirem	ed prior to April 2 l on the member's nd full months of o rcentage according tent:	, 2012, the annual final three-year av creditable service a g to the following t	amount of the retirement verage salary multiplied by the at the time of retirement and vable based on the age of the
	Porcont	Group 1		Group 4
	Percent	Group I	Group z	Group 4
	2.5	65 or over	60 or over	55 or over
	2.4	64	59	54
	2.3	63	58	53
	2.2	62	57	52
	2.1	61	56	51
	2.0	60	55	50
	1.9	59		49
	1.8	58		48
	1.7	57		47
	1.7 1.6	57 56		47 46

A member's final three-year average salary is defined as the greater of the highest consecutive three-year average annual rate of regular compensation and the average annual rate of regular compensation received during the last three years of creditable service prior to retirement.

For employees hired on April 2, 2012 or later, the annual amount of the retirement allowance is based on the member's final five-year average salary multiplied by the number of years and full months of creditable service at the time of retirement and multiplied by a percentage according to the following tables based on the age and years of creditable service of the member at retirement:

#### For members with less than 30 years of creditable service:

#### Age Last Birthday at Date of Retirement

Percent	Group 1	Group 2	Group 4
2.50	67 or over	62 or over	57 or over
2.35	66	61	56
2.20	65	60	55
2.05	64	59	54
1.90	63	58	53
1.75	62	57	52
1.60	61	56	51
1.45	60	55	50

For members with 30 years of creditable service or greater:

#### Age Last Birthday at Date of Retirement

Percent	Group 1	Group 2	Group 4
2.500	67 or over	62 or over	57 or over
2.375	66	61	56
2.250	65	60	55
2.125	64	59	54
2.000	63	58	53
1.875	62	57	52
1.750	61	56	51
1.625	60	55	50

A member's final five-year average salary is defined as the greater of the highest consecutive five-year average annual rate of regular compensation and the average annual rate of regular compensation received during the last five years of creditable service prior to retirement.

For employees who became members after January 1, 2011, regular compensation is limited to 64% of the federal limit found in 26 U.S.C. 401(a)(17). In addition, regular compensation for members who retire after April 2, 2012 will be limited to prohibit "spiking" of a member's salary to increase the retirement benefit.

For all employees, the maximum annual amount of the retirement allowance is 80 percent of the member's final average salary. Any member who is a veteran also receives an additional yearly retirement allowance of \$15 per year of creditable service, not exceeding \$300. The veteran allowance is paid in addition to the 80 percent maximum.

Employee Contributions		
	Date of Hire	Contribution Rate
	Prior to January 1, 1975	5%
	January 1, 1975 – December 31, 1983	7%
	January 1, 1984 – June 30, 1996	8%
	July 1, 1996 onward	9%
	In addition, employees hired after Dec percent of salary in excess of \$30,000.	ember 31, 1978 contribute an additional 2
	Employees hired after 1983 who volur than 10 ten years of credited service re	ntarily withdraw their contributions with less aceive 3% interest on their contributions.
	Employees in Group 1 hired on or afte service or greater will pay a base contr	r April 2, 2012 with 30 years of creditable ibution rate of 6%.
Retirement Benefits (Superannuati	on)	

Members of Group 1, 2 or 4 hired prior to April 2, 2012 may retire upon the attainment of age 55. For retirement at ages below 55, twenty years of creditable service is required.

	Members hired prior to April 2, 2012 who terminate before age 55 with ten or more years of creditable service are eligible for a retirement allowance upon the attainment of age 55 (provided they have not withdrawn their accumulated deductions from the Annuity Savings Fund of the System).
	Members of Group 1 hired April 2, 2012 or later may retire upon the attainment of age 60. Members of Group 2 or 4 hired April 2, 2012 or later may retire upon the attainment of age 55. Members of Group 4 may retire upon attainment of age 50 with ten years of creditable service.
	Members hired April 2, 2012 or later who terminate before age 55 (60 for members of Group 1) with ten or more years of creditable service are eligible for a retirement allowance upon the attainment of age 55 (60 for members of Group 1) provided they have not withdrawn their accumulated deductions from the Annuity Savings Fund of the System.
Ordinary Disability Benefits	
	A member who is unable to perform his or her job due to a non-occupational disability will receive a retirement allowance if he or she has ten or more years of creditable service and has not reached age 55. The annual amount of such allowance shall be determined as if the member retired for superannuation at age 55 (age 60 for Group 1 members hired on or after April 2, 2012), based on the amount of creditable service at the date of disability. For veterans, there is a minimum benefit of 50 percent of the member's most recent year's pay plus an annuity based on his or her own contributions.
Accidental Disability Benefit	
	For a job-connected disability, the benefit is 72 percent of the member's most recent annual pay plus an annuity based on his or her own contributions, plus additional amounts for surviving children. Benefits are capped at 75 percent of annual rate of regular compensation for employees who become members after January 1, 1988.

Death Benefits	
	In general, the beneficiary of an employee who dies in active service will receive a refund of the employee's own contributions. Alternatively, if the employee were eligible to retire on the date of death, a spouse's benefit will be paid equal to the amount the employee would have received under Option C. The surviving spouse of a member who dies with two or more years of credited service has the option of a refund of the employee's contributions or a monthly benefit regardless of eligibility to retire, if they were married for at least one year. There is also a minimum widow's pension of \$250 per month, and there are additional amounts for surviving children.
	If an employee's death is job-connected, the spouse will receive 72 percent of the member's most recent annual pay, in addition to a refund of the member's accumulated deductions, plus additional amounts for surviving children. However, in accordance with Section 100 of Chapter 32, the surviving spouse of a police officer, firefighter or corrections officer is killed in the line of duty will be eligible to receive an annual benefit equal to the maximum salary held be the member at the time of death.
	Upon the death of a job-connected disability retiree who retired prior to November 7, 1996 and could not elect an Option C benefit, a surviving spouse will receive an allowance of \$6,000 per year if the member dies for a reason unrelated to cause of disability.
"Heart And Lung Law" And Ca	ncer Presumption
	Any case of hypertension or heart disease resulting in total or partial disability or

Any case of hypertension or heart disease resulting in total or partial disability or death to a uniformed fireman, permanent member of a police department, or certain employees of a county correctional facility is presumed to have been suffered in the line of duty, unless the contrary is shown by competent evidence. Any case of disease of the lungs or respiratory tract resulting in total disability or death to a uniformed fireman is presumed to have been suffered in the line of duty, unless the contrary is shown by competent evidence. There is an additional presumption for uniformed firemen that certain types of cancer are job-related if onset occurs while actively employed or within five years of retirement.

SECTION 4:	<b>Reporting Informa</b>	tion for the Town o	of Wellesley Contributor	v Retirement System
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Options	
	Members may elect to receive a full retirement allowance payable for life under Option A. Under Option B a member may elect to receive a lower monthly allowance in exchange for a guarantee that at the time of death any contributions not expended for annuity payments will be refunded to the beneficiary. Option C allows the member to take a lesser retirement allowance in exchange for providing a survivor with two- thirds of the lesser amount. Option C pensioners will have benefits converted from a reduced to a full retirement if the beneficiary predeceases the retiree.
Post-Retirement Benefits	
	The Board has adopted the provisions of Section 51 of Chapter 127 of the Acts of 1999, which provide that the Retirement Board may approve an annual COLA in excess of the Consumer Price Index but not to exceed a 3% COLA on the first \$15,000 of a retirement allowance. Cost-of-living increases granted prior to July 1, 1998 are reimbursed by the Commonwealth and not reflected in this report.
Changes in Plan Provisions	None

#### **Net Pension Liability**

The components of the net pension liability of the Town of Wellesley Contributory Retirement System are as follows:

	December 31, 2014	December 31, 2013
Total pension liability	\$207,928,237	\$193,719,852
Plan fiduciary net position	152,955,923	142,338,421
System's net pension liability	54,972,314	51,381,431
Plan fiduciary net position as a percentage of the total pension liability*	73.56%	73.47%

\* These funded percentages are not necessarily appropriate for assessing the sufficiency of Plan assets to cover the estimated cost of settling the Plan's benefit obligation or the need for or the amount of future contributions.

Actuarial assumptions. The total pension liability as of December 31, 2014 was determined by an actuarial valuation as of December 31, 2014, using the following actuarial assumptions, applied to all periods included in the measurement:

Inflation	3.5%
Salary increases	Based on years of service, ranging from 7.00% decreasing to 3.50% after 10 years of service for Group 1 and 2 employees, and ranging from 8.00% decreasing to 4.00% after 10 years for Group 4 employees.
Investment rate of return	6.75%, net of pension plan investment expense, including inflation (previously, 7.00%)
Cost of Living Adjustments	3% of first \$15,000
Healthy:	RP-2014 Blue Collar Healthy Employee and Annuitant Mortality Tables with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D (Previously, RP-2000 Healthy Employee and Annuitant Mortality Tables projected 15 years with Scale AA)
Disabled:	RP-2014 Blue Collar Healthy Annuitant Mortality Table set forward 3 years for males with MP-2014 improvement projections backed out to a base year of 2006 projected generationally with Scale BB2D (Previously, RP-2000 Healthy Annuitant Mortality Table set forward 3 years for males)

The long-term expected rate of return on pension plan investments was determined using a building-block method in which best-estimate ranges of expected future real rates of return (expected returns, net of pension plan investment expense and inflation) are developed for each major asset class. These ranges are combined to produce the long-term expected rate of return by weighting the expected future real rates of return by the target asset allocation percentage and by adding expected inflation. Best estimates of arithmetic real rates of return for each major asset class included in the pension plan's target asset allocation as of December 31, 2014 are summarized in the following table:

Asset Class	Long-Term Expected Real Rate of Return
Domestic equity	6.40%
International developed markets equity	7.07%
International merging markets equity	9.26%
Core fixed income	1.53%
High-yield fixed income	4.25%
Real estate	4.30%
Commodities	3.77%
Hedge fund, GTAA, Risk parity	3.44%
Private equity	11.26%

*Discount rate:* The discount rate used to measure the total pension liability was 6.75%. The projection of cash flows used to determine the discount rate assumed plan member contributions will be made at the current contribution rate and that Town of Wellesley Contributory Retirement System contributions will be made at rates equal to the actuarially determined contribution rates. Based on those assumptions, the pension plan's fiduciary net position was projected to be available to make all projected future benefit payments of current plan members. Therefore, the long-term expected rate of return on pension plan investments was applied to all periods of projected benefit payments to determine the total pension liability.

Sensitivity of the net pension liability to changes in the discount rate. The following presents the net pension liability of the Town of Wellesley Contributory Retirement System, calculated using the discount rate of 6.75%, as well as what the Town of Wellesley Contributory Retirement System's net pension liability would be if it were calculated using a discount rate that is 1percentage-point lower (5.75%) or 1-percentage-point higher (7.75%) than the current rate:

	1% Decrease (5.75%)	Current Discount (6.75%)	1% Increase (7.75%)
Town of Wellesley Contributory Retirement			
System's net pension liability as of December 31, 2014	\$80,648,501	\$54,972,314	\$33,449,199

#### Schedule of Changes in the Net Pension Liability – Last Ten Years

	Year End December 31,									
	2014	2013	2012	2011	2010	2009	2008	2007	2006	2005
Total pension liability										
Service cost	\$5,067,998									
Interest Differences between expected and actual	13,553,363									
experience	(4,690,325)									
Changes of assumptions	10,614,112						- ACACD (	7/69 := ====		
Changes of benefit terms Benefit payments, including refunds of employee contributions	(10.336.763)		(HISIOI	icai informat	ion prior to n	npiementario	II OI GASD 0	//08 IS not ret	quifed)	
Net change in total pension liability	\$14.208.385									
Total pension liability - beginning	193 719 852									
Total pension liability - ending (a)	<u>\$207,928,237</u>									
Plan fiduciary net position										
Contributions – employer	\$7,070,467									
Contributions - employee	3,393,034									
Net investment income Benefit payments, including refunds of	10,717,718									
employee contributions	(10,336,763)		(Histor	rical informat	ion prior to ir	nplementatio	n of GASB 6'	7/68 is not red	quired)	
Administrative expenses	<u>(226,954)</u>									
Net change in fiduciary net position	\$10,617,502									
Plan fiduciary net position - beginning	142,338,421									
Plan fiduciary net position - ending (b)	\$152,955,923									
Net pension liability – ending: (a)-(b) Plan's fiduciary net position as a	\$54,972,314									
percentage of the total pension liability	73.56%		(Histor	rical informat	ion prior to ir	nplementatio	n of GASB 6'	7/68 is not red	quired)	
Covered-employee payroll*	\$37,792,050									
covered-employee payroll	145.46%									

\* Total compensation paid to members for calendar year 2014 as reported by the Town.

#### Schedule of Contributions – Last Ten Years

	Year End December 31,									
	2014	2013	2012	2011	2010	2009	2008	2007	2006	2005
Actuarially determined contribution*	\$7,040,036									
Contributions in relation to the actuarially determined contribution	<u>7,070,467</u>									
Contribution deficiency (excess)	<u>\$(30,431)</u>									
Covered-employee payroll	\$37,792,050									
Contributions as a percentage of covered- employee payroll	18.71%	(Historical information prior to implementation of GASB 67/68 is not required)								

\* Based on the results of the January 1, 2013 actuarial valuation (including assumptions and methods) which determined budged appropriation for fiscal 2015.

Pension Expense and Deferred Outflows/Inflows of Resources Related to Pensions

#### A. Pension expense for the year ended June 30, 2015

· · · · · · · · · · · · · · · · · · ·		
Service cost	\$5,067,998	
Interest	13,553,363	
Contributions – employee	(3,393,034)	
Projected earnings on pension plan investments	(9,960,182)	
Administrative expenses	226,954	
Recognized portion of current-period difference between expected and actual		
experience	(781,721)	
Recognized portion of current-period difference between projected and actual		
earnings on pension plan investments	(151,507)	
Recognized portion of current year period assumption change	1,769,019	
Recognized portion of current year period plan change		
Recognition of deferred outflows of resources		
Recognition of deferred inflows of resources	<u></u>	
Pension expense for fiscal year ended June 30, 2015	<u>\$6,330,890</u>	

#### B. Deferred outflows/inflows of resources related to pensions

	Deferred Outflows of Resources	Deferred Inflows of Resources
Differences between expected and actual experience	\$	\$3,908,604
Changes of assumptions	8,845,093	
Net difference between projected and actual earnings on pension plan investments	<u></u>	<u>606,029</u>
Total	\$8,845,093	\$4,514,633

#### C. Projected recognition of deferred outflows/(inflows)

Year Ended June 30,	Recognition
2016	\$835,791
2017	835,791
2018	835,791
2019	835,789
2020	987,298
Thereafter	

**Determination of Proportionate Share** 

Employer Name	Share of NPL	Percent of Total Appropriation
Housing	\$368,664	0.670636%
Water	3,063,601	5.572990%
Light	5,054,067	9.193841%
School	11,121,601	20.231276%
Town of Wellesley	35,364,381	64.331257%
Grand Totals:	\$54,972,314	100%

Note: NPL allocation based on the results of the January 1, 2015 actuarial valuation.

				Discount Rate Sensitivity			
Employer Name	Employer's Proportionate Share Allocation (1)	Net Pension Liability (2)	Covered Employee Payroll (3)	1% Decrease (5.75%) (4)	Current Discount Rate (6.75%) (5)	1% Increase (7.75%) (6)	
Housing	0.670636%	\$368,664	\$277,061	\$540,858	\$368,664	\$224,322	
Water	5.572990%	3,063,601	2,348,398	4,494,533	3,063,601	1,864,121	
Light	9.193841%	5,054,067	2,452,473	7,414,695	5,054,067	3,075,266	
School	20.231276%	11,121,601	10,486,182	16,316,221	11,121,601	6,767,200	
Town of Wellesley	64.331257%	35,364,381	22,227,936	51,882,194	35,364,381	21,518,290	
Grand Totals:	100.000000%	\$54,972,314	\$37,792,050	\$80,648,501	\$54,972,314	\$33,449,199	

		Schedule of C	Contributions	Pension Expense			
Employer Name	Statutory Required Contribution (7)	Contributions In Relation to the Statutory Required Contribution (8)	Contribution Deficiency/ (Excess) (9)	Contributions as a Percentage of Covered Employee Payroll (10)	Proportionate Share of Plan Pension Expense (11)	Net Amortization of Deferred Amounts from Changes in Proportion and Differences Between Employer Contributions and Proportionate Share of Contributions (12)	Total Employer Pension Expense (13)
Housing	\$49,410	(\$49,410)	\$	17.83%	\$42,457	\$	\$42,457
Water	298,690	(298,690)		12.72%	352,820		352,820
Light	748,559	(748,559)		30.52%	582,052		582,052
School	1,188,072	(1,210,503)	(22,431)	11.54%	1,280,820		1,280,820
Town of Wellesley	4,755,305	(4,763,305)	(8,000)	21.43%	4,072,741		4,072,741
Grand Totals:	\$7,040,036	(\$7,070,467)	(\$30,431)	18.71%	\$6,330,890		\$6,330,890

	Deferred Outflows of Resources				Deferred Inflows of Resources					
Employer Name	Differences Between Expected and Actual Experience (14)	Net Difference Between Projected and Actual Investment Earnings on Pension Plan Investments (15)	Changes of Assumptions (16)	Changes in Proportion and Differences Between Employer Contributions and Proportionate Share of Contributions (17)	Total Deferred Outflows of Resources (18)	Differences Between Expected and Actual Experience (19)	Net Difference Between Projected and Actual Investment Earnings on Pension Plan Investments (20)	Changes of Assumptions (21)	Changes in Proportion and Differences Between Employer Contributions and Proportionate Share of Contributions (22)	Total Deferred Inflows of Resources (23)
Housing	\$	\$	\$59,318	\$	\$59,318	\$26,213	\$4,064	\$	\$	\$30,277
Water			492,936		492,936	217,826	33,774			251,600
Light			813,204		813,204	359,351	55,717			415,068
School			1,789,475		1,789,475	790,761	122,607			913,368
Town of Wellesley			5,690,160		5,690,160	2,514,453	389,867			2,904,320
Grand Totals:			\$8,845,093		\$8,845,093	\$3,908,604	\$606,029			\$4,514,633

	Defe	erred Inflows/(0	oflows/(Outflows) Recognized In Future Pension Ex (Year Ended June 30):				
Employer Name	2016 (24)	2017 (25)	2018 (26)	2019 (27)	2020 (28)	Thereafter (29)	
Housing	\$5,605	\$5,605	\$5,605	\$5,605	\$6,621	\$	
Water	46,579	46,579	46,579	46,578	55,022		
Light	76,841	76,841	76,841	76,841	90,771		
School	169,091	169,091	169,091	169,091	199,743		
Town of Wellesley	537,675	537,675	537,675	537,674	635,141		
Grand Totals:	\$835,791	\$835,791	\$835,791	\$835,789	\$987,298		

#### Notes to Required Supplementary Information

Valuation date	Actuarial determined contributions rates are calculated as of January 1 two years prior to the end of the employer's fiscal year in which contributions are reported. [Use new language]			
Actuarial cost method	Entry Age Normal Cost Method			
Amortization method	Level dollar for 2010 ERI liability and 3.5% increasing payments for the remaining unfunded liability			
Remaining amortization period	7 years from July 1, 2015 for 2010 ERI and 15 years from July 1, 2015 for remaining unfunded liability			
Asset valuation method	Market value.			
Actuarial assumptions:				
Investment rate of return	6.75% (previously, 7.00%)			
Discount rate	6.75% (previously, 7.00%)			
Inflation rate	3.5%			
Projected salary increases	Based on years of service, ranging from 7.00% decreasing to 3.50% after 10 years of service for Group 1 and 2 employees, and ranging from 8.00% decreasing to 4.00% after 10 years for Group 4 employees.			
Cost of living adjustments	3.00% of first \$15,000 of retirement income			
Plan membership:				
Retired participants and beneficiaries receiving benefits	407			
Inactive participants entitled to a return of their employee contributions	198			
Inactive participants with a vested right to a deferred or immediate benefit	7			
Active participants	<u>685</u>			
Total	1,297			

#### SECTION 5: GASB Information for the Town of Wellesley Contributory Retirement System

Changes in Assumptions:	The following changes were effective January 1, 2015
	> The investment return assumption was decreased from 7.00% to 6.75%.
	The mortality assumption was changed from the RP-2000 Healthy Employee and Annuitant Mortality Tables projected 15 years with Scale AA to the RP-2014 Blue Collar Healthy Employee and Annuitant Mortality Tables with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D.
	The mortality assumption for disabled participants was changed from the RP-2000 Healthy Annuitant Mortality Table set forward 3 years for males to the RP-2014 Blue Collar Healthy Annuitant Mortality Table set forward 3 years for males projected with MP-2014 improvement projections backed out to a base year of 2006 and projected generationally with Scale BB2D.
	> The asset valuation method described in Exhibit III of Section 4 was changed from an actuarial value of assets with a fresh start as of January 1, 2013 to an actuarial value of assets with a fresh start as of January 1, 2015.
	> The retirement rates were reduced for certain ages.
	The retirement age for inactive vested participants was changed from age 55 to age 60 for Group 1 and 2 members and from age 45 to age 50 for Group 4 members.
Changes in Plan Provisions:	None