

***Police and Fire Retirement System
of Wichita, Kansas***

***Actuarial Valuation Report
as of December 31, 2007***



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April 4, 2008

The Board of Trustees
Police and Fire Retirement System of Wichita, Kansas
City Hall, 12th Floor
Wichita, KS 67202

Dear Members of the Board:

At your request, we have performed an annual actuarial valuation of the Police and Fire Retirement System of Wichita, Kansas as of December 31, 2007 for determining contributions for fiscal year 2009. The major findings of the valuation are contained in this report. This report reflects the benefit provisions in effect as of December 31, 2007. There was no change in plan provisions or actuarial assumptions from the prior valuation.

In preparing this report, we relied, without audit, on information (some oral and some written) supplied by the System's staff. This information includes, but is not limited to, plan provisions, member data and financial information. In our examination of these data, we have found them to be reasonably consistent and comparable with data used for other purposes. Since the valuation results are dependent on the integrity of the data supplied, the results can be expected to differ if the underlying data is incomplete or missing. It should be noted that if any data or other information is inaccurate or incomplete, our calculations may need to be revised.

On the basis of the foregoing, we hereby certify that, to the best of our knowledge and belief, this report is complete and accurate and has been prepared in accordance with generally recognized and accepted principles and practices which are consistent with the Actuarial Standards of Practice promulgated by the Actuarial Standards Board (ASB) and the applicable Guides to Professional Conduct, amplifying Opinions and Supporting Recommendations of American Academy of Actuaries.

We further certify that all costs, liabilities, rates of interest and other factors for the System have been determined on the basis of actuarial assumptions and methods which are individually reasonable (taking into account the experience of the System and reasonable expectations of future experience); and which, in combination, offer our best estimate of anticipated experience under the Plan. Nevertheless, the emerging costs will vary from those presented in this report to the extent actual experience differs from that projected by

the actuarial assumptions. The Board of Trustees has the final decision regarding the appropriateness of the assumptions and adopted them as outlined in Appendix C.

Actuarial computations presented in this report are for purposes of determining the actuarial contribution rates for funding the System. Actuarial computations under GASB Statement No. 25 and 27 are for purposes of fulfilling financial accounting requirements. The computations prepared for these two purposes may differ as disclosed in our report. The calculations in the enclosed report have been made on a basis consistent with our understanding of the System's funding requirements and goals, and of GASB Statements No. 25 and 27. Determinations for purposes other than these requirements may be significantly different from the results contained in this report. Accordingly, additional determinations may be needed for other purposes.

Milliman's work product was prepared exclusively for the Police and Fire Retirement System of Wichita, Kansas for a specific and limited purpose. It is a complex, technical analysis that assumes a high level of knowledge concerning the Police and Fire Retirement System of Wichita, Kansas operations, and used data from the Police and Fire Retirement System of Wichita, Kansas, which Milliman has not audited. It is not for the use or benefit of any third party for any purpose. Any third party recipient of Milliman's work product who desires professional guidance should not rely upon Milliman's work product, but should engage professionals for advice appropriate to its own specific needs.

We would like to express our appreciation to Barbara Davis, Pension Manager, and to members of her staff, who gave substantial assistance in supplying the data on which this report is based.

We herewith submit the following report and look forward to discussing it with you.

Respectfully Submitted,

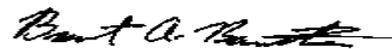
MILLIMAN, Inc.

I, Patrice A. Beckham, F.S.A. am a member of the American Academy of Actuaries and a Fellow of the Society of Actuaries, and meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained herein.

I, Brent A. Banister, F.S.A. am a member of the American Academy of Actuaries and a Fellow of the Society of Actuaries, and meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained herein.

A handwritten signature in cursive script that reads "Patrice Beckham".

Patrice A. Beckham, F.S.A.
Consulting Actuary

A handwritten signature in cursive script that reads "Brent A. Banister".

Brent A. Banister, F.S.A.
Actuary

SECTION 1

BOARD SUMMARY

OVERVIEW

This report presents the results of the December 31, 2007 actuarial valuation of the Police and Fire Retirement System of Wichita, Kansas (WPF). The primary purposes of performing a valuation are to:

- determine the employer contribution rates required to fund the System on an actuarial basis,
- disclose asset and liability measures as of the valuation date,
- determine the experience of the System since the last valuation date, and
- analyze and report on trends in System contributions, assets, and liabilities over the past several years.

There were no changes in the benefit provisions or actuarial assumptions from the last valuation. Following an audit commissioned by the Board, some valuation procedures were modified to better reflect plan provisions and available data. These changes added about \$2.5 million to the actuarial liability, an increase of approximately 0.50%.

The valuation results provide a “snapshot” view of the System’s financial condition on December 31, 2007. The Plan experienced an overall gain and the actuarial surplus increased from \$5.3 million in the 2006 valuation to \$12.7 million in the 2007 valuation. A detailed analysis of the change in the unfunded actuarial liability/(surplus) from December 31, 2006 to December 31, 2007 is shown on page 3.

ASSETS

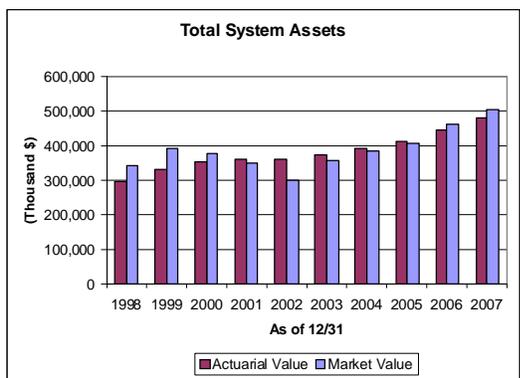
As of December 31, 2007, the System had total funds, when measured on a market value basis, of \$503.9 million. This was an increase of \$43 million from the December 31, 2006 figure of \$460.8 million. The components of the change in the market value of assets for the Retirement System (in millions) are set forth below:

	Market Value (\$M)
Assets, December 31, 2006	\$460.8
• City and Member Contributions	14.1
• Benefit Payments and Refunds	(19.7)
• Investment Income (net of expenses)	48.7
Assets, December 31, 2007	\$503.9

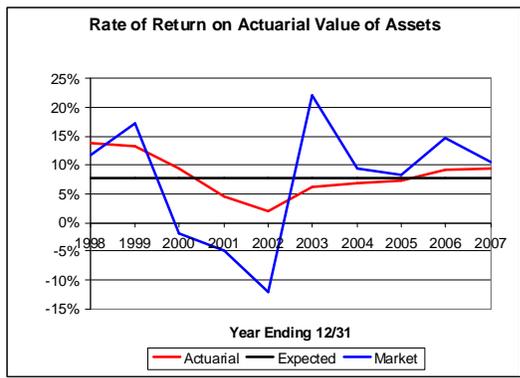
The market value of assets is not used directly in the calculation of the City's contribution rate. An asset valuation method, which smoothes the effect of market fluctuations, is used to determine the value of assets used in the valuation, called the "actuarial value of assets". The actuarial value of assets is equal to the expected value (calculated using the actuarial assumed rate of 7.75%) plus 25% of the difference between the market and expected values. See Table 3 on page 11 for a detailed development of the actuarial value of assets. The change in the actuarial value of assets from December 31, 2006 to December 31, 2007 is shown below:

	Actuarial Value (\$M)
Assets, December 31, 2006	\$444.5
<ul style="list-style-type: none"> • City and Member Contributions • Benefit Payments and Refunds • Investment Income (net of expenses) 	<p style="text-align: right;">14.1</p> <p style="text-align: right;">(19.7)</p> <p style="text-align: right;">41.9</p>
Assets, December 31, 2007	\$480.8

The annualized dollar-weighted rate of return, measured on the actuarial value of assets, was 9.5% and, measured on the market value of assets, was approximately 10.6%. The actuarial value of assets as of December 31, 2007 was \$480.8 million, which represents an actuarial gain of about \$7.7 million.



The actuarial value of assets exceeded the market value from 2001 to 2005. However, due to strong returns in recent years, the market value of assets now exceeds the actuarial value.



In general, the rate of return on the actuarial value of assets has exceeded the assumed rate of 7.75%, resulting in experience gains for the Retirement System.

Due to the asset smoothing method, there remains a \$23 million difference of the market over actuarial value of assets. This deferred investment gain will help improve the System's funding or help offset unfavorable investment experience in future years.

LIABILITIES

The actuarial liability is that portion of the present value of future benefits that will not be paid by future employer normal costs or member contributions. The difference between this liability and the asset value at the same date is referred to as the unfunded actuarial liability (UAL), or (surplus) if the asset value exceeds the actuarial liability. The unfunded actuarial liability will be reduced if the employer's contributions exceed the employer's normal cost for the year, after allowing for interest earned on the previous balance of the unfunded actuarial liability. Benefit improvements, experience gains and losses, and changes in actuarial assumptions and procedures will also impact the total actuarial liability and the unfunded portion thereof.

The Actuarial Liability and Unfunded Actuarial Liability for the System as of December 31, 2007 are:

Actuarial Liability	\$468,114,640
Actuarial Value of Assets	480,820,001
Unfunded Actuarial Liability/(Surplus)	(12,705,361)

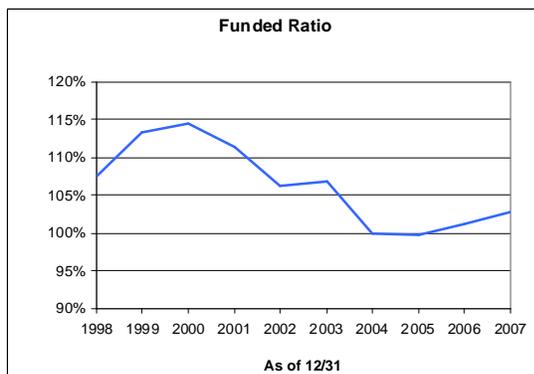
Between December 31, 2006 and December 31, 2007, the change in the unfunded actuarial liability for the System was as follows (in millions):

	\$(M)
UAL, December 31, 2006	(5.3)
+ Normal cost for year	13.1
+ Assumed investment return for year	0.5
- Actual contributions (member + City)	14.1
- Assumed investment return on contributions	0.5
= Expected Unfunded Actuarial Liability, December 31, 2007	(6.3)
+ Change from amendments	0.0
+ Change from assumption changes	0.0
+ Change from procedural changes from audit	2.5
= Expected UAL after changes	(3.8)
Actual UAL, December 31, 2007	(12.7)
Experience gain/(loss) (Expected UAL – Actual UAL)	8.9

The experience gain for the 2007 plan year of \$8.9 million was the result of an actuarial gain of \$7.7 million on System assets (actuarial value) and an actuarial gain of \$1.2 million on System liabilities.

Analysis of the unfunded actuarial liability strictly as a dollar amount can be misleading. Another way to evaluate the unfunded actuarial liability and the progress made in its funding is to track the funded status, the ratio of the actuarial value of assets to the actuarial liability. This information for recent years is shown below (in millions). Historical information is shown in the graph following the chart.

	12/31/03	12/31/04	12/31/05	12/31/06	12/31/07
Actuarial Liability (\$M)	\$350.4	\$393.4	\$414.0	\$439.2	\$468.1
Actuarial Value of Assets (\$M)	374.2	392.5	412.8	444.5	480.8
Funded Ratio (Assets/Liability)	106.8%	99.8%	99.7%	101.2%	102.7%



Over the past decade, the funded status of the Retirement System has both improved and declined. The assumption changes and actuarial loss in 2004 caused the funded ratio to decline sharply. The strong asset performance in 2006 and 2007 has once again returned the System to a surplus funded situation.

As mentioned earlier in this report, due to the asset smoothing method there is about a \$23 million difference between the market and actuarial value of assets. This deferred investment gain will help improve the System’s funding or help offset unfavorable investment experience in future years. The System’s funded status will be heavily dependent on investment returns in the next few years.

CONTRIBUTION RATES

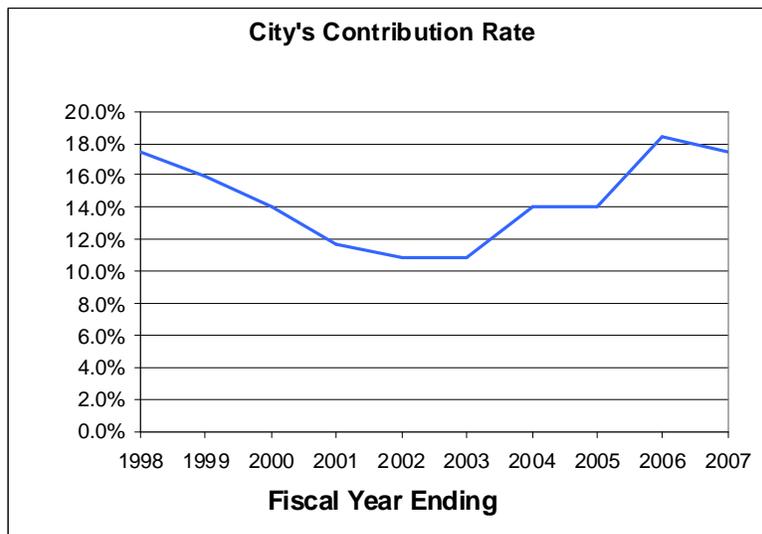
Generally, contributions to the System consist of:

- a “normal cost” for the portion of projected liabilities allocated to service of members during the year following the valuation date, by the actuarial cost method,
- an “unfunded actuarial liability or (surplus) contribution” for the excess of the portion of projected liabilities allocated to service to date over the actuarial value of assets.

Contribution rates are computed with the objective of developing costs that are level as a percentage of covered payroll. The contribution rate for fiscal year 2009 is computed based on the December 31, 2007 actuarial valuation.

As of December 31, 2007, the actuarial value of assets exceeds the actuarial liability. In accordance with State statutes the surplus may be amortized over a rolling 20-year period. The Board has elected to use this amortization period. Amortization of the surplus results in an offset to the normal cost rate. However, because of the comparatively small amount of the surplus, the adjustment rounds to 1.5% of pay. This valuation indicates the City contribution should be between 16.0% and 17.5%.

A summary of the City's historical contribution rate for the system is shown below:



COMMENTS

The System experienced a rate of return on the market value of assets of over 10% for calendar year 2007. As a result, the market value of assets is now about 5% higher than the actuarial value. Due to the asset smoothing method, there remains about a \$23 million difference of the market over actuarial value of assets. This deferred investment gain will help improve the System's funding or help offset unfavorable investment experience in future years.

Despite the fact the Plan has returned to a funded status of surplus assets, we recommend the City contribute the employer portion of the normal cost, 17.5%. Such action will avoid using part of the surplus to meet the current year's cost and increase the likelihood that the City's contribution rate will be more stable. As we have discussed in the past, the Plan's surplus is heavily dependent on future experience, particularly with respect to investment return. Given the volatility in the market, we believe it would be prudent to leave the surplus in the Plan so it is available to offset unfavorable experience in future years.

We conclude this Board Summary with the following exhibit which compares the principal results of the current and prior actuarial valuations.

SUMMARY OF PRINCIPAL RESULTS

1. PARTICIPANT DATA	<u>12/31/2007</u> <u>Valuation</u>	<u>12/31/2006</u> <u>Valuation</u>	<u>%</u> <u>Change</u>
Number of:			
Active Members			
Police	640	638	0.3%
Fire	452	443	2.0%
Total	1,092	1,081	1.0%
Retired Members and Beneficiaries	833	840	(0.8)%
Inactive Members	35	35	0.0%
Total Members	1,960	1,956	0.2%
 Annual Valuation Salaries of Active Members			
Police	\$ 34,859,220	\$ 32,710,323	6.6%
Fire	23,301,156	21,795,852	6.9%
Total	58,160,376	54,506,175	6.7%
 Annual Retirement Payments for			
Retired Members and Beneficiaries	\$ 18,777,464	\$ 18,349,917	2.3%
 2. ASSETS AND LIABILITIES			
Total Actuarial Liability	\$ 468,114,640	\$ 439,179,132	6.6%
Market Value of Assets	503,915,248	460,758,908	9.4%
Actuarial Value of Assets	480,820,001	444,497,827	8.2%
Unfunded Actuarial Liability/(Surplus)	\$ (12,705,361)	\$ (5,318,695)	138.9%
 3. EMPLOYER CONTRIBUTION RATES AS A PERCENT OF PAYROLL			
Normal Cost	24.6%	24.6%	0.0%
Member Financed	7.1%	7.1%	0.0%
Employer Normal Cost	17.5%	17.5%	0.0%
Amortization of Unfunded Actuarial Liability or (Surplus)	(1.5)%	(0.7)%	114.3%
 Range of Employer Contribution Rates			
Full Normal Cost Rate	17.5%	17.5%	0.0%
With Amortization Credit/Charge	16.0%	16.8%	(4.8)%

SECTION 2

SCOPE OF THE REPORT

This report presents the actuarial valuation of the Police and Fire Retirement System of Wichita, Kansas (WPF) as of December 31, 2007. This valuation was prepared at the request of the System's Board of Trustees. The report is based on plan provisions and actuarial assumptions that are unchanged from last year.

Please pay particular attention to our cover letter, where the guidelines employed in the preparation of this report are outlined. We also comment on the sources and reliability of both the data and the actuarial assumptions upon which our findings are based. Those comments are the basis for our certification that this report is complete and accurate to the best of our knowledge and belief.

A summary of the findings which result from this valuation is presented in the previous section. Section 3 describes the assets and investment experience of the System. Sections 4 and 5 describe how the obligations of the System are to be met under the actuarial cost method in use. Section 6 includes the information required for the financial reporting standards established by the Governmental Accounting Standards Board (GASB).

This report includes several appendices:

- Appendix A Schedules of valuation data classified by various categories of members.
- Appendix B A summary of the current benefit structure, as determined by the provisions of governing law on December 31, 2007.
- Appendix C A summary of the actuarial methods and assumptions used to estimate liabilities and determine contribution rates.
- Appendix D A glossary of actuarial terms.

SECTION 3

ASSETS

In many respects, an actuarial valuation can be thought of as an inventory process. The inventory is taken as of the actuarial valuation date, which for this valuation is December 31, 2007. On that date, the assets available for the payment of benefits are appraised. The assets are compared with the liabilities of the System, which are generally in excess of assets. The actuarial process then leads to a method of determining the contributions needed by members and the employer in the future to balance the System assets and liabilities.

Market Value of Assets

The current market value represents the “snapshot” or “cash-out” value of System assets as of the valuation date. In addition, the market value of assets provides a basis for measuring investment performance from time to time. At December 31, 2007, the market value of assets for the System was \$504 million. Table 1 is a comparison, at market values, of System assets as of December 31, 2007, and December 31, 2006, in total and by investment category. Table 2 summarizes the change in the market value of assets from December 31, 2006 to December 31, 2007.

Actuarial Value of Assets

Neither the market value of assets, representing a “cash-out” value of System assets, nor the book values of assets, representing the cost of investments, may be the best measure of the System’s ongoing ability to meet its obligations.

To arrive at a suitable value for the actuarial valuation, a technique for determining the actuarial value of assets is used which dampens swings in the market value while still indirectly recognizing market values. This methodology, first adopted in the December 31, 2002 valuation, smoothes market experience by recognizing 25% of the difference between the expected value (based on the actuarial assumption) and market value. Table 3 shows the development of the actuarial value of assets (AVA) as of December 31, 2007.

In the later part of the 1990’s, the actuarial value was lower than the market value of assets. However, due to the negative rate of returns on the market value of assets from 2000 to 2002, the actuarial value of assets was greater than the market value for several years. The market value again exceeds the actuarial value by about \$23 million. Absent rates of return below the assumed rate of 7.75% in the short term, the unrecognized gains (difference between the market and actuarial value) will flow into the actuarial value of assets and create actuarial gains in future valuations.

TABLE 1
WICHITA POLICE AND FIRE RETIREMENT SYSTEM
ANALYSIS OF NET ASSETS AT MARKET VALUE

	As of December 31, 2007			As of December 31, 2006		
	<u>Amount</u> <u>(\$ Millions)</u>	<u>% of</u> <u>Total</u>	%	<u>Amount</u> <u>(\$ Millions)</u>	<u>% of</u> <u>Total</u>	%
Cash & Equivalents	\$ 0.7	0.1	%	\$ 0.6	0.1	%
Government Securities	50.0	9.9		12.8	2.8	
Corporate debt	43.8	8.7		29.1	6.3	
Mortgage Backed Securities	57.0	11.3		26.0	5.6	
Pooled Funds	67.3	13.4		98.9	21.4	
Domestic Equity	178.5	35.4		164.4	35.7	
International Equity	101.3	20.1		104.9	22.8	
Real Estate	28.4	5.6		24.2	5.3	
Securities Lending Collateral Pool	80.1	15.9		47.7	10.3	
Other	0.4	0.1		0.3	0.1	
Receivables	8.5	1.7		5.5	1.2	
Liabilities	<u>(112.1)</u>	<u>(22.2)</u>		<u>(53.6)</u>	<u>(11.6)</u>	
Total	\$ 503.9	100.0	%	\$ 460.8	100.0	%

TABLE 2
WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF CHANGES IN NET ASSETS
DURING YEAR ENDED DECEMBER 31, 2007

(Market Value)

1. Market Value of Assets as of December 31, 2006	\$	460,758,908
2. Contributions:		
a. Members	\$	4,056,022
b. City		10,029,253
c. Other		0
d. Total	\$	<u>14,085,275</u>
[2(a) + 2(b) + 2(c)]		
3. Investment Income		
a. Interest and Dividends	\$	13,276,455
b. Net Appreciation in Fair Value		38,025,727
c. Commission Recapture		38,523
d. Securities Lending Income		289,799
e. Total	\$	<u>51,630,504</u>
[3(a) + 3(b) + 3(c) + 3(d)]		
4. Expenditures		
a. Refunds of Member Contributions	\$	254,190
b. Benefits Paid:		
(1) Pension and Death Benefits		18,569,472
(2) Back DROP Payments		873,050
c. Administrative Expenses		366,637
d. Investment Expenses		2,496,090
e. Total	\$	<u>22,559,439</u>
[4(a) + 4(b) + 4(c) + 4(d)]		
5. Net Change [2(d) + 3(e) - 4(e)]	\$	43,156,340
6. Market Value of Assets as of December 31, 2007	\$	503,915,248
(1) + (5)		

TABLE 3
WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DEVELOPMENT OF ACTUARIAL VALUE
OF ASSETS

As of December 31, 2007

1. Actuarial Value of Assets as of December 31, 2006	\$ 444,497,827
2. Actual Contribution/Disbursements	
a. Contributions	\$ 14,085,275
b. Benefit Payments and Refunds	<u>(19,696,712)</u>
c. Net	\$ (5,611,437)
3. Expected Value of Assets as of December 31, 2007 [(1) x 1.0775] + [(2c) x (1.0775) ⁵]	\$ 473,121,585
4. Market Value of Assets as of December 31, 2007	\$ 503,915,248
5. Difference Between Market and Expected Values (4) - (3)	\$ 30,793,663
6. Actuarial Value of Assets as of December 31, 2007 (3) + [(5) x 25%]	\$ 480,820,001
Actuarial Value of Assets divided by Market Value of Assets	95.4%
Market Value of Assets less Actuarial Value of Assets	\$ 23,095,247

SECTION 4

SYSTEM LIABILITIES

In the previous section, an actuarial valuation was compared with an inventory process, and an analysis was given of the inventory of assets of the System as of the valuation date, December 31, 2007. In this section, the discussion will focus on the commitments of the System, which are referred to as its liabilities.

Table 4 contains an analysis of the actuarial present value of all future benefits (PVFB) for contributing members, inactive members, retirees and their beneficiaries.

The liabilities summarized in Table 4 include the actuarial present value of all future benefits expected to be paid with respect to each member. For an active member, this value includes the measurement of both benefits already earned and future benefits to be earned. For all members, active and retired, the value extends over benefits earnable and payable for the rest of their lives and for the lives of the surviving beneficiaries.

All liabilities reflect the benefit provisions in place as of December 31, 2007.

Actuarial Liability

A fundamental principle in financing the liabilities of a retirement program is that the cost of its benefits should be related to the period in which benefits are earned, rather than to the period of benefit distribution. An actuarial cost method is a mathematical technique that allocates the present value of future benefits into annual costs. In order to do this allocation, it is necessary for the funding method to “breakdown” the present value of future benefits into two components:

- (1) that which is attributable to the past and
- (2) that which is attributable to the future.

Actuarial terminology calls the part attributable to the past the “past service liability” or the “actuarial liability”. The portion allocated to the future is known as the present value of future normal costs, with the specific piece of it allocated to the current year being called the “normal cost”. Table 5 contains the calculation of actuarial liability for the System. The Entry Age Normal actuarial cost method is used to develop the actuarial liability.

TABLE 4**WICHITA POLICE AND FIRE RETIREMENT SYSTEM****PRESENT VALUE OF FUTURE BENEFITS (PVFB)
AS OF DECEMBER 31, 2007**

	Plans		
	<u>A and B</u>	<u>Plan C</u>	<u>Total</u>
1. Active employees			
a. Retirement Benefit	\$ 40,189,683	\$ 281,333,755	\$ 321,523,438
b. Pre-Retirement Death Benefit	12,390	4,308,981	4,321,371
c. Withdrawal Benefit	0	13,712,071	13,712,071
d. Disability Benefit	97,446	46,341,053	46,438,499
e. Total	\$ 40,299,519	\$ 345,695,860	\$ 385,995,379
2. Inactive Vested Members	\$ 0	\$ 9,496,359	\$ 9,496,359
3. Inactive Nonvested Members	\$ 0	\$ 0	\$ 0
4. In Pay Members			
a. Retirees	\$ 142,638,156	\$ 12,743,000	\$ 155,381,156
b. Disabled Members	20,782,057	23,190,754	43,972,811
c. Beneficiaries	18,869,621	3,173,479	22,043,100
d. Total	\$ 182,289,834	\$ 39,107,233	\$ 221,397,067
5. Total Present Value of Future Benefits (1e) + (2) + (3) + (4d)	\$ 222,589,353	\$ 394,299,452	\$ 616,888,805

TABLE 5**WICHITA POLICE AND FIRE RETIREMENT SYSTEM****ACTUARIAL LIABILITY
AS OF DECEMBER 31, 2007**

	Plans		
	<u>A and B</u>	<u>Plan C</u>	<u>Total</u>
1. Active employees			
a. Present Value of Future Benefits	\$ 40,299,519	\$ 345,695,860	\$ 385,995,379
b. Present Value of Future Normal Costs	2,443,355	146,330,810	148,774,165
c. Actuarial Liability (1a) - (1b)	\$ 37,856,164	\$ 199,365,050	\$ 237,221,214
2. Inactive Vested Members	\$ 0	\$ 9,496,359	\$ 9,496,359
3. Inactive Nonvested Members	\$ 0	\$ 0	\$ 0
4. In Pay Members			
a. Retirees	\$ 142,638,156	\$ 12,743,000	\$ 155,381,156
b. Disabled Members	20,782,057	23,190,754	43,972,811
c. Beneficiaries	18,869,621	3,173,479	22,043,100
d. Total	\$ 182,289,834	\$ 39,107,233	\$ 221,397,067
5. Total Actuarial Liability (1c) + (2) + (3) + (4d)	\$ 220,145,998	\$ 247,968,642	\$ 468,114,640

SECTION 5

EMPLOYER CONTRIBUTIONS

The previous two sections were devoted to a discussion of the assets and liabilities of the System. A comparison of Tables 3 and 4 indicates that current assets fall short of meeting the present value of future benefits (total liability). This is expected in all but a completely closed fund, where no further contributions are anticipated. In an active system, there will almost always be a difference between the actuarial value of assets and total liabilities. This deficiency has to be made up by future contributions and investment returns. An actuarial valuation sets out a schedule of future contributions that will deal with this deficiency in an orderly fashion.

The method used to determine the incidence of the contributions in various years is called the actuarial cost method. Under an actuarial cost method, the contributions required to meet the difference between current assets and current liabilities are allocated each year between two elements: (1) the normal cost rate and (2) the unfunded actuarial liability contribution rate.

The term “fully funded” is often applied to a system in which contributions at the normal cost rate are sufficient to pay for the benefits of existing employees as well as for those of new employees. More often than not, systems are not fully funded, either because of past benefit improvements that have not been completely funded or because of actuarial deficiencies that have occurred because experience has not been as favorable as anticipated. Under these circumstances, an unfunded actuarial liability (UAL) exists. Likewise, when the actuarial value of assets is greater than the actuarial liability, a surplus exists.

Description of Contribution Rate Components

The Entry Age Normal (EAN) actuarial cost method is used for the valuation. Under this method, the normal cost for each year from entry age to assumed exit age is a constant percentage of the member’s year by year projected compensation. The portion of the present value of future benefits not provided by the present value of future normal costs is the actuarial liability. The unfunded actuarial liability/(surplus) represents the difference between the actuarial liability and the actuarial value of assets as of the valuation date. The unfunded actuarial liability is calculated each year and reflects experience gains/losses.

In general, contributions are computed in accordance with a level percent-of-payroll funding objective. The contribution rates based on this December 31, 2007 actuarial valuation will be used to determine employer contribution rates to the Police and Fire Retirement System of Wichita, Kansas for fiscal year 2009. In this context, the term “contribution rate” means the percentage, which is applied to a particular active member payroll to determine the actual employer contribution amount (i.e., in dollars) for the group.

As of December 31, 2007, the valuation assets were greater than the actuarial liability so a surplus exists. State statutes permit any surplus in municipal police and fire retirement systems to be amortized over a rolling 20 year period. The Board has elected to use the rolling 20 year amortization period as part of their funding policy. The amortization of the surplus results in an employer contribution that is less than the normal cost rate.

Contribution Rate Summary

In Table 6, the amortization payment related to the unfunded actuarial liability/(surplus), as of December 31, 2007, is developed. Table 7 develops the normal cost rate for the System. The derivation of the range of contribution rates for the City is shown in Table 8. Table 9 shows the historical summary of the City's contribution rates. Table 10 develops the experience gain/(loss) for the year ended December 31, 2007.

The rates shown in this report are based on the actuarial assumptions and cost methods described in Appendix C.

TABLE 6

WICHITA POLICE AND FIRE RETIREMENT SYSTEM

DECEMBER 31, 2007 VALUATION

DERIVATION OF UNFUNDED ACTUARIAL LIABILITY CONTRIBUTION RATE

1. Actuarial Accrued Liability	\$	468,114,640	
2. Actuarial Value of Assets	\$	480,820,001	
3. Unfunded Actuarial Liability/(Surplus)	\$	(12,705,361)	
4. Payment (Adjusted to Mid-Year) to Amortize Unfunded Actuarial Liability/(Surplus) Over 20 Years *	\$	(868,508)	
5. Total Projected Payroll for the Year	\$	59,454,585	
6. Amortization Payment as a Percent of Payroll			(1.5) %

* In accordance with State statutes, unfunded actuarial liability/(surplus) may be amortized over a rolling 20-year period. The Board has elected to use this period.

TABLE 7
WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DECEMBER 31, 2007 VALUATION
DERIVATION OF NORMAL COST RATE

Normal Cost at December 31, 2007		
Service pensions	\$	9,631,526
Disability pensions		3,083,097
Survivor pensions		304,405
Termination benefits		
- Deferred service pensions		615,236
- Return of member contributions		306,658
Total Normal Cost	\$	<u>13,940,922</u>
Normal Cost Adjusted to Mid-Year	\$	14,471,053
Projected Payroll for Members Under Certain Retirement Age	\$	58,877,838 *
Total Normal Cost Rate for Year		24.6%

* Effective with the 12/31/05 valuation, this amount includes payroll for all Plan A members who are past certain retirement age under Plan A assumptions, but not under Plan C assumptions.

TABLE 8

WICHITA POLICE AND FIRE RETIREMENT SYSTEM
EMPLOYER CONTRIBUTION RATES
FOR FISCAL YEAR
COMMENCING IN 2009

	Range of Contribution Requirements as % of Payroll	
Normal Cost		
Service pensions	17.1 %	17.1 %
Disability pensions	5.4 %	5.4 %
Survivor pensions	0.5 %	0.5 %
Termination benefits		
- Deferred service pensions	1.1 %	1.1 %
- Return of member contributions	0.5 %	0.5 %
Total Normal Cost	24.6 %	24.6 %
Unfunded Actuarial Accrued Liability		
Retired members and beneficiaries ⁽¹⁾	0.0 %	0.0 %
Active and former members ⁽²⁾	0.0 %	(1.5) %
Total UAAL Contribution	0.0 %	(1.5) %
Total Contribution Requirement		
Member Financed Portion ⁽³⁾	7.1 %	7.1 %
City Financed Portion	17.5 %	16.0 %
Total	24.6 %	23.1 %

- (1) Actuarial accrued liability for retired members and beneficiaries was fully funded as of December 31, 2007.
- (2) The excess of the actuarial value of assets over actuarial liability, amortized as a level percent of active member payroll over a rolling 20-year period, produces a temporary amortization credit.
- (3) The weighted average of member contribution rates: 8.0% for Plan A, 6.0% for Plan B, and 7.0% for Plan C.

TABLE 9

WICHITA POLICE AND FIRE RETIREMENT SYSTEM

HISTORICAL SUMMARY OF CITY CONTRIBUTION RATES

Contribution rates are computed in accordance with a level percent of payroll funding objective. As of December 31, 2007, actuarial liabilities are fully covered by valuation assets. The excess is amortized over a rolling 20 year period, resulting in an amortization credit.

Valuation Date	Fiscal Year	City Contributions as Percents of Active Member Pensionable Payroll	
		Funding Objective	Amortization Credit
11/30/90	1992	23.4%	-%
11/30/91	1993	22.9	-
11/30/92	1994	23.3	-
11/30/93	1995	22.7	-
11/30/94	1996	22.6	-
12/31/95	1997	18.3*	-
12/31/96	1998	17.5	-
12/31/97	1999	15.2 – 15.9	(0.7)
12/31/98	2000	12.3 – 15.9	(3.6)
12/31/99**	2001	9.6 – 16.8	(7.2)
12/31/00	2002	8.2 – 16.8	(8.7)
12/31/01	2003	10.0 – 16.8	(6.8)
12/31/02	2004	14.0 – 17.0	(3.0)
12/31/03	2005	13.6 – 17.0	(3.4)
12/31/04#	2006	18.4	-
12/31/05	2007	17.5	-
12/31/06	2008	16.8 – 17.5	(0.7)
12/31/07	2009	16.0 – 17.5	(1.5)

* Reflects allocation of assets to fully fund retired life liabilities.

** Includes benefit provision and assumption changes and 1% decrease in member contribution rate.

Reflects assumption changes and elimination of surplus assets.

TABLE 10

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DERIVATION OF SYSTEM EXPERIENCE GAIN/(LOSS)**

	(\$M) Year Ended <u>12/31/07</u>
(1) UAL* at start of year	(5.3)
(2) + Normal cost for year	13.1
(3) + Assumed investment return on (1) & (2)	0.5
(4) - Actual contributions (member + City)	14.1
(5) - Assumed investment return on (4)	0.5
(6) = Expected UAL at end of year	(6.3)
(7) + Increase (decr.) from amendments	0.0
(8) + Increase (decr.) from procedure changes	2.5
(9) = Expected UAL after changes	(3.8)
(10) = Actual UAL at year end	(12.7)
(11) = Experience gain (loss) (9) – (10)	8.9**
(12) = Percent of beginning of year AL	2.0%

* *Unfunded Actuarial Liability/(Surplus)*

** *This amount reflects the net impact of about \$7.7 million gain on the actuarial value of assets and a \$1.2 million gain on liabilities.*

SECTION 6

ACCOUNTING INFORMATION

The actuarial liability is a measure intended to help the reader assess (i) a retirement system's funded status on a going concern basis, and (ii) progress being made toward accumulating the assets needed to pay benefits as due. Allocation of the actuarial present value of projected benefits between past and future service was based on service using the Entry Age Normal actuarial cost method. Assumptions, including projected pay increases, were the same as used to determine the System's level percent of payroll annual required contribution between entry age and assumed exit age. Entry age was established by subtracting credited service from current age on the valuation date.

The preceding methods comply with the financial reporting standards established by the Governmental Accounting Standards Board.

The Entry Age Normal actuarial liability was determined as part of an actuarial valuation of the plan as of December 31, 2007. Significant actuarial assumptions used in determining the actuarial liability include:

- (a) a rate of return on the investment of present and future assets of 7.75% per year compounded annually,
- (b) projected salary increases of 4.50% per year compounded annually, (4.00% attributable to inflation, and 0.50% attributable to productivity),
- (c) additional projected salary increases of 0.0% to 2.5% per year attributable to seniority/merit, and
- (d) the assumption that benefits will increase 2.0% per year of retirement, non-compounded commencing 36 months after retirement.

Actuarial Liability:

Active members	\$ 237,221,214
Retired members and beneficiaries currently receiving benefits	221,397,067
Vested terminated members not yet receiving benefits	<u>9,496,359</u>
Total Actuarial Liability	\$ 468,114,640
Actuarial Value of Assets (market value was \$503,915,248)	\$ 480,820,001
Assets in Excess of Actuarial Liability	\$ (12,705,361)

During the year ended December 31, 2007, the Plan experienced a net increase of \$28.9 million in the actuarial liability.

TABLE 11

WICHITA POLICE AND FIRE RETIREMENT SYSTEM

**REQUIRED SUPPLEMENTARY INFORMATION
SCHEDULE OF FUNDING PROGRESS**

Actuarial Valuation Date	Actuarial Value of Assets (a)	Actuarial Liability (AL) (b)	Unfunded AL (b)-(a)	Funded Ratio (a)/(b)	Active Member Covered Payroll (c)	Unfunded AL as a Percentage of Active Member Covered Payroll ((b-a)/c)
11/30/90*	\$136,766	\$173,071	\$ 36,305	79.0%	\$ 22,408	162.0%
11/30/91	152,162	183,423	31,261	83.0	23,675	132.0
11/30/92	165,132	198,656	33,524	83.1	25,000	134.1
11/30/93	180,457	208,966	28,509	86.4	26,008	109.6
11/30/94	192,668	220,596	27,928	87.3	27,819	100.4
12/31/95*	213,431	231,372	17,941	92.2	29,749	60.3
12/31/96	237,554	247,408	9,854	96.0	33,366	29.5
12/31/97	262,815	258,706	(4,109)	101.6	35,502	(11.6)
12/31/98	295,625	274,900	(20,725)	107.5	36,566	(56.7)
12/31/99*	330,072	291,633	(38,439)	113.2	37,969	(101.2)
12/31/00	354,044	308,894	(45,150)	114.6	38,613	(116.9)
12/31/01	362,493	325,335	(37,158)	111.4	42,286	(87.9)
12/31/02	361,687	340,524	(21,163)	106.2	45,696	(46.3)
12/31/03	374,171	350,444	(23,726)	106.8	45,876	(51.7)
12/31/04*	392,485	393,387	902	99.8	50,414	1.8
12/31/05	412,823	414,027	1,204	99.7	52,207	2.3
12/31/06	444,498	439,179	(5,319)	101.2	53,530	(9.9)
12/31/07	480,820	468,115	(12,705)	102.7	57,310	(22.2)

Dollar amounts are in thousands.

**After changes in benefits and/or actuarial assumptions and/or actuarial cost methods.*

Analysis of the dollar amounts of actuarial value of assets, actuarial liability, or unfunded actuarial liability in isolation can be misleading. Expressing the actuarial value of assets as a percentage of the actuarial liability provides one indication of the System's funded status on a going-concern basis. Analysis of this percentage over time indicates whether the System is becoming financially stronger or weaker. Generally, the greater this percentage, the stronger the plan's funding. The unfunded actuarial liability and annual covered payroll are both affected by inflation. Expressing the unfunded actuarial liability as a percentage of covered payroll approximately adjusts for the effects of inflation and aids analysis of the progress being made in accumulating sufficient assets to pay benefits when due. Generally, the smaller this percentage, the stronger the plan's funding.

TABLE 12

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
REQUIRED SUPPLEMENTARY INFORMATION
SCHEDULE OF EMPLOYER CONTRIBUTIONS**

Fiscal Year	Actuarial Valuation Date	Annual Required Contribution	Percent Contribution
1995	11/30/93	\$7,391,786	100.0%
1996	11/30/94	7,186,932	100.0
1997	12/31/95	6,343,027	100.0
1998	12/31/96	6,427,744	100.0
1999	12/31/97	6,043,455	100.0
2000	12/31/98	5,540,575	100.0
2001	12/31/99	4,796,863	100.0
2002	12/31/00	4,746,504	100.0
2003	12/31/01	5,043,505	100.0
2004	12/31/02	6,925,467	100.0
2005	12/31/03	7,308,916	100.0
2006	12/31/04	9,849,536	100.0
2007	12/31/05	10,029,253	100.0

**Notes to Required Supplementary Information
Summary of Actuarial Methods and Assumptions**

Valuation Date	December 31, 2007
Actuarial Cost Method	Entry Age Normal
Amortization Method	Level percent of payroll, open
Remaining Amortization Period	20 years
Asset Valuation Method	Expected Value + 25% of (Market – Expected Values)
Actuarial Assumptions:	
Investment Rate of Return*	7.75%
Projected Salary Increases*	4.50% - 7.00%
* Includes Inflation of	4.00%
Cost-of-Living Adjustments	2.00% non-compounding commencing 36 months after retirement

TABLE 13
WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SOLVENCY TEST

<u>Aggregate Actuarial Liability For</u>							
Valuation Date	(1) Active Member Contributions	(2) Retirants and Beneficiaries*	(3) Active Members (Employer Financed Portion)	Reported Valuation Assets	Portion of Actuarial Liabilities Covered by Reported Assets		
					(1)	(2)	(3)
11/30/93	\$17,293,762	\$120,075,516	\$71,956,393	\$180,457,134	100.0%	100.0%	59.9%
11/30/94	18,003,627	127,670,273	74,921,662	192,667,974	100.0	100.0	62.7
12/31/95	19,597,012	132,215,980	79,559,050	213,431,416	100.0	100.0	77.4
12/31/96	20,807,624	141,902,560	84,497,686	237,553,602	100.0	100.0	88.6
12/31/97	22,518,199	146,068,362	90,119,236	262,814,796	100.0	100.0	104.6
12/31/98	23,845,658	157,021,415	94,033,095	295,624,986	100.0	100.0	122.0
12/31/99	24,759,118	170,478,501	96,395,412	330,071,866	100.0	100.0	139.9
12/31/00	27,152,206	183,463,718	98,277,967	354,044,311	100.0	100.0	145.9
12/31/01	27,694,761	183,034,623	114,605,637	362,493,060	100.0	100.0	132.4
12/31/02	34,440,696	182,063,498	124,019,921	361,687,109	100.0	100.0	117.1
12/31/03	37,027,041	186,930,565	126,486,746	374,170,781	100.0	100.0	118.8
12/31/04	40,959,525	201,051,248	151,375,876	392,484,697	100.0	100.0	99.4
12/31/05	44,057,922	210,560,068	159,408,592	412,822,760	100.0	100.0	99.2
12/31/06	48,361,719	216,449,174	174,368,239	444,497,827	100.0	100.0	103.1
12/31/07	53,686,866	230,893,426	183,534,348	480,820,001	100.0	100.0	106.9

During the twelve months ended December 31, 2007, the Wichita Police and Fire Retirement System of Wichita, Kansas generated a net experience gain of \$8.9 million dollars. The amount is 2.0% of the actuarial liability at the beginning of the year.

**Includes vested terminated members*

APPENDIX A

SUMMARY OF MEMBERSHIP DATA

MEMBER DATA RECONCILIATION

December 31, 2006 to December 31, 2007

The number of members included in the valuation, as summarized in the table below, is in accordance with the data submitted by the System for members as of the valuation date.

	Active Participants		Retirees & Beneficiaries		Terminated Vested		Total
	Police	Fire	Police	Fire	Police	Fire	
Members as of 12/31/06	638	443	411	429	20	15	1,956
New Members	+23	+22	+7*	+4	0	0	+56
Transfers	+1	0	0	0	0	0	+1
Terminations							
Refunded	-17	-8	0	0	-1	0	-26
Deferred Vested	-5	0	-1**	0	+6	0	0
Completion of payments to minor child	0	0	0	0	0	0	0
Retirements							
Service	0	-5	+1	+9	-1	-4	0
Disability	0	0	+0	+0	0	0	0
Deaths							
Cashed Out	0	0	0	0	0	0	0
With Beneficiary	0	0	-6	-4	0	0	-10
Without Beneficiary	0	0	-9	-8	0	0	-17
Data Adjustments	0	0	0	0	0	0	0
Members as of 12/31/07	640	452	403	430	24	11	1,960

*Includes an alternate payee.

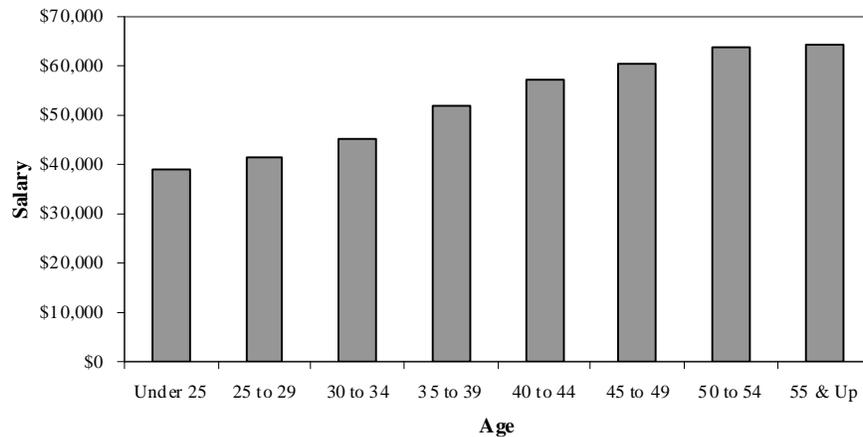
**Member had been receiving disability benefits, but was determined to no longer be eligible.

APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF ACTIVE MEMBERS
as of December 31, 2007**

Age	Number			Valuation Salaries		
	Fire	Police	Total	Fire	Police	Total
Under 25	13	12	25	\$ 488,112	\$ 491,460	\$ 979,572
25 to 29	59	75	134	2,297,966	3,221,675	5,519,641
30 to 34	59	117	176	2,503,875	5,491,266	7,995,141
35 to 39	68	167	235	3,279,892	8,898,914	12,178,806
40 to 44	74	121	195	3,996,665	7,160,467	11,157,132
45 to 49	80	85	165	4,574,461	5,420,001	9,994,462
50 to 54	66	44	110	4,011,375	2,977,670	6,989,045
55 & Up	33	19	52	2,148,810	1,197,767	3,346,577
Total	452	640	1,092	\$ 23,301,156	\$ 34,859,220	\$ 58,160,376

Average Salary by Age



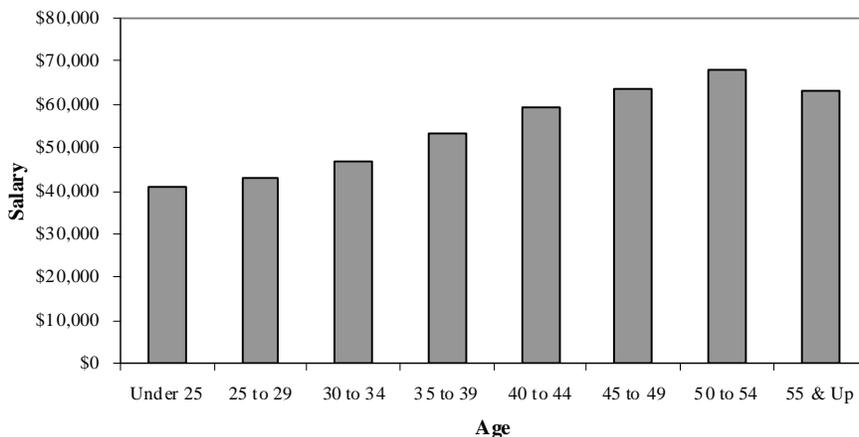
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF ACTIVE MEMBERS
as of December 31, 2007**

Police

Age	Number			Valuation Salaries		
	Male	Female	Total	Male	Female	Total
Under 25	12	0	12	\$ 491,460	\$ -	\$ 491,460
25 to 29	61	14	75	2,623,880	597,795	3,221,675
30 to 34	94	23	117	4,424,604	1,066,662	5,491,266
35 to 39	146	21	167	7,833,909	1,065,005	8,898,914
40 to 44	116	5	121	6,861,546	298,921	7,160,467
45 to 49	80	5	85	5,069,138	350,863	5,420,001
50 to 54	39	5	44	2,656,199	321,471	2,977,670
55 & Up	19	0	19	1,197,767	-	1,197,767
Total	567	73	640	\$ 31,158,503	\$ 3,700,717	\$ 34,859,220

Average Salary by Age



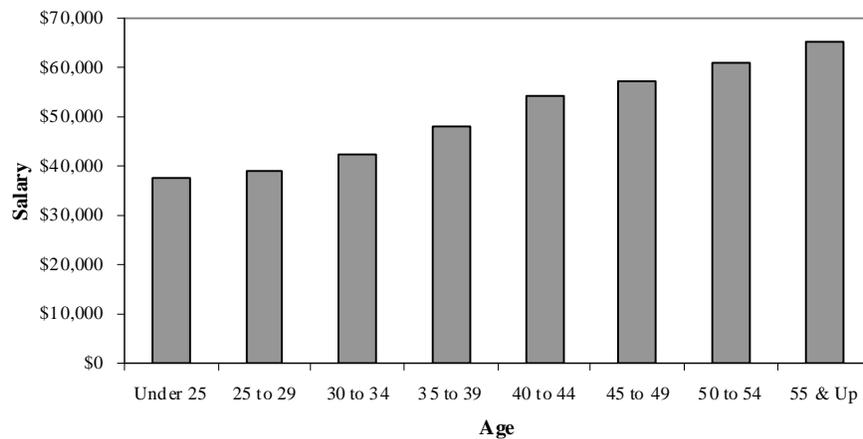
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF ACTIVE MEMBERS
as of December 31, 2007**

Fire

Age	Number			Valuation Salaries		
	Male	Female	Total	Male	Female	Total
Under 25	13	0	13	\$ 488,112	\$ -	\$ 488,112
25 to 29	57	2	59	2,222,730	75,236	2,297,966
30 to 34	58	1	59	2,461,839	42,036	2,503,875
35 to 39	68	0	68	3,279,892	-	3,279,892
40 to 44	71	3	74	3,833,650	163,015	3,996,665
45 to 49	80	0	80	4,574,461	-	4,574,461
50 to 54	65	1	66	3,947,044	64,331	4,011,375
55 & Up	33	0	33	2,148,810	-	2,148,810
Total	445	7	452	\$ 22,956,538	\$ 344,618	\$ 23,301,156

Average Salary by Age



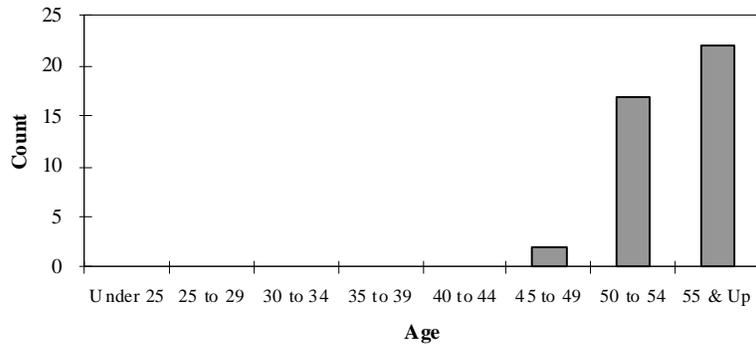
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

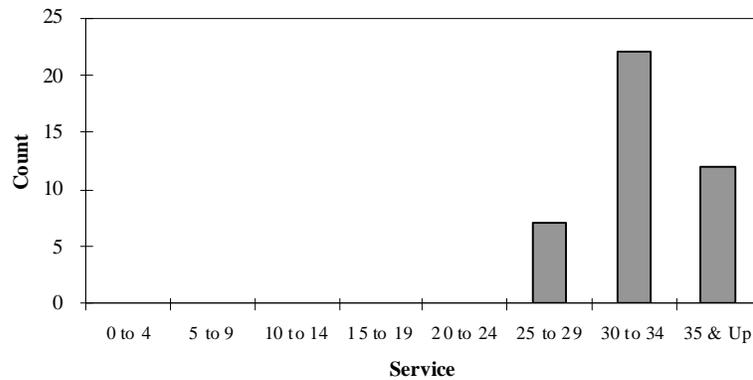
Fire - Plans A & B

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	0	0	0	0	0	0	0	0	0
25 to 29	0	0	0	0	0	0	0	0	0
30 to 34	0	0	0	0	0	0	0	0	0
35 to 39	0	0	0	0	0	0	0	0	0
40 to 44	0	0	0	0	0	0	0	0	0
45 to 49	0	0	0	0	0	2	0	0	2
50 to 54	0	0	0	0	0	5	12	0	17
55 & Up	0	0	0	0	0	0	10	12	22
Total	0	0	0	0	0	7	22	12	41

Age Distribution



Service Distribution



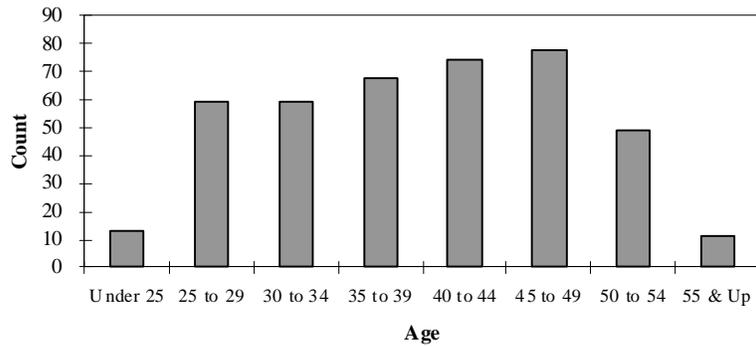
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

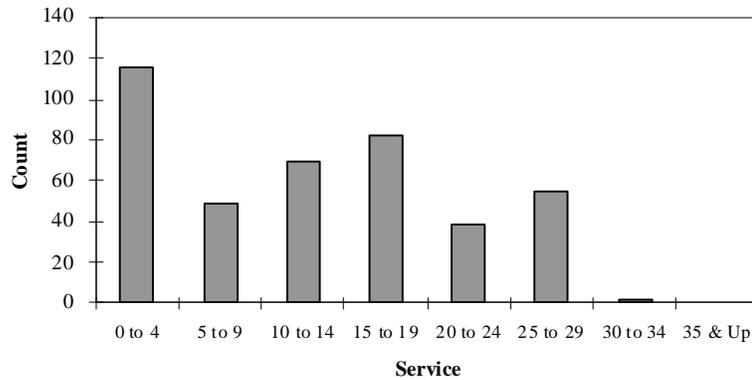
Fire - Plan C

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	13	0	0	0	0	0	0	0	13
25 to 29	53	6	0	0	0	0	0	0	59
30 to 34	29	23	7	0	0	0	0	0	59
35 to 39	15	13	30	10	0	0	0	0	68
40 to 44	2	6	24	30	12	0	0	0	74
45 to 49	3	1	8	28	15	23	0	0	78
50 to 54	0	0	1	13	9	26	0	0	49
55 & Up	1	0	0	1	2	5	2	0	11
Total	116	49	70	82	38	54	2	0	411

Age Distribution



Service Distribution



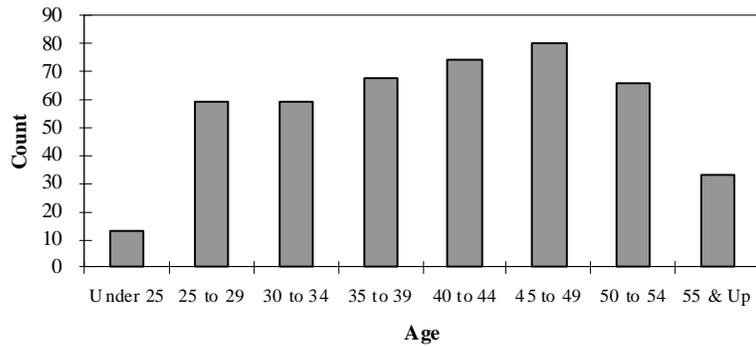
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

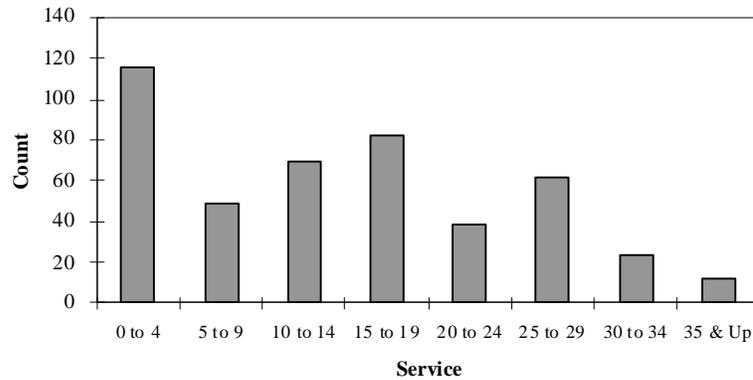
Fire

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	13	0	0	0	0	0	0	0	13
25 to 29	53	6	0	0	0	0	0	0	59
30 to 34	29	23	7	0	0	0	0	0	59
35 to 39	15	13	30	10	0	0	0	0	68
40 to 44	2	6	24	30	12	0	0	0	74
45 to 49	3	1	8	28	15	25	0	0	80
50 to 54	0	0	1	13	9	31	12	0	66
55 & Up	1	0	0	1	2	5	12	12	33
Total	116	49	70	82	38	61	24	12	452

Age Distribution



Service Distribution



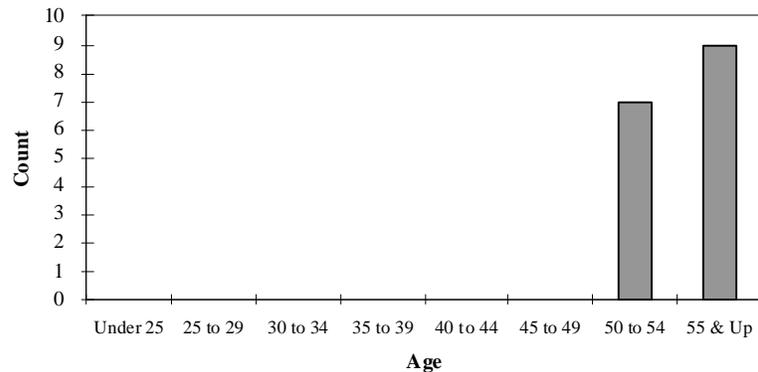
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

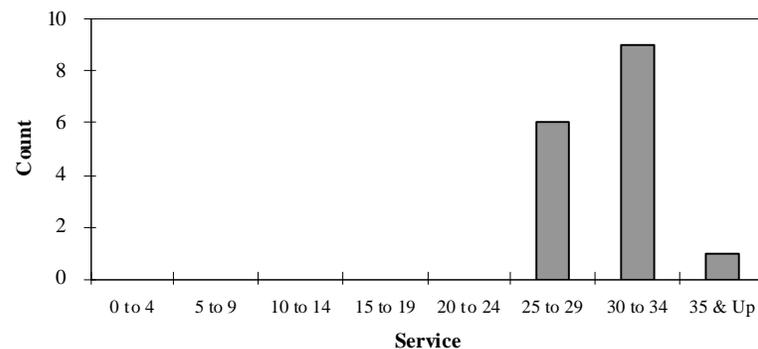
Police - Plans A & B

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	0	0	0	0	0	0	0	0	0
25 to 29	0	0	0	0	0	0	0	0	0
30 to 34	0	0	0	0	0	0	0	0	0
35 to 39	0	0	0	0	0	0	0	0	0
40 to 44	0	0	0	0	0	0	0	0	0
45 to 49	0	0	0	0	0	0	0	0	0
50 to 54	0	0	0	0	0	4	3	0	7
55 & Up	0	0	0	0	0	2	6	1	9
Total	0	0	0	0	0	6	9	1	16

Age Distribution



Service Distribution



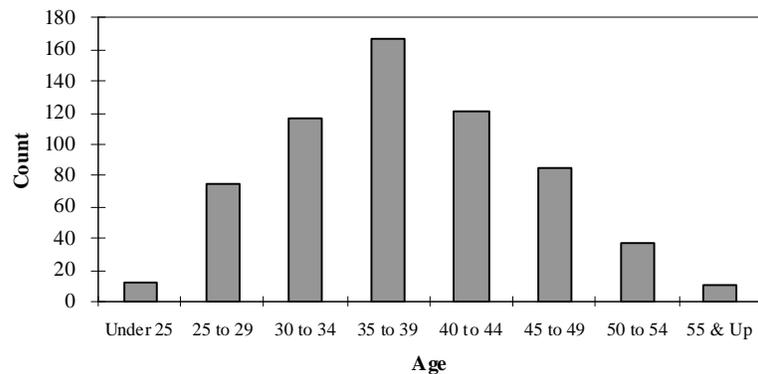
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

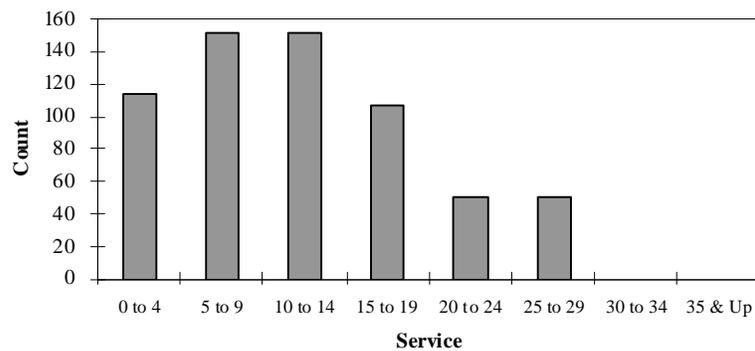
Police - Plan C

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	12	0	0	0	0	0	0	0	12
25 to 29	56	19	0	0	0	0	0	0	75
30 to 34	28	69	20	0	0	0	0	0	117
35 to 39	11	52	82	22	0	0	0	0	167
40 to 44	4	7	39	57	14	0	0	0	121
45 to 49	3	2	9	21	27	23	0	0	85
50 to 54	0	1	1	5	7	23	0	0	37
55 & Up	0	1	1	2	2	4	0	0	10
Total	114	151	152	107	50	50	0	0	624

Age Distribution



Service Distribution



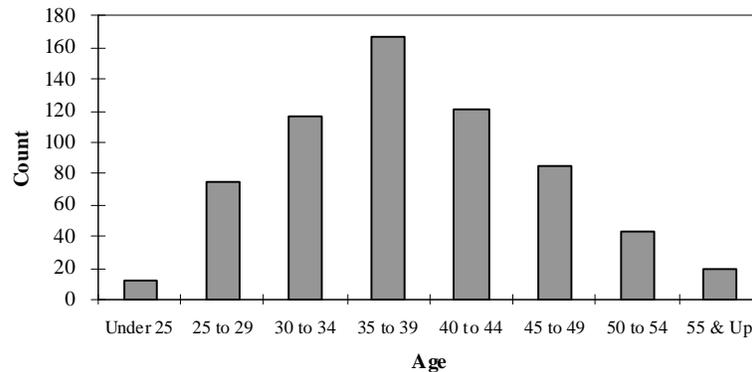
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

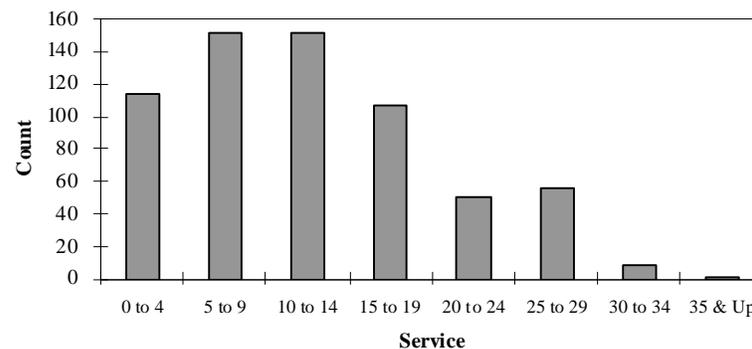
Police

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	12	0	0	0	0	0	0	0	12
25 to 29	56	19	0	0	0	0	0	0	75
30 to 34	28	69	20	0	0	0	0	0	117
35 to 39	11	52	82	22	0	0	0	0	167
40 to 44	4	7	39	57	14	0	0	0	121
45 to 49	3	2	9	21	27	23	0	0	85
50 to 54	0	1	1	5	7	27	3	0	44
55 & Up	0	1	1	2	2	6	6	1	19
Total	114	151	152	107	50	56	9	1	640

Age Distribution



Service Distribution



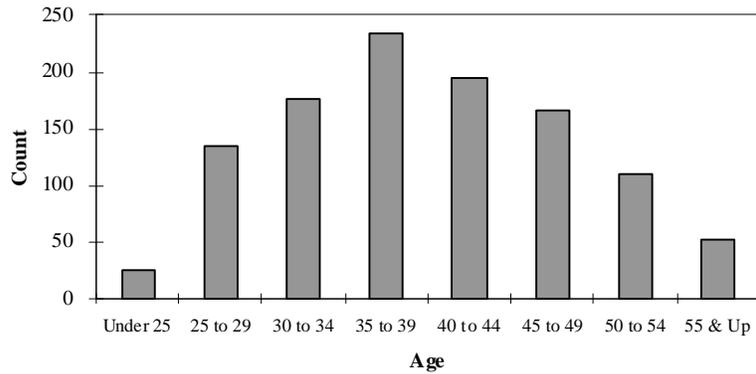
APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
DISTRIBUTION OF ACTIVE MEMBERS
as of December 31, 2007**

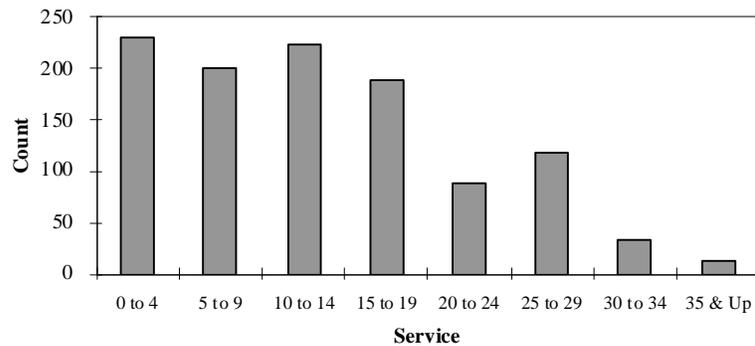
Fire & Police

Age	Years of Service								Total
	0 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 & Up	
Under 25	25	0	0	0	0	0	0	0	25
25 to 29	109	25	0	0	0	0	0	0	134
30 to 34	57	92	27	0	0	0	0	0	176
35 to 39	26	65	112	32	0	0	0	0	235
40 to 44	6	13	63	87	26	0	0	0	195
45 to 49	6	3	17	49	42	48	0	0	165
50 to 54	0	1	2	18	16	58	15	0	110
55 & Up	1	1	1	3	4	11	18	13	52
Total	230	200	222	189	88	117	33	13	1,092

Age Distribution



Service Distribution



APPENDIX A (continued)

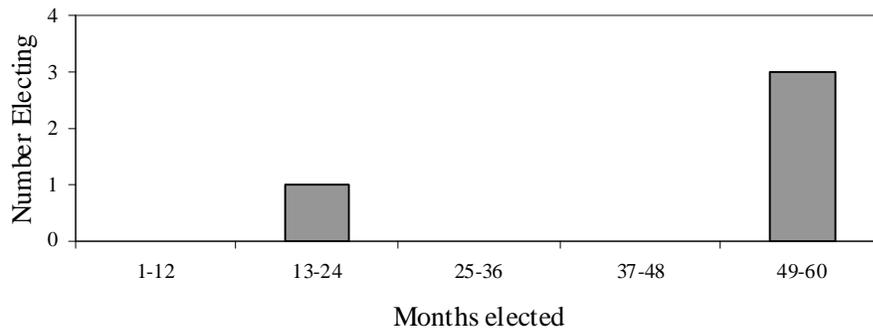
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
BackDROP Experience for the 2007 Plan Year**

Fire

Number Electing BackDROP

Age	Final Benefit as a Proportion of Final Average Pay					Total
	50%-55%	55%-60%	60%-65%	65%-70%	70%-75%	
Under 55	0	0	0	0	0	0
55-59	0	0	1	0	2	3
60-64	0	0	0	0	0	0
65+	0	0	0	0	1	1
Total	0	0	1	0	3	4

Distribution of BackDROP Election Period



APPENDIX A (continued)

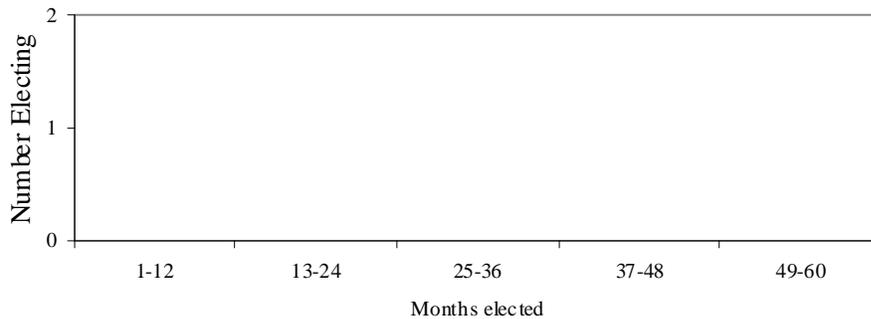
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
BackDROP Experience for the 2007 Plan Year**

Police

Number Electing BackDROP

Age	Final Benefit as a Proportion of Final Average Pay					Total
	50%-55%	55%-60%	60%-65%	65%-70%	70%-75%	
Under 55	0	0	0	0	0	0
55-59	0	0	0	0	0	0
60-64	0	0	0	0	0	0
65+	0	0	0	0	0	0
Total	0	0	0	0	0	0

Distribution of BackDROP Election Period



APPENDIX A (continued)

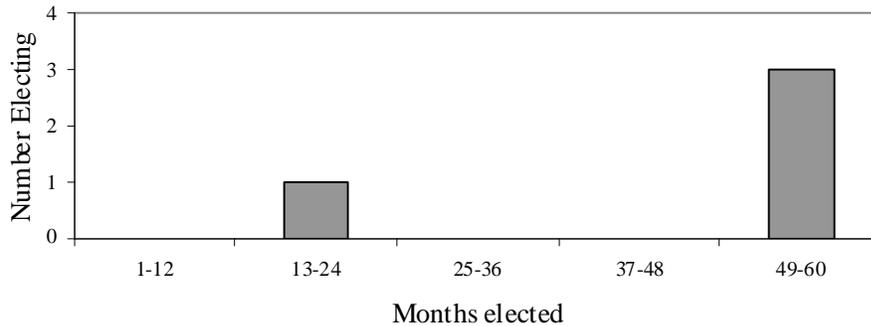
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
BackDROP Experience for the 2007 Plan Year**

Fire & Police

Number Electing BackDROP

Age	Final Benefit as a Proportion of Final Average Pay					Total
	50%-55%	55%-60%	60%-65%	65%-70%	70%-75%	
Under 55	0	0	0	0	0	0
55-59	0	0	1	0	2	3
60-64	0	0	0	0	0	0
65+	0	0	0	0	1	1
Total	0	0	1	0	3	4

Distribution of BackDROP Election Period

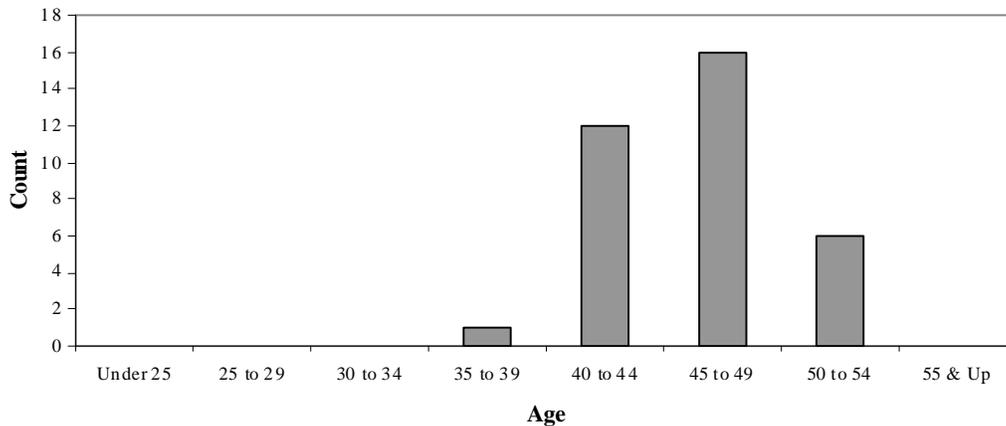


APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF DEFERRED VESTED MEMBERS
as of December 31, 2007**

Age	Number			Current Monthly Benefit at Retirement		
	Fire	Police	Total	Fire	Police	Total
Under 25	0	0	0	\$ -	\$ -	\$ -
25 to 29	0	0	0	-	-	-
30 to 34	0	0	0	-	-	-
35 to 39	1	0	1	1,101	-	1,101
40 to 44	3	9	12	4,282	15,713	19,994
45 to 49	3	13	16	6,488	34,305	40,793
50 to 54	4	2	6	6,062	2,104	8,166
55 & Up	0	0	0	-	-	-
Total	11	24	35	\$ 17,932	\$ 52,122	\$ 70,054

Age Distribution

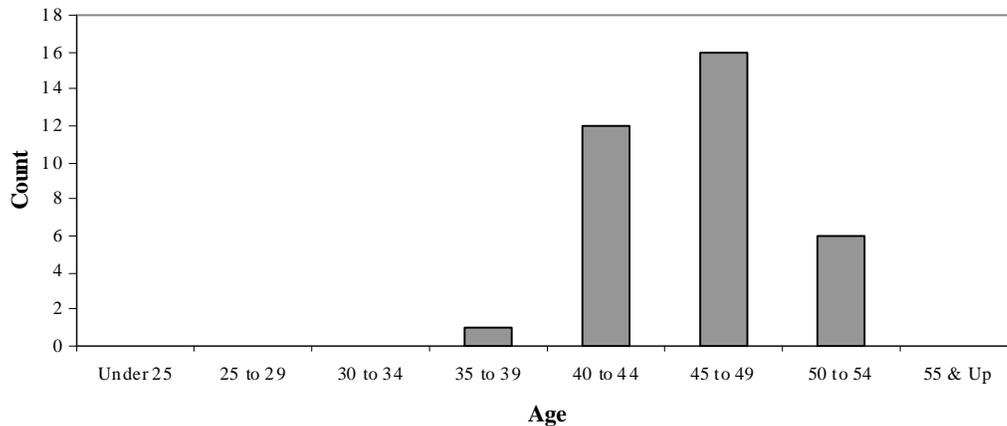


APPENDIX A (continued)

**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF DEFERRED VESTED MEMBERS
as of December 31, 2007**

Age	Number			Current Monthly Benefit at Retirement		
	Male	Female	Total	Male	Female	Total
Under 25	0	0	0	\$ -	\$ -	\$ -
25 to 29	0	0	0	-	-	-
30 to 34	0	0	0	-	-	-
35 to 39	1	0	1	1,101	-	1,101
40 to 44	12	0	12	19,994	-	19,994
45 to 49	15	1	16	37,770	3,023	40,793
50 to 54	5	1	6	7,099	1,067	8,166
55 & Up	0	0	0	-	-	-
Total	33	2	35	\$ 65,964	\$ 4,090	\$ 70,054

Age Distribution

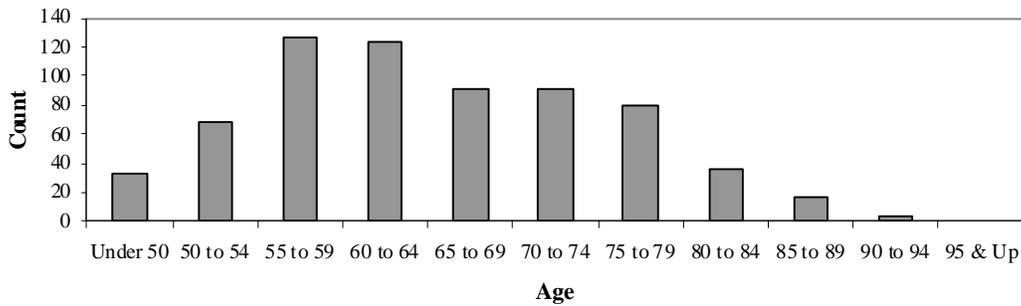


APPENDIX A (continued)

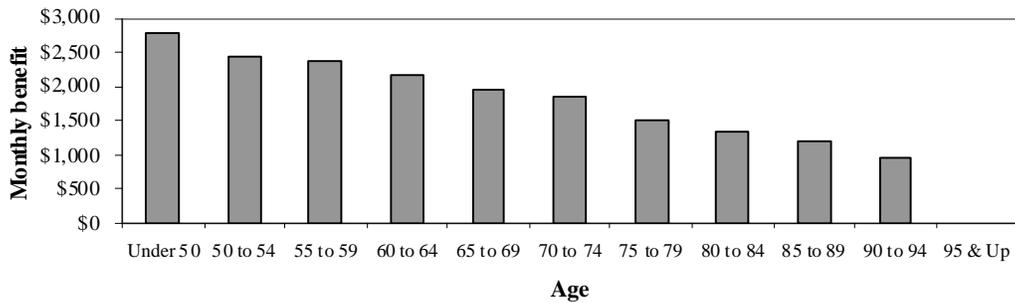
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF RETIRED MEMBERS
as of December 31, 2007**

Age	Number			Monthly Benefit		
	Fire	Police	Total	Fire	Police	Total
Under 50	11	22	33	\$ 28,979	\$ 62,534	\$ 91,513
50 to 54	27	42	69	65,376	102,268	167,644
55 to 59	73	53	126	174,144	125,944	300,088
60 to 64	54	69	123	123,303	142,507	265,810
65 to 69	51	40	91	98,619	80,294	178,913
70 to 74	51	40	91	100,325	67,433	167,759
75 to 79	43	37	80	64,007	57,803	121,811
80 to 84	22	14	36	31,564	16,473	48,037
85 to 89	5	12	17	4,408	16,248	20,656
90 to 94	1	2	3	791	2,076	2,867
95 & Up	0	0	0	-	-	-
Total	338	331	669	\$ 691,516	\$ 673,581	\$ 1,365,097

Age Distribution



Average Benefit

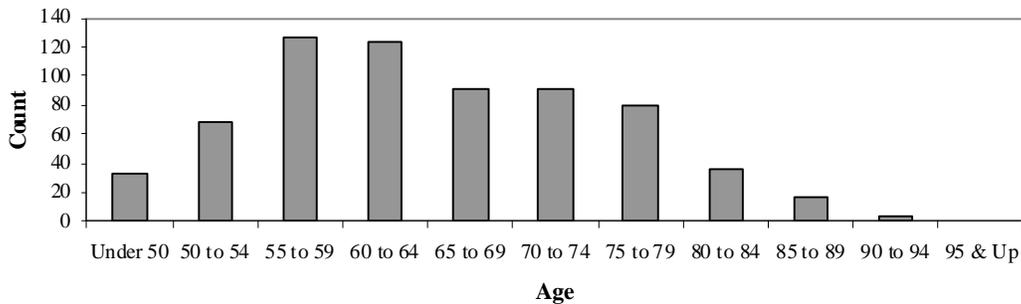


APPENDIX A (continued)

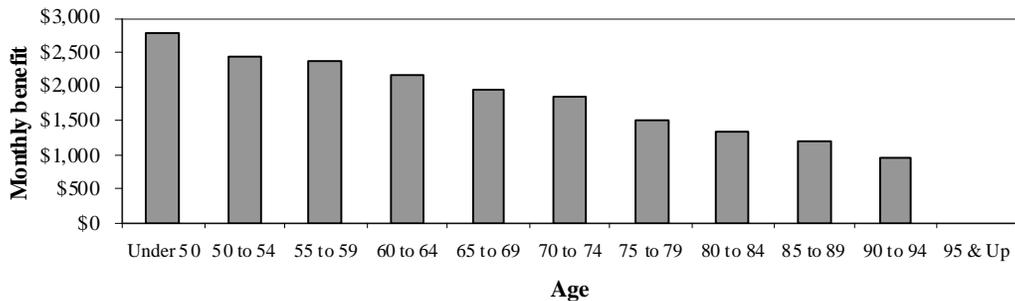
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF RETIRED MEMBERS
as of December 31, 2007**

Age	Number			Monthly Benefit		
	Male	Female	Total	Male	Female	Total
Under 50	28	5	33	\$ 78,390	\$ 13,123	\$ 91,513
50 to 54	68	1	69	165,122	2,522	167,644
55 to 59	125	1	126	298,193	1,895	300,088
60 to 64	120	3	123	260,565	5,244	265,810
65 to 69	89	2	91	175,653	3,260	178,913
70 to 74	89	2	91	164,960	2,798	167,759
75 to 79	78	2	80	118,554	3,256	121,811
80 to 84	36	0	36	48,037	-	48,037
85 to 89	15	2	17	19,074	1,582	20,656
90 to 94	3	0	3	2,867	-	2,867
95 & Up	0	0	0	-	-	-
Total	651	18	669	\$ 1,331,416	\$ 33,682	\$ 1,365,097

Age Distribution



Average Benefit

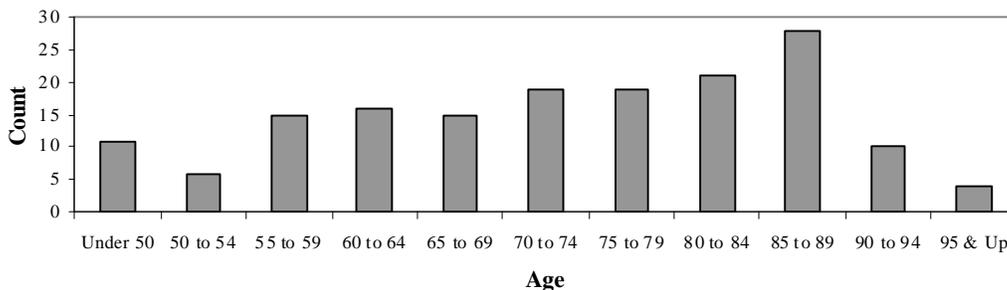


APPENDIX A (continued)

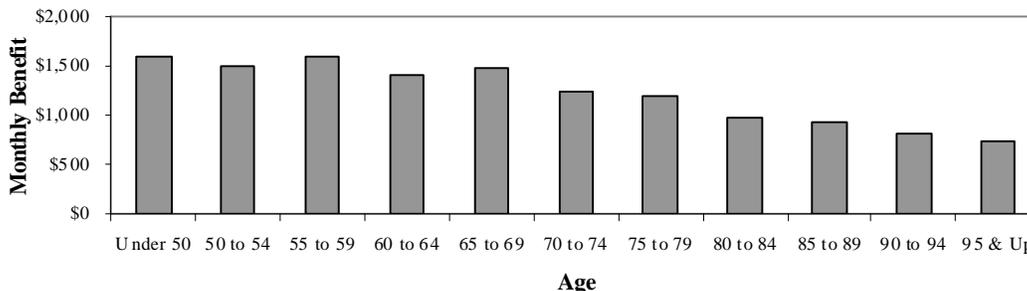
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF BENEFICIARIES
as of December 31, 2007**

Age	Number			Monthly Benefit		
	Fire	Police	Total	Fire	Police	Total
Under 50	5	6	11	\$ 10,995	\$ 6,520	\$ 17,515
50 to 54	2	4	6	2,718	6,269	8,988
55 to 59	10	5	15	14,748	9,205	23,953
60 to 64	4	12	16	4,829	17,680	22,508
65 to 69	7	8	15	10,288	11,864	22,153
70 to 74	10	9	19	13,264	10,337	23,600
75 to 79	8	11	19	9,786	13,013	22,799
80 to 84	18	3	21	17,345	3,264	20,609
85 to 89	21	7	28	20,173	6,262	26,434
90 to 94	4	6	10	3,307	4,828	8,135
95 & Up	3	1	4	2,206	791	2,997
Total	92	72	164	\$ 109,659	\$ 90,032	\$ 199,691

Age Distribution



Average Benefit

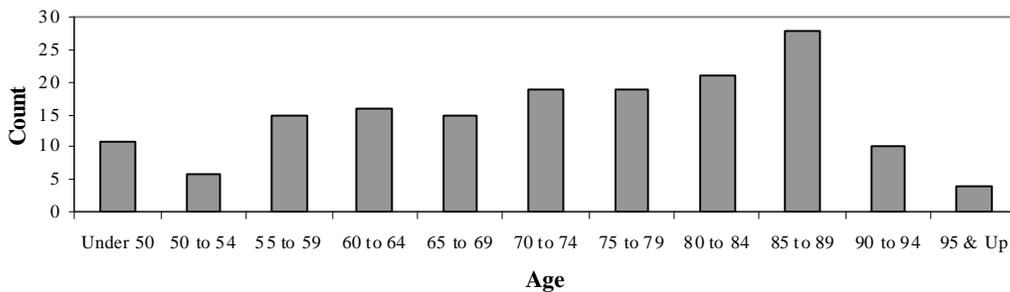


APPENDIX A (continued)

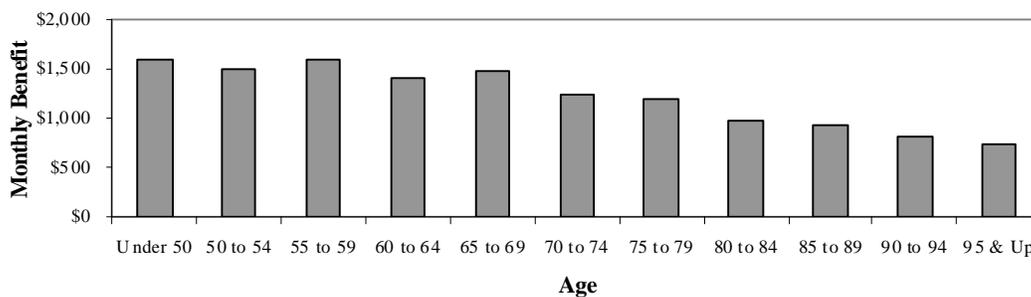
**WICHITA POLICE AND FIRE RETIREMENT SYSTEM
SUMMARY OF BENEFICIARIES
as of December 31, 2007**

Age	Number			Monthly Benefit		
	Male	Female	Total	Male	Female	Total
Under 50	2	9	11	\$ 835	\$ 16,681	\$ 17,515
50 to 54	0	6	6	-	8,988	8,988
55 to 59	0	15	15	-	23,953	23,953
60 to 64	1	15	16	2,043	20,465	22,508
65 to 69	0	15	15	-	22,153	22,153
70 to 74	0	19	19	-	23,600	23,600
75 to 79	0	19	19	-	22,799	22,799
80 to 84	0	21	21	-	20,609	20,609
85 to 89	0	28	28	-	26,434	26,434
90 to 94	0	10	10	-	8,135	8,135
95 & Up	0	4	4	-	2,997	2,997
Total	3	161	164	\$ 2,878	\$ 196,814	\$ 199,691

Age Distribution



Average Benefit



APPENDIX B

SUMMARY OF BENEFIT PROVISIONS (DECEMBER 31, 2007)

Plan A is applicable to members who entered the System between January 1, 1965 and December 31, 1978 and members who entered prior to January 1, 1965 and elected Plan A coverage.

Plan B is applicable to members who entered the System prior to January 1, 1965 and elected Plan B coverage.

Plan C is applicable to members entering the System after December 31, 1978.

Service Retirement

Eligibility – Plan A and Plan B: 20 years of service, without regard to age.

Eligibility – Plan C: 30 years of service, without regard to age; or 20 years of service and attainment of age 50 years; or, if 10 or more years of service but less than 20, age 55.

Amount of Pension – all plans: Service times 2.5% of Final Average Salary to a maximum of 75% of Final Average Salary. 2.5% (rather than 2.0%) applies to credit for unused sick leave hours effective in 2000.

Final Average Salary – all plans: average for the 3 consecutive years of service which produce the highest average and which are within the last 10 years of service.

Deferred Retirement (Vested Termination)

Eligibility – all plans: 10 years of service (does not include survivor benefits if service is less than 20 years).

Amount of Pension – all plans: 2.5% of final average salary times years of service with payment deferred until age 55 (age 50 for Plan C members with 20 or more years of service). Vested deferred pensions for Plan C are adjusted during the deferral period based on changes in National Average Earnings, up to 5.5% annual adjustments (effective for post-1999 terminations).

Service-Connected Disability

Eligibility – all plans: permanent inability to perform the duties of position; no service retirement.

Amount of Pension – all plans: 75% of final salary rate if accident, 50% if disease.

Miscellaneous Conditions – all plans: pension plus earnings from gainful employment cannot exceed current salary for rank held at time of disability. Pension recomputed at age 55 using service retirement formula, updated final average salary and service credit for period of disability.

APPENDIX B (continued)

Non-Service Disability

Eligibility – all plans: permanent inability to perform duties of position; requires 7 years of service if under age 55 years.

Amount of Pension – all plans: 30% of Final Average Salary plus 1% of Final Average Salary times service over 7 years; maximum is 50% of Final Average Salary.

Miscellaneous Conditions – all plans: pension plus earnings from gainful employment cannot exceed current salary for rank held at time of disability.

Service-Connected Death

Eligibility – all plans: death resulting from performance of duty as a Fireman or Policeman; no service requirement.

Amount of Pension – all plans: surviving spouse – 50% of final salary plus 10% of final salary for each child under age 18 years to a maximum of 75% of final salary; terminates upon remarriage prior to age 40 years for pensions effective prior to January 1, 2000.

Children (no surviving spouse's pension payable) – 20% of final salary for each child under age 18 to a maximum of 60% of final salary.

Non-Service Death

Eligibility – Plan A and Plan C: death after 3 years of service.

Eligibility – Plan B: death after 20 years of service.

Amount of Pension – Plan A and Plan C: surviving spouse – 35% of Final Average Salary plus 1% of Final Average Salary times Service over 3 years to a maximum of 50% of Final Average Salary, plus 10% of Final Average Salary for each child under age 18 to an overall maximum of 66 $\frac{2}{3}$ % of Final Average Salary, payable immediately. Terminates upon remarriage prior to age 40 years for pensions effective prior to January 1, 2000.

Children (no surviving spouse's pension payable) – 15% of Final Average Salary for each child under age 18 years to a maximum of 50% of Final Average Salary.

Amount of Pension – Plan B: surviving spouse – 50% of final salary.

Children (no surviving spouse's pension payable) – children under age 18 share equally a benefit of 50% of final salary.

APPENDIX B (continued)

Death After Retirement

Eligibility – all plans: surviving spouse – must have been married to retired employee for one year or more at time of death, if retired after January 1, 2000. Member must have retired with at least 20 years of service.

Amount of Pension – Plan A and Plan C: surviving spouse – 35% of Final Average Salary plus 1% of Final Average Salary times Service over 3 years to a maximum of 50% of Final Average Salary, plus 10% of Final Average Salary for each child under age 18 to an overall maximum of 66 $\frac{2}{3}$ % of Final Average Salary, payable immediately. Post-retirement adjustments are granted from date of retirement to date of death. Terminates upon remarriage prior to age 40 years for those retiring prior to January 1, 2000.

Children (no surviving spouse's pension payable) – 15% of Final Average Salary for each child under age 18 years to a maximum of 50% of Final Average Salary.

Amount of Pension – Plan B: surviving spouse – 50% of final salary.

Children (no surviving spouse's pension payable) – children under age 18 share equally a benefit of 50% of final salary.

Non-Vested Termination

Eligibility – all plans: termination of employment and no pension is or will become payable.

Amount of Benefit – all plans: refund of member's contributions made after December 31, 1964, plus $\frac{1}{2}$ of contributions made prior to January 1, 1965. Member contributions include 5% annual interest from December 31, 1999.

Funeral Benefit

Eligibility – Plan A and Plan C: death of member who retired after November 21, 1973.

Amount of Benefit – Plan A and Plan C: \$750.

Eligibility – Plan B: death of retired member.

Amount of Benefit – Plan B: \$100 if member retired on or prior to November 21, 1973; \$750 if member retired after November 21, 1973.

APPENDIX B (continued)

Post-Retirement Adjustments of Pensions

Eligibility – all Plans: Completion of 36 months of retirement.

Annual Amount – all Plans: 2% of the base amount of benefit (increases are not compounded).

Back DROP (Deferred Retirement Option Plan)

Eligibility: Member must be eligible to retire under normal age and/or service requirements at the time they elect the Back DROP.

Amount: Under the Back DROP, the member may elect a benefit based on a retirement date up to 60 months prior to the current date. The monthly benefit is computed based on service, final average salary and benefit formula at the selected prior date. The DROP account available to the retiring member is the computed benefit multiplied by the number of months of Back DROP plus applicable post-retirement adjustments and 5% annual interest, compounded monthly. Members are eligible to elect a five-year Back DROP beginning January 1, 2003.

Contributions

Members – Plan A: 8% of salary.

Members – Plan B: 6% of salary.

Members – Plan C: 7% of salary.

These member contribution rates include the 1% decrease effective in 1998 in recognition of the full funding of actuarial liabilities.

City: Actuarially determined amounts sufficient to satisfy K.S.A. 1977 Suppl. 12-5002.

APPENDIX C

ACTUARIAL COST METHOD AND ASSUMPTIONS

Actuarial Cost Method

The actuarial cost method is a procedure for allocating the actuarial present value of pension benefits and expenses to time periods. The method used for the valuation is known as the Entry Age Normal actuarial cost method, and has the following characteristics.

- (i) The annual normal costs for each individual active member are sufficient to accumulate the value of the member's pension at time of retirement.
- (ii) Each annual normal cost is a constant percentage of the member's year-by-year projected covered compensation.
- (iii) Normal costs for Plans A and B (closed plans) were based on Plan C (open plan) assumptions and benefit conditions.

The Entry Age Normal actuarial cost method allocates the actuarial present value of each member's projected benefits on a level basis over the member's assumed pensionable compensation rates between the entry age of the member and the assumed exit ages. By applying the Entry Age Normal cost method in the fashion described in (iii), the ultimate normal cost will remain level as a percent of active member payroll (if actuarial assumptions are realized) as Plan A and Plan B members leave active status and are replaced by members entering Plan C.

The portion of the actuarial present value allocated to the valuation year is called the normal cost. The portion of the actuarial present value not provided for by the actuarial present value of future normal costs is called actuarial liability. Deducting actuarial assets from the actuarial liability determines the unfunded actuarial liability or (surplus). The unfunded actuarial liability/(surplus) is financed as a level percent of member payroll over an open 20 year period.

Actuarial Assumptions

Retirement System contribution requirements and actuarial present values are calculated by applying experience assumptions to the benefit provisions and membership information of the Retirement System, using the actuarial cost method.

The principal areas of risk which require experience assumptions about future activities of the Retirement System are:

- (i) long-term rate of investment return to be generated by the assets of the System
- (ii) patterns of pay increases to members
- (iii) rates of mortality among members, retirants and beneficiaries

APPENDIX C (continued)

- (iv) rates of withdrawal of active members
- (v) rates of disability among active members
- (vi) the age patterns of actual retirements.

In making a valuation, the monetary effect of each assumption is calculated for as long as a present covered person survives - - a period of time which can be as long as a century.

Actual experience of the Retirement System will not coincide exactly with assumed experience. Each valuation provides a complete recalculation of assumed future experience and takes into account all past differences between assumed and actual experiences. The result is a continual series of adjustments (usually small) to the computed contribution rate.

From time-to-time one or more of the assumptions are modified to reflect experience trends (but not random or temporary year-to-year fluctuations). A complete review of the experience assumptions was completed in 2004 and resulted in the use of updated assumptions for subsequent actuarial valuations.

The investment return rate (net of administrative expenses) used for actuarial valuation calculations was 7.75 percent a year, compounded annually. This rate consists of 4.00% in recognition of long term price inflation and a 3.75 percent a year real rate of return over price inflation. This assumption, used to equate the value of payments due at different points in time, was adopted by the Board and was first used for the December 31, 1980 valuation, although the allocation between inflation and real return has changed periodically, most recently in 2004.

Salary increase rates used to project current pays to those upon which a benefit will be based.

Years of Service	Annual Rate of Salary Increase for Sample Ages			
	Inflation	Productivity	Merit & Longevity	Total
1	4.00%	0.50%	2.5%	7.0%
5	4.00%	0.50%	2.5%	7.0%
10	4.00%	0.50%	2.5%	7.0%
15	4.00%	0.50%	2.5%	7.0%
20	4.00%	0.50%	0.0%	4.5%
25	4.00%	0.50%	0.0%	4.5%
30	4.00%	0.50%	0.0%	4.5%

This assumption was first used for the December 31, 2004 valuation.

APPENDIX C (continued)

The salary increase assumptions will produce 4.50 percent annual increases in active member payroll (the inflation rate plus the productivity rate) given a constant active member group size. This is the same payroll growth assumptions used to amortize unfunded actuarial liability.

The real rate of return over assumed wage growth is 3.25% per year.

	Year Ended					5 Year (Average) Compounded Annual Increase
	12-31-07	12-31-06*	12-31-05	12-31-04	12-31-03	
Average pay	5.6%	4.1%	2.3%	5.6%	0.9%	3.7%
Total payroll	6.7%	7.1%	1.0%	9.9%	0.4%	5.0%

* Includes estimated GPA increase of 3% for 2007.

Mortality Table: This assumption is used to measure the probabilities of members dying before retirement and the probabilities of each pension payment being made after retirement.

Healthy Retirees and Beneficiaries: RP-2000 Healthy Annuitant Table for Males and Females.

Disabled Retirees: RP-2000 Disabled Tables for males and females.

Active Members: RP-2000 Employee Table for males and females.

The RP-2000 Tables are used with generational mortality.

Sample Ages ⁽¹⁾	Present Value of \$1 Monthly for Life		Future Life Expectancy (Years)	
	Men	Women	Men	Women
50	\$138.63	\$141.98	32.3	34.6
55	132.05	135.41	27.6	29.7
60	122.80	127.04	23.0	25.1
65	111.13	116.91	18.5	20.7
70	97.31	104.80	14.5	16.7
75	81.63	90.90	10.9	13.0
80	65.36	75.76	7.9	9.8
85	49.97	60.2	5.6	7.1

(1) Ages in 2000

These tables were first used for the December 31, 2004 valuation.

APPENDIX C (continued)

The rates of retirement used to measure the probability of eligible members retiring were as follows:

Plans A & B			Plan C		
Service of Member	Police	Fire	Age of Member	Police	Fire
20	28%	20%	50	35%	20%
21	28	15	51	25	15
22	26	10	52	20	10
23	15	10	53	15	10
24	12	10	54	15	10
25	15	15	55	15	10
26	15	10	56	15	10
27	15	10	57	15	15
28	15	10	58	25	25
29	15	30	59	30	30
30	100	10	60	100	100
31	100	100	Over 60	100	100

The current rates were first used for the December 31, 1999 valuation.

Rates of Separation from Active Membership. This assumption measures the probabilities of a member terminating employment. The rates do not apply to members who are eligible to retire.

Sample Ages	Years of Service	Percent Separating Within Year		
		Police	Fire	
ALL	0	10.0%	8.0%	
	1	8.0	6.0	
	2	6.0	4.5	
	3	4.0	3.0	
	4	3.0	2.0	
25	Over 4	3.0	1.0	
		30	2.4	1.0
		35	1.7	1.0
		40	1.2	0.9
		45	1.0	0.8
50		0.9	0.7	
55		0.8	0.6	

These rates were first used for the December 31, 1999 valuation.

APPENDIX C (continued)

Forfeiture of Vested Benefits. The assumption is that a percentage of the actuarial present value of vested termination benefits will be forfeited by a withdrawal of accumulated contributions.

Years of Service	% Forfeiting
10 - 14	100
15	0

This table was first used for the December 31, 2004 valuation.

Rates of Disability. This assumption measures the probability of a member becoming disabled.

Sample Ages	Percent Becoming Disabled Within Year	
	Police	Fire
20	0.10%	0.09%
25	0.16	0.14
30	0.33	0.30
35	0.55	0.49
40	0.77	0.68
45	0.98	0.87
50	1.20	1.06
55	1.42	1.14

These rates were first used for the December 31, 1999 valuation.

Rates of Recovery from Disability: Assumed to be zero.

Administrative Expenses: Assumed to be paid from investment earnings.

Active Member Group Size: Assumed to remain constant.

Vested Deferred Pensions: Amounts for Plan C are assumed to increase during the deferral period at 4.5% per year. This assumption was changed with the December 31, 2004 valuation.

APPENDIX C (continued)

Miscellaneous and Technical Assumptions

<i>Marriage Assumption:</i>	80% of participants are assumed to be married for purposes of death benefits. In each case, the male was assumed to be 3 years older than the female.
<i>Service Related Death and Disability:</i>	All active member deaths and 75% of active member disablements are assumed to be service related.
<i>Pay Increase Timing:</i>	Assumed to occur mid-year.
<i>Decrement Timing:</i>	Decrements of all types are assumed to occur mid-year.
<i>Eligibility Testing:</i>	Eligibility for benefits is determined based upon the age nearest birthday and service nearest whole year at the start of the year in which the decrement is assumed to occur.
<i>Benefit Service:</i>	Service calculated to the nearest month, as of the decrement date, is used to determine the amount of benefit payable.
<i>Other:</i>	Disability and turnover decrements do not operate during retirement eligibility.
<i>Miscellaneous Loading Factors:</i>	The calculated normal retirement benefits were increased by 4% to account for the inclusion of unused sick leave in the calculation of Service Credit. This assumption was changed with the December 31, 2004 valuation.

APPENDIX D

GLOSSARY OF TERMS

Actuarial Liability	The difference between the actuarial present value of system benefits and the actuarial value of future normal costs. Also referred to as “accrued liability” or “actuarial accrued liability.”
Actuarial Assumptions	Estimates of future experience with respect to rates of mortality, disability, turnover, retirement, rate or rates of investment income and salary increases. Decrement assumptions (rates of mortality, disability, turnover and retirement) are generally based on past experience, often modified for projected changes in conditions. Economic assumptions (salary increases and investment income) consist of an underlying rate in an inflation-free environment plus a provision for a long-term average rate of inflation.
Accrued Service	Service credited under the system which was rendered before the date of the actuarial valuation.
Actuarial Equivalent	A single amount or series of amounts of equal actuarial value to another single amount or series of amounts, computed on the basis of appropriate assumptions.
Actuarial Cost Method	A mathematical budgeting procedure for allocating the dollar amount of the actuarial present value of retirement system benefit between future normal cost and actuarial accrued liability. Sometimes referred to as the “actuarial funding method.”
Experience Gain (Loss)	The difference between actual experience and actuarial assumptions anticipated experience during the period between two actuarial valuation dates.
Actuarial Present Value	The amount of funds currently required to provide a payment or series of payments in the future. It is determined by discounting future payments at predetermined rates of interest and by probabilities of payment.
Amortization	Paying off an interest-discounted amount with periodic payments of interest and principal, as opposed to paying off with lump sum payment.
Normal Cost	The actuarial present value of retirement system benefits allocated to the current year by the actuarial cost method.

APPENDIX D (continued)

Unfunded Actuarial Liability

The difference between actuarial liability and the valuation assets.

Most retirement systems have an unfunded actuarial liability. They arise each time new benefits are added and each time an actuarial loss is realized.

The existence of unfunded actuarial liability is not in itself bad, any more than a mortgage on a house is bad. Unfunded actuarial liability does not represent a debt that is payable today. What is important is the ability to amortize the unfunded actuarial liability and the trend in its amount.