
**Firemen's Annuity and Benefit
Fund of Chicago, Illinois**

Actuarial Valuation Report

For the Year Ending December 31, 2002

April 2003



**Gabriel, Roeder, Smith & Company
Actuaries and Consultants**



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April 8, 2003

Retirement Board of the
Firemen's Annuity and Benefit Fund of Chicago
Suite 2550
One North Franklin Street
Chicago, IL 60606

Actuarial Certification

At your request, we have performed an actuarial valuation for the Firemen's Annuity and Benefit Fund of Chicago ("the Fund") as of December 31, 2002. This valuation has been performed to measure the funding status of the Fund and determine the contribution levels for 2002. In addition, it includes disclosure information required under GASB Statement No. 25 and Statement No. 27. The assumptions and methods used were selected by the actuary and meet the parameters set for the disclosure presented in the financial section by Government Accounting Standards Board (GASB) Statement No. 25. These actuarial valuations of the Fund are performed annually.

We have provided the supporting schedules for the actuarial section of the comprehensive annual financial report, including:

- Schedule of Active Member Data
- Retirements and Beneficiaries Added to and Removed from Rolls
- Solvency (Termination) Test
- Analysis of Financial Experience

We have also provided the following schedules in the financial sections of the report. We relied on information from the prior actuary for years before 1999.

- Schedule of Funding Progress
- Schedule of Employer Contributions

This valuation is based upon:

- a) **Data relative to the members of the Fund** — Data for active members was provided by the Fund's staff. Data utilized for persons receiving benefits from the Fund was also provided by the Fund's staff. We have tested this data for reasonableness.

- b) **Asset Values** — The values of assets of the Fund were provided by the Fund's staff. Actuarial value of assets was used to develop actuarial results for the State-reporting basis, as well as for GASB Statement No. 25 and Statement No. 27.
- c) **Actuarial Method** — The actuarial method utilized by the Fund is the Entry-Age Actuarial Cost Method. The objective of this method is to amortize the costs of Fund benefits over the entire career of each member as a level percentage of compensation. Any Unfunded Actuarial Accrued Liability (UAAL) under this method is separately financed. All actuarial gains and losses under this method are reflected in the UAAL.
- d) **Actuarial Assumptions** — The same actuarial assumptions as last year were used for this valuation. They are set out in Appendix 4.

The funding objective is to provide employer and employee contributions sufficient to provide the benefits of the Fund when due. The provision of State Law establishing the Fund constrains employer contributions to be 2.26 times the employee contribution level in the second prior fiscal year. Thus, with an administrative lag, the employer contribution is designed to match the employee contribution in a 2.26:1 relationship. The most recent actuarial valuation of the Fund on the State reporting basis shows that a ratio of 4.19:1 is needed to adequately finance the Fund.

The valuation results set out in this report are based on the data and actuarial techniques described above, and upon the provisions of the Fund as of the valuation date. Based on these items, we certify these results to be true and correct.

To the best of our knowledge this report is complete and accurate and was conducted in accordance with standards of practice promulgated by the Actuarial Standards Board and in compliance with the City Ordinance. The actuarial assumptions used for the valuation produce results which, in the aggregate, are reasonable. This valuation was produced under the supervision of a member of the Academy of Actuaries with significant experience in valuing public employee retirement systems.

Gabriel, Roeder, Smith and Company



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SUMMARY OF VALUATION RESULTS

This report sets out the results of the actuarial valuation of the Firemen's Annuity and Benefit Fund of the City of Chicago ("Fund") as of December 31, 2002. The purposes of this valuation are:

1. To develop the minimum actuarially determined contribution for 2003.
2. To develop the annual required contributions (ARC) under GASB #25.
3. To develop the annual pension cost under GASB #27.
4. To review the funding status of the Fund.

The funding status in basic terms, is a comparison of the fund's liabilities to assets expressed as either unfunded liability or as a ratio of assets to liabilities. This comparison can be measured in various ways. Fund liabilities are dependent on the actuarial assumptions and actuarial cost method. Fund assets can be measured at market value, book value, or some variation to smooth the fluctuations that invariably occur from year to year.

For State reporting, as well as for Fund and City financial reports, the funding status is measured using liabilities under the Entry Age Normal funding method and the Actuarial (Market Related) Value of Assets.

The Actuarial (Market-Related) Value of Assets is determined from market value with investment gains and losses smoothed over a five-year period. The actuarial assumptions used to determine the liabilities are the same in all three measures.

Comments on Results

For State reporting purposes, the minimum actuarially determined contribution for the year ending December 31, 2002 is \$137.2 million including estimated employee contributions of \$26.1 million. This is 49.51% of the total payroll for the Fund and a \$5.9 million increase over the minimum actuarial contribution for 2001.

The annual required contributions (ARC) under GASB #25 for the year ending December 31, 2003 is \$111.1 million, which is 40.11% of the total payroll. This amount is net of estimated employee contributions of \$26.1 million. The 2003 ARC of \$111.1 million compares with the 2002 ARC of \$105.1 million. The ARC is determined using an actuarial value of assets and a forty-year level dollar amortization of the unfunded actuarial liability.

The funding status declined slightly from the prior year. The unfunded liability increased from \$824 million to \$879 million and the funding ratio decreased from 60.19% to 57.89% using the smoothed Actuarial (Market Related) Value of Assets. The funded ratio is 43.46% when the market value of assets is compared to GASB #25 actuarial liabilities.

SUMMARY OF VALUATION RESULTS (CONT'D)

Plan contributions and funded ratios (based on market-related asset values) remained stable from the prior year levels. A number of factors combined to produce this result.

- The average annual salary remained level; the assumed salary increase rate was 5.0%.
- There were fewer retirements from active service and more annuitant deaths than expected.
- The employer cost in excess of actual contributions was approximately \$42.9 million.
- Plan assets earned less than the assumed 8% return. This resulted in a loss on the market-related value of assets of \$79.3 million compared to a loss of \$229.3 million on market value of assets.

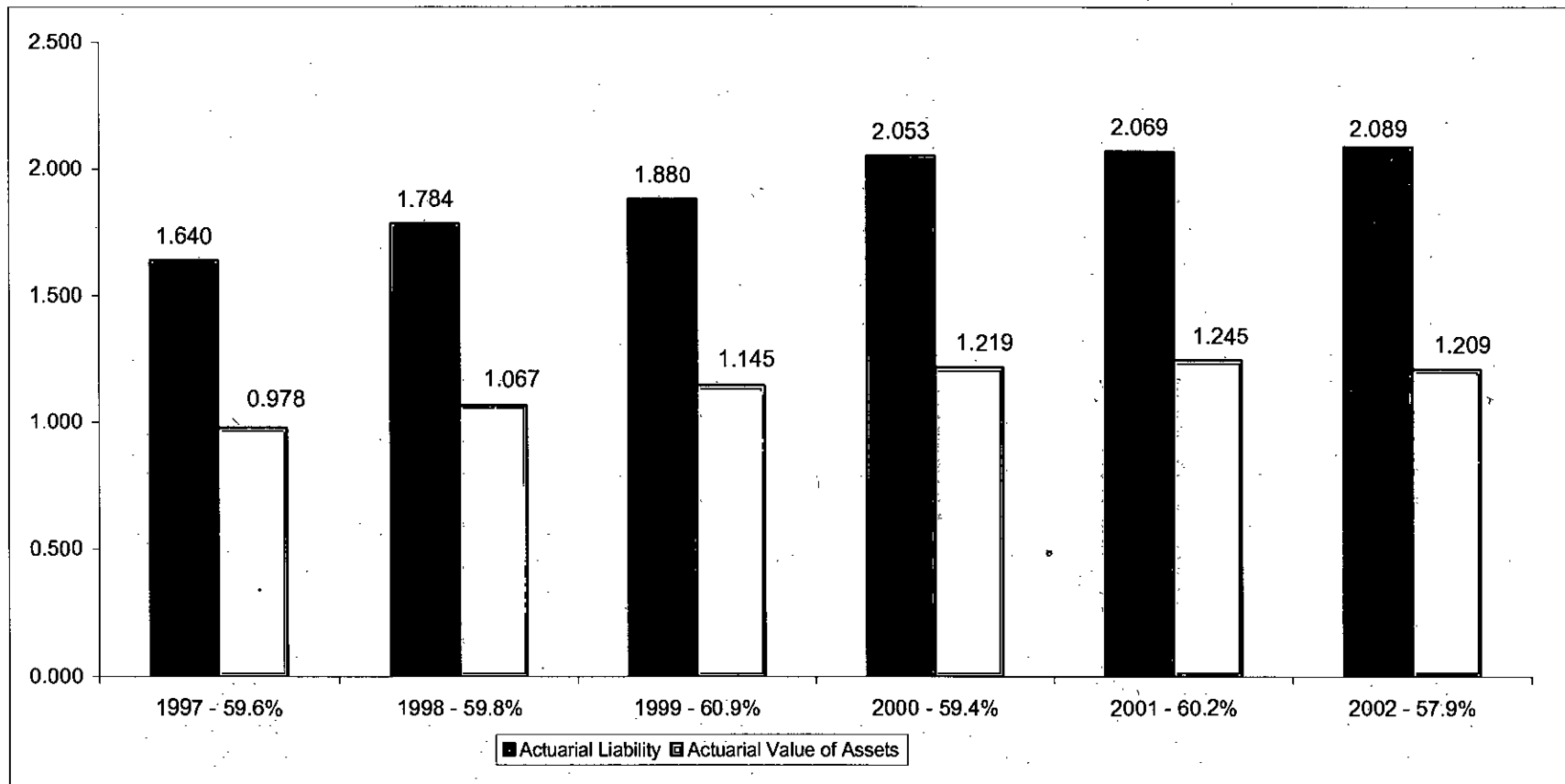
A more thorough examination of these and other factors can be found in the Reconciliation of Unfunded Liability section and the gain/loss calculation of Table 3.

A summary of the primary results of this valuation is shown in the following table.

	December 31, 2001		December 31, 2002	
	\$ in Millions	% of Pay ¹	\$ in Millions	% of Pay ¹
Contribution Levels				
Minimum Actuarially Determined Contribution (State Reporting)	\$ 131.2	47.22	\$ 137.2	49.51
Annual Required Contribution (GASB 25)	105.1	37.81	111.1	40.11
Funding Status -- State/GASB #25				
Market-Related Value of Assets	\$ 1,245.1	447.95	\$ 1,209.2	436.46
Actuarial Liability	2,068.7	744.24	2,088.7	753.90
Funding Ratios	60.19%	N/A	57.89%	N/A
Funding Status -- Market Value				
Market Value of Assets	\$ 1,104.9	397.51	\$ 907.8	327.66
Actuarial Liability	2,068.7	744.24	2,088.7	753.90
Funding Ratios	53.41%	N/A	43.46%	N/A
Funding Status -- Book Value				
Book Value of Assets	\$ 1,065.6	383.35	\$ 950.7	343.16
Actuarial Liability	2,068.7	744.24	2,088.7	753.90
Funding Ratios	51.51%	N/A	45.52%	N/A

¹Payroll for 2001 was \$278.0 million and for 2002 was \$277.1 million.

**COMPONENTS OF FUNDING RATIO
GASB #25 / STATE REPORTING
(\$ IN BILLIONS)**



SUMMARY OF VALUATION RESULTS (CONT'D)

Participants

The major characteristics of the data on the members of the Fund are summarized as follows:

	<u>December 31, 2001</u>	<u>December 31, 2002</u>
Active Participants		
Number	4,930	4,910 ¹
Average Age	42.6	43.1
Average Service	14.3	14.7
Average Annual Salary	56,382	56,426
Retirees		
Number	2,422	2,411
Average Age	71.0	71.3
Average Monthly Benefit	3,171	3,338
Survivors		
Number	1,421	1,416
Average Age	75.3	75.5
Average Monthly Benefit	1,195	1,216

¹ Includes two participants on ordinary disability who continue to accrue benefit service.

Total participants receiving benefits under the Fund, including disability, widow, and children, decreased (0.4)% during 2002 from 4,370 to 4,351. Total expenditures for these benefits increased from \$133.3 million in 2001 to \$137.7 million during 2002, or 3.3%.

Changes in Provisions of the Fund

HB 92-0599 was passed in 2002. It provided that group health benefits are available through June 2003, changed from June 2002.

Analysis of Actuarial Assumptions

Actuarial assumptions are used to project future demographic and economic expectations for purposes of valuing the liabilities of the plan. The assumptions should reflect current patterns. However, their primary orientation is the long-term outlook for each factor affecting the valuation. Thus, while actual experience will fluctuate over the short run, actuarial assumptions are chosen in an attempt to model the future long run experience.

There are two general types of actuarial assumptions:

1. Demographic Assumptions - reflect the flow of participants into and out of a retirement system, and
2. Economic Assumptions - reflect the effect of the economic climate on a retirement system.

SUMMARY OF VALUATION RESULTS (CONT'D)

Demographic assumptions can be readily studied over recent plan experience. Economic assumptions can be studied against recent experience; however, future experience is more likely to be a result of outside factors than of plan specifics. The most significant demographic assumptions are: active turnover, retirement, and post-retirement mortality. The most significant economic assumptions are: pay increases, investment return, and inflation. Other actuarial assumptions include: disability incidence, active mortality, and percent married.

Asset Valuation Method

The method used to develop the Fund's Actuarial Value of Assets is as follows: In years when Fund assets earn above 8% (i.e., experience gain) or below 8% (i.e., experience loss) the gain (or loss) will be gradually recognized over five years. This approach both smoothes the Fund's level of contribution and insures the Fund's assets will track the market value of assets.

2002 Experience Analysis

The Fund had an investment loss in 2002 of \$229.3 million relative to the 8% expected rate of return on a market value basis. The loss on the Actuarial (Market-Related) Value of Assets relative to the 8% expected rate of return was \$79.3 million due to the deferred recognition of investment gains and losses.

The pay increase assumption consists of two parts, a base salary increase (3%) and a longevity-based increase (2%). Overall, the average salary for 2002 did not increase from the 2001 salary. When comparing members active in both 2001 and 2002 the average salary increase was 0.08%. This was below our aggregate assumption of 5% resulting in an actuarial gain of approximately \$57.8 million.

The combination of retirements and disablements were less than expected, and when coupled with greater than expected mortality among participants currently receiving benefits, the result is a net actuarial gain of \$9.8 million. Gains and losses from all other sources resulted in a net loss of \$1.3 million. This is about 0.1% of the December 31, 2002 liabilities, well within the range of reasonable variation.

Conclusion

Based on our analysis of the experience we believe that the current assumptions are doing a reasonable job of modeling actual experience. An update of the disability mortality assumption may be necessary once we have sufficient data available to track this assumption. Table 3 of Appendix 1 shows a more detailed development of the actuarial gains and losses for the year.

Appendix 1

Results of Actuarial Valuation

TABLE 1
SUMMARY

	<u>December 31,</u> <u>2001</u>	<u>December 31,</u> <u>2002</u>
<u>Assets</u>		
Market Value - Beginning of Year	\$1,226,825,840	\$1,104,939,587
<u>Income</u>		
Investment Income Net Expenses	(\$73,525,244)	(\$143,060,302)
Employer Contributions	60,399,909	58,838,300
Employee Contributions	27,615,475	27,576,384
Miscellaneous	62,437	257,645
Subtotal	<u>\$ 14,552,577</u>	<u>(\$56,387,973)</u>
<u>Outgo (Refunds, Benefits, & Administration)</u>	<u>\$136,438,830</u>	<u>\$ 140,749,657</u>
Market Value - End of Year	\$1,104,939,587	\$907,801,957
Actuarial Value - End of Year	1,245,129,955	1,209,218,603
Book Value - End of Year	1,065,584,992	950,744,457
<u>Members</u>		
Active	4,930	4,910
Retirees	2,422	2,411
Survivors	1,421	1,415
Disabilities	409	401
Children	116	121
<u>Payroll Data</u>		
Valuation Payroll ¹	\$ 277,964,912	\$ 277,053,144
Average Salary	56,382	56,426

¹ The valuation payroll includes compensation for two ordinary disability participants. They continue to accrue benefit service and hence additional liability while on ordinary disability.

TABLE 1 (CONT.)

SUMMARY

	December 31, 2001	December 31, 2002
<u>Actuarial Values</u>		
<u>Funding - State Basis</u>		
Actuarial Liability	\$2,068,717,901	\$2,088,706,217
Assets - Actuarial Value - Net	1,245,129,955	1,209,218,603
Unfunded Liability	823,587,946	879,487,614
Funded Ratio	60.19%	57.89%
Actuarially Required Total Contribution ¹	\$131,244,939	\$137,176,182
Deficiency in Required Contribution (est.)	48,807,487	48,712,491
Required Employer Contribution Multiple	4.44	4.19
<u>Termination Values</u>		
Liability	\$1,673,740,088	\$1,723,872,531
Deficiency	428,610,133	514,653,928
Quick Ratio	74.39%	70.15%
<u>GASB #25 Values</u>		
Actuarial Liability	\$2,068,717,901	\$2,088,706,217
Assets - Actuarial Value	1,245,129,955	1,209,218,603
Unfunded Liability	823,587,946	879,487,614
Funded Ratio	60.19%	57.89%
Annual Required Contribution (ARC)	105,106,367	111,123,464
<u>Market Values</u>		
Actuarial Liability	\$2,068,717,901	\$2,088,706,217
Assets - Market Value	1,104,939,587	907,801,957
Unfunded Liability	963,778,314	1,180,904,260
Funded Ratio	53.41%	43.46%

¹Includes projected employee contributions of \$26,138,572 for December 31, 2001 and \$26,052,718 for December 31, 2002.

TABLE 2
DEVELOPMENT OF ACTUARIALLY CALCULATED
CONTRIBUTION FOR 2003 (STATE BASIS)
AND
DEVELOPMENT OF ANNUAL REQUIRED CONTRIBUTION
UNDER GASB #25 FOR 2003

<u>(1) Normal Cost</u>	\$63,528,127
<u>(2) Actuarial Accrued Liability (AAL)</u>	\$2,088,706,217
<u>(3) Unfunded AAL (UAAL)</u>	
(a) Actuarial Value of Assets	\$1,209,218,603
(b) UAAL (2-3(a))	879,487,614
<u>(4) 40-Year Amortization (Level \$) Payable at Beginning of Year at 8.0%</u>	\$68,290,716
<u>(5) Minimum Actuarially Calculated Contribution</u>	
(a) Interest Adjustment for Semimonthly Payment	5,357,339
(b) Total Minimum Contribution (1+4+5(a))	137,176,182
(c) Total Minimum Contribution (Percent of Pay)	49.51%
<u>(6) Estimated Member Contributions</u>	\$26,052,718
<u>(7) Annual Required Contribution (ARC)</u>	
(b) Annual Required Contribution (5(b)-6)	\$111,123,464
(c) Annual Required Contribution (Percent of Pay)	40.11%
<u>(8) Estimated City Contribution</u>	\$62,410,974
<u>(9) Deficiency/(Excess)</u>	
(a) in Dollars (7(b)-8)	\$48,712,491
(b) as a Percentage of Pay	17.58%

TABLE 3
RECONCILIATION OF UNFUNDED LIABILITY

	<u>2001</u>	<u>2002</u>
<u>Unfunded Actuarial Accrued Liability - Beginning of Year</u>	\$833,853,513	\$823,587,946
Gains (Losses) During the Year Attributable to:		
Employer Cost in Excess of Contributions	(\$37,575,361)	(\$42,891,812)
Gain (Loss) on Investment Return	(21,620,515)	(79,281,327)
Gain (Loss) from Salary Changes	42,988,827	57,839,048
Gain (Loss) from Demographic Assumptions	19,286,460	9,777,592
Gain (Loss) from All Other Sources	<u>7,186,157</u>	<u>(1,343,169)</u>
Composite Actuarial Gain (Loss)	\$10,265,567	(\$55,899,668)
<u>Unfunded Actuarial Accrued Liability - End of Year</u>	\$823,587,946	\$879,487,614

TABLE 5
HISTORY OF RECOMMENDED EMPLOYER MULTIPLES

<u>Year of Report</u>	<u>Statutory Multiple</u>	<u>Normal Cost Plus Interest</u>	<u>Normal Cost Plus 40-Year Amortization</u>	
			<u>Level \$</u>	<u>Level % of Salary</u>
1982 ^{1,2}	2.26	4.04	4.21	3.05
1983 ^{1,2}	2.26	4.66	4.84	3.71
1984	2.26	4.89	5.08	3.86
1985 ²	2.26	5.07	5.27	4.03
1986 ¹	2.26	4.70	4.86	3.71
1987 ¹	2.26	4.39	4.54	3.47
1988	2.26	4.53	4.68	3.58
1989 ^{1,2}	2.26	4.39	4.52	3.41
1990 ^{1,2}	2.26	4.41	4.55	3.43
1991	2.26	4.55	4.69	3.53
1992 ²	2.26	4.75	4.89	3.69
1993 ²	2.26	4.89	5.03	3.81
1994 ^{1,2}	2.26	4.92	5.09	3.71
1995 ²	2.26	5.16	5.33	3.78
1996	2.26	5.02	5.19	3.78
1997 ^{1,2,3}	2.26	3.95	4.08	3.00
1998 ^{2,4}	2.26	4.31	4.22	2.91
1999	2.26	3.56	3.49	2.41
2000 ¹	2.26	4.39	4.30	2.99
2001 ⁴	2.26	4.61	4.44	3.12
2002	2.26	4.07	4.19	2.93

¹ Change in actuarial assumptions

² Change in benefits

³ Change in asset valuation method to GASB

⁴ Change in actuary

TABLE 6
ORDINARY DEATH BENEFIT RESERVE

ASSETS

Fund Balance	\$ (5,636,492)
Present Values of Future Contributions:	
Contributions by Members at \$30.00 a Year	1,554,367
Annual City Contribution of \$142,000	1,498,439
Unfunded Liability	19,152,820
TOTAL ASSETS	\$ 16,569,134

LIABILITIES

Present Value of Future Death Benefits (3%, Plan Mortality Basis)	
Active Members	5,885,413
Retired Members	10,683,721
TOTAL LIABILITIES	\$ 16,569,134

Note: Benefits are also included in the accrued liability and valued on the actuarial assumptions.

TABLE 7
SUMMARY OF RESERVES

	<u>2001</u>	<u>2002</u>
Prior Service Annuity Reserve	\$ 856,200,300	\$ 850,269,401
City Contribution Reserve	489,959,759	467,146,024
Annuity Payment Reserve	345,271,065	411,075,650
Salary Deduction Reserve	366,357,079	386,790,572
Death Benefit Reserve	(5,039,242)	(5,636,492)
Ordinary Disability Reserve	208,882	213,521
Supplementary Payment Reserve	1,523,237	1,666,253
Gift Reserve	1,234,067	1,280,112
Reserve (Deficit)	<u>(950,775,560)</u>	<u>(1,205,003,084)</u>
Total Net Assets for Pension Benefits	\$1,104,939,587	\$907,801,957

TABLE 8
ACTUARIAL ACCRUED LIABILITY
PRIORITIZED SOLVENCY TEST

Valuation Date 12/31	(1) Active Member Contributions	(2) Retirees and Beneficiaries	(3) Active Members (ER Financed Portion)	Actuarial Value of Assets	Portion (%) of Present Value Covered by Assets		
					(1)	(2)	(3)
1985 ^{1,2}	\$152,857,789	\$ 363,559,004	\$389,856,354	\$ 370,219,440	100.00%	59.79%	0.00%
1986 ^{1,2}	159,247,413	409,282,863	393,153,564	440,687,231	100.00%	68.76%	0.00%
1987 ^{1,2}	171,040,140	442,476,049	384,316,705	483,965,269	100.00%	70.72%	0.00%
1988	176,885,164	500,141,377	359,459,177	511,237,886	100.00%	66.85%	0.00%
1989 ^{1,2}	180,224,846	533,989,887	361,889,786	554,780,349	100.00%	70.14%	0.00%
1990 ^{1,2}	203,385,446	551,819,011	388,646,637	562,765,339	100.00%	65.13%	0.00%
1991 ²	220,541,857	582,545,890	429,281,414	593,664,230	100.00%	64.05%	0.00%
1992	233,769,778	620,585,314	413,794,955	636,208,355	100.00%	64.85%	0.00%
1993 ²	247,328,526	652,460,861	401,268,935	680,145,547	100.00%	66.34%	0.00%
1994	231,721,857	820,223,870	388,977,064	712,992,314	100.00%	58.68%	0.00%
1995 ²	284,613,679	890,790,702	356,835,156	787,000,898	100.00%	56.40%	0.00%
1996	302,854,182	928,790,813	344,144,574	845,432,187	100.00%	58.42%	0.00%
1997 ^{1,2}	320,757,406	992,967,015	326,296,251	978,313,319	100.00%	66.22%	0.00%
1998 ^{2,3}	335,026,373	1,075,922,284	372,620,521	1,066,891,190	100.00%	68.02%	0.00%
1999	357,739,707	1,146,375,517	375,551,644	1,145,215,019	100.00%	68.69%	0.00%
2000 ¹	354,336,276	1,279,911,268	419,092,931	1,219,486,962	100.00%	67.59%	0.00%
2001 ³	379,067,821	1,294,672,267	394,977,813	1,245,129,955	100.00%	66.89%	0.00%
2002	394,531,369	1,329,341,162	364,833,686	1,209,218,603	100.00%	61.29%	0.00%

¹ Change in actuarial assumptions

² Change in benefits

³ Change in actuary

Appendix 2

Assets of the Plan

ASSETS OF THE PLAN

The book value of the plan assets, net of accounts payable, decreased from \$1,066 million as of December 31, 2001 to \$951 million as of December 31, 2002. The market value of the plan assets decreased from \$1,105 million as of December 31, 2001 to \$908 million as of December 31, 2002. Table 9 details the development of asset values during 2002 and Table 10 shows the development of the actuarial value of assets as of December 31, 2002.

TABLE 9
RECONCILIATION OF ASSET VALUE
AS OF DECEMBER 31, 2002

	<u>Market Value</u>	<u>Book Value</u>
1. Value of assets as of 12/31/2001	\$1,104,939,587	\$1,065,584,992
2. Income for plan year:		
a) Member contributions	\$ 27,576,384	\$ 27,576,384
b) City contributions	58,838,300	58,838,300
c) Investment income net of expenses	(143,060,302)	(60,763,207)
d) Miscellaneous revenue	257,645	257,645
e) Total income	(\$56,387,973)	\$ 25,909,122
3. Disbursements for plan year:		
a) Benefit payments	\$ 137,710,209	\$ 137,710,209
b) Refunds	1,080,393	1,080,393
c) Administration	1,959,055	1,959,055
d) Total disbursements	\$ 140,749,657	\$ 140,749,657
4. Value of assets as of 12/31/2002	\$907,801,957	\$950,744,457
5. Estimated rate of return in 2002:		
a) Gross (Investment expense of \$4,479,519)	-12.88%	-5.43%
b) Net of investment expense	-13.27%	-5.85%

Method used for calculating rate of return does not reflect specific timing of income and outflows. It is also based on total assets, not invested assets.

TABLE 10
DEVELOPMENT OF ACTUARIAL (MARKET RELATED)
VALUE OF ASSETS
AS OF DECEMBER 31, 2002

1. Expected Return on Market Value of Assets

- a) Market value of assets as of 12/31/2001 \$1,104,939,587
b) Actual income and disbursements in year ending 12/31/2002 weighted for timing

Item	Amount	Weight for Timing	Weighted Amount
i) Member contributions	\$27,576,384	50.0%	\$13,788,192
ii) City contributions	58,838,300	50.0%	29,419,150
iii) Miscellaneous revenue	257,645	50.0%	128,823
iv) Benefit payments	(137,710,209)	50.0%	(68,855,105)
v) Refunds	(1,080,393)	50.0%	(540,197)
vi) Administration	(1,959,055)	50.0%	(979,528)
vii) Total			(\$27,038,665)

- c) Market value of assets adjusted for actual income and disbursements [(a) + (b)(vii)] \$1,077,900,922
d) Assumed rate of return on plan assets for the year 8.00%
e) Expected return [(c) * (d)] \$86,232,074

2. Actual Return on Market Value of Assets for Year Ending 12/31/2002

- a) Market value of assets as of 12/31/2001 \$1,104,939,587
b) Income (less investment income) for year ending 12/31/2002 86,672,329
c) Disbursements paid in year ending 12/31/2002 140,749,657
d) Market value of assets as of 12/31/2002 907,801,957
e) Actual return [(d) + (c) - (b) - (a)] (\$143,060,302)

3. Investment Gain/(Loss) for Year Ending 12/31/2002 [2(e) - 1(e)] (\$229,292,376)

4. Actuarial Value of Assets as of 12/31/2002

- a) Market value of assets as of 12/31/2002 \$907,801,957
b) Deferred investment gains and (losses) for last 5 years

	Plan Year	Gain/(Loss)	Percent Deferred	Deferred Amount
i)	1998	\$29,375,799	0.00%	\$0
ii)	1999	139,349,009	20.00%	27,869,802
iii)	2000	(110,026,059)	40.00%	(44,010,424)
iv)	2001	(169,736,871)	60.00%	(101,842,123)
v)	2002	(229,292,376)	80.00%	(183,433,901)
vi)	Total	(\$340,330,498)		(\$301,416,646)

- c) Actuarial Value of Assets \$1,209,218,603

Note: Beginning with the December 31, 1998 valuation, the calculated value is determined by adjusting the market value of assets to reflect the investment gains and losses (the difference between the actual investment return and the expected investment return) during each of the last 5 years at the rate of 20% per year.

Appendix 3

Data Reflecting Plan Members

EXHIBIT A
SUMMARY OF CHANGES IN ACTIVE PARTICIPANTS
FOR FISCAL YEAR ENDING DECEMBER 31, 2002

	<u>Male</u>	<u>Female</u>	<u>Total</u>
Number of Participants at Beginning of Fiscal Year	4,664	264	4,928
Increases:			
Participants Added During Year	112	7	119
Participants Returning From Inactive or Disability Status	5	0	5
Totals	4,781	271	5,052
Decreases:			
Terminations During Year	138	6	144
Number of Participants at End of Fiscal Year	4,643	265	4,908
Total Inactive Participants			171
<u>Terminations:</u>			
Withdrawal (With Refunds) ¹	5	1	6
Withdrawal (Without Refunds)	29	4	33
Ordinary Disability Benefit	2	0	2
Occupational Disease Disability Benefit	22	0	22
Duty Disability Benefit	13	1	14
Retirements	62	0	62
Deaths (Occupational)	0	0	0
Deaths (Non-occupational)	5	0	5
Totals	138	6	144

¹This total differs from the total of 19 shown in Exhibit D due to the fact that only 6 of the refunds were paid to participants who were considered to be active as of December 31, 2001.

EXHIBIT B
SUMMARY OF CHANGES IN ANNUITANTS AND BENEFICIARIES
FOR FISCAL YEAR ENDING DECEMBER 31, 2002

	<u>Number at Beginning of Year</u>	<u>Additions During Year</u>	<u>Terminations During Year</u>	<u>Number at End of Year</u>
Service Retirement Annuities	2,422	107	118	2,411
Spouse Annuitants	1,330	73	73	1,330
Children's Annuities	116	12	7	121
Parent Annuities	2	0	1	1
Ordinary Disability Benefit (Non-Occupational)	2	2	2	2
Occupational Disease Disability Benefit	147	22	25	144
Duty Disability Benefit (Occupational)	262	16	21	257
Children's Disability Benefit				
Widows' Compensation Annuities ¹ (Service Connected Death)	89	1	5	85
Totals	<u>4,370</u>	<u>233</u>	<u>252</u>	<u>4,351</u>

¹All Supplemental Widows were moved into Compensation Widows Group.

EXHIBIT C

PART I – TOTAL LIVES AND ANNUAL SALARIES OF ACTIVE MALE PARTICIPANTS CLASSIFIED BY AGE AND YEARS OF SERVICE AS OF 12/31/2002

AGE	Years of Service									Total	Annual Salary
	Under 1 year	1 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 and over		
Under 20										0	\$ 0
20 to 24	1 33,522	6 264,156								7	297,678
25 to 29	22 737,484	138 6,059,430	75 3,798,210							235	10,595,124
30 to 34	28 938,616	234 10,515,480	261 13,393,956	13 725,178						536	25,573,230
35 to 39	24 813,258	140 6,288,090	226 11,529,522	221 12,257,190	135 8,010,312	1 81,510				747	38,979,882
40 to 44	6 201,132	67 2,990,724	210 10,671,948	321 17,693,862	259 15,136,650	137 8,701,926	3 188,352			1,003	55,584,594
45 to 49	4 134,088	20 891,954	69 3,503,790	138 7,454,868	143 8,259,192	618 39,129,366	88 6,248,232			1,080	65,621,490
50 to 54	1 33,522	6 273,492	16 805,848	41 2,245,824	57 3,200,526	324 19,721,826	147 9,996,930	1 78,726		593	36,356,694
55 to 59	1 33,522	1 48,846	8 402,924	6 320,700	9 507,396	76 4,522,590	87 5,839,590	111 7,904,868		299	19,580,436
60 to 64				1 51,780	1 53,610	6 359,352	19 1,153,722	47 3,350,832	64 4,937,790	138	9,907,086
65 and over										0	0
W/O DOB	2 67,044									2	67,044
Total Active	89	612	865	741	604	1,162	344	159	64	4,640	
Annual Salary¹	\$2,992,188	\$27,332,172	\$44,106,198	\$40,749,402	\$35,167,686	\$72,516,570	\$23,426,826	\$11,334,426	\$4,937,790		\$262,563,258

¹ The number of participants and annual salary listed includes information on active participants only. Hence, information on the two ordinary disability participants, who continue to earn benefit service, is not included in this exhibit.

EXHIBIT C
PART II – TOTAL LIVES AND ANNUAL SALARIES OF ACTIVE FEMALE PARTICIPANTS CLASSIFIED BY AGE AND YEARS OF SERVICE AS OF 12/31/2002

AGE	Years of Service									Total	Annual Salary
	Under 1 year	1 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 and over		
Under 20										0	\$ 0
20 to 24		1 43,182								1	43,182
25 to 29	1 33,522	20 859,032								21	892,554
30 to 34		17 757,440	8 423,978	4 222,846						29	1,404,264
35 to 39	1 33,522	16 732,714	14 729,510	33 1,826,364	11 659,316					75	3,981,426
40 to 44		6 275,628	14 725,544	21 1,143,474	20 1,174,446	5 298,128	1 74,508			67	3,691,728
45 to 49		2 96,498	2 104,274	14 747,324	18 1,019,346	11 679,926	2 138,990			49	2,786,358
50 to 54			1 50,052	3 160,944	3 181,134	5 327,084	3 201,204			15	920,418
55 to 59			1 50,052	2 112,176	1 53,610	1 74,508	1 62,214			6	352,560
60 to 64					2 111,618	1 55,482	1 76,776			4	243,876
65 and over						1 60,030				1	60,030
Total Active	2	62	40	77	55	24	8	-	-	268	
Annual Salary¹	\$67,044	\$2,764,494	\$2,083,410	\$4,213,128	\$3,199,470	\$1,495,158	\$553,692	\$0	\$0		\$14,376,396

¹ The number of participants and annual salary listed includes information on active participants only. Hence, information on the two ordinary disability participants, who continue to earn benefit service, is not included in this exhibit.

EXHIBIT C

PART III – TOTAL LIVES AND ANNUAL SALARIES OF ALL ACTIVE PARTICIPANTS CLASSIFIED BY AGE AND YEARS OF SERVICE AS OF 12/31/2002

AGE	Years of Service									Total	Annual Salary
	Under 1 year	1 to 4	5 to 9	10 to 14	15 to 19	20 to 24	25 to 29	30 to 34	35 and over		
Under 20										0	\$ 0
20 to 24	1 33,522	7 307,338								8	340,860
25 to 29	23 771,006	158 6,918,462	75 3,798,210							256	11,487,678
30 to 34	28 938,616	251 11,272,920	269 13,817,934	17 948,024						565	26,977,494
35 to 39	25 846,780	156 7,020,804	240 12,259,032	254 14,083,554	146 8,669,628	1 81,510				822	42,961,308
40 to 44	6 201,132	73 3,266,352	224 11,397,492	342 18,837,336	279 16,311,096	142 9,000,054	4 262,860			1,070	59,276,322
45 to 49	4 134,088	22 988,452	71 3,608,064	152 8,202,192	161 9,278,538	629 39,809,292	90 6,387,222			1,129	68,407,848
50 to 54	1 33,522	6 273,492	17 855,900	44 2,406,768	60 3,381,660	329 20,048,910	150 10,198,134	1 78,726		608	37,277,112
55 to 59	1 33,522	1 48,846	9 452,976	8 432,876	10 561,006	77 4,597,098	88 5,901,804	111 7,904,868		305	19,932,996
60 to 64				1 51,780	3 165,228	7 414,834	20 1,230,498	47 3,350,832	64 4,937,790	142	10,150,962
65 and over						1 60,030				1	60,030
W/O DOB	2 67,044									2	67,044
Total Active	91	674	905	818	659	1,186	352	159	64	4,908	
Annual Salary¹	\$3,059,232	\$30,096,666	\$46,189,608	\$44,962,530	\$38,367,156	\$74,011,728	\$23,980,518	\$11,334,426	\$4,937,790		\$276,939,654

¹ The number of participants and annual salary listed includes information on active participants only. Hence, information on the two ordinary disability participants, who continue to earn benefit service, is not included in this exhibit.

EXHIBIT D - PART I
SHOWING NUMBER OF REFUND PAYMENTS MADE
DURING YEAR TO MALE EMPLOYEES
FOR FISCAL YEAR ENDING DECEMBER 31, 2002

Age at Date of Refund	Length of Service at Date of Refund						Total
	Under 1 Year	Between 1 and 2	Between 2 and 3	Between 3 and 4	Between 4 and 5	5 and over ¹	
Without Record		2	1			2	5
Under 20							0
20 to 24							0
25 to 29	1						1
30 to 34		1		1	1		3
35 to 39					1	1	2
40 to 44	1					1	2
45 to 49							0
50 to 54			1			1	2
55 to 59							0
60 & over						1	1
Totals	2	3	2	1	2	6	16

Includes only the actual number of refunds paid or accrued during fiscal year reported.

¹ Includes three refunds from male participants paid to their estate.

EXHIBIT D - PART II
SHOWING NUMBER OF REFUND PAYMENTS MADE
DURING YEAR TO FEMALE EMPLOYEES
FOR FISCAL YEAR ENDING DECEMBER 31, 2002

Age at Date of Refund	Length of Service at Date of Refund						Total
	Under 1 Year	Between 1 and 2	Between 2 and 3	Between 3 and 4	Between 4 and 5	5 and over	
Without Record						1	1
Under 20							0
20 to 24							0
25 to 29							0
30 to 34						1	1
35 to 39						1	1
40 to 44							0
45 to 49							0
50 to 54							0
55 to 59							0
60 & over							0
Totals	0	0	0	0	0	3	3

Includes only the actual number of refunds paid or accrued during fiscal year reported.

EXHIBIT E
SHOWING STATISTICS ON SERVICE RETIREMENT ANNUITIES
CLASSIFIED BY AGE AS OF DECEMBER 31, 2002

AGE	MALE		FEMALE		TOTAL	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 50	5	\$ 23,750	1	\$ 5,700	6	\$ 29,450
50	10	316,676			10	316,676
51	6	200,273			6	200,273
52	8	274,363	2	45,386	10	319,749
53	10	295,061			10	295,061
54	5	154,424			5	154,424
55	17	631,255			17	631,255
56	15	507,065			15	507,065
57	16	590,891			16	590,891
58	23	924,769			23	924,769
59	33	1,387,929			33	1,387,929
60	69	3,177,612			69	3,177,612
61	67	3,031,177			67	3,031,177
62	91	4,139,452			91	4,139,452
63	89	4,307,373			89	4,307,373
64	85	3,990,498			85	3,990,498
65	73	3,462,921			73	3,462,921
66	132	6,354,432			132	6,354,432
67	94	4,530,010			94	4,530,010
68	99	4,898,527			99	4,898,527
69	111	5,104,122			111	5,104,122
70	103	4,818,965			103	4,818,965
71	138	6,176,506			138	6,176,506
72	131	5,530,408			131	5,530,408
73	117	4,685,578			117	4,685,578
74	94	3,606,083			94	3,606,083
75	109	4,008,753			109	4,008,753
76	104	3,716,716			104	3,716,716
77	99	3,115,689			99	3,115,689
78	82	2,659,955			82	2,659,955
79	57	1,750,184			57	1,750,184
80	48	1,511,132			48	1,511,132
81	55	1,632,601			55	1,632,601
82	40	1,022,955			40	1,022,955
83	36	875,069			36	875,069
84	24	678,869			24	678,869
85+	113	2,422,713			113	2,422,713
Totals	2,408	\$96,514,756	3	\$51,086	2,411	\$96,565,842

EXHIBIT F
SHOWING STATISTICS ON WIDOW'S ANNUITIES
CLASSIFIED BY AGE AS OF DECEMBER 31, 2002

Age	No.	Annual Payments	Age	No.	Annual Payments
Under 30	0	\$ 0	58	7	\$ 114,642
30	0	0	59	15	225,704
31	1	13,675	60	16	273,223
32	0	0	61	19	389,597
33	0	0	62	9	130,944
34	0	0	63	29	451,291
35	0	0	64	20	363,551
36	2	29,201	65	20	308,266
37	0	0	66	31	532,718
38	1	11,876	67	30	518,738
39	2	28,796	68	24	395,198
40	2	24,417	69	27	362,154
41	4	54,936	70	39	575,986
42	1	9,830	71	40	500,052
43	1	11,855	72	56	766,719
44	4	68,556	73	57	767,376
45	5	69,679	74	60	795,133
46	2	35,209	75	44	583,869
47	3	46,743	76	66	867,004
48	2	30,175	77	48	602,351
49	1	9,313	78	45	610,598
50	1	8,400	79	48	572,690
51	4	74,348	80	44	446,830
52	11	159,002	81	54	602,897
53	6	106,905	82	29	339,512
54	6	82,304	83	51	527,182
55	6	71,079	84	47	513,008
56	7	99,258	85+	273	2,678,223
57	10	136,497			
			Total	1,330	\$16,997,510

EXHIBIT G
SHOWING STATISTICS ON MISCELLANEOUS ANNUITIES
FOR FISCAL YEAR ENDING DECEMBER 31, 2002

	No.	Annual Payments
Children's Annuities	121	\$798,300
Widows' Compensation Annuities	85	3,661,229
Ordinary Disability Benefits	2	49,060
Occupational Disease Disability Benefits	144	5,551,918
Duty Disability Benefits	257	9,099,423
Parent Annuities	1	9,009
Totals	610	\$19,168,939

EXHIBIT H – PART I
SHOWING MALE PARTICIPANTS RECEIVING DUTY DISABILITY
CLASSIFIED BY AGE AND LENGTH OF SERVICE AS OF DECEMBER 31, 2002

ATTAINED AGE	Under 1 Year		1 to 4		5 to 9		10 to 14		15 to 19		20 & Over		Total	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 30													0	\$ 0
30 to 34													0	0
35 to 39			1	36,459	1	34,263	3	122,441					5	193,163
40 to 44			4	103,055	8	242,984	8	292,977	2	86,000	1	49,680	23	774,696
45 to 49			3	69,803	11	298,325	19	598,154	8	323,802	8	360,626	49	1,650,710
50 to 54			2	59,138	9	252,813	17	504,777	7	288,896	9	423,194	44	1,528,818
55 to 59			1	26,544	1	30,114	9	264,215	10	313,803	36	1,562,254	57	2,196,930
60 & over					2	50,052	6	175,926	7	210,644	33	1,331,786	48	1,768,408
Totals	0	\$0	11	\$294,999	32	\$908,551	62	\$1,958,490	34	\$1,223,145	87	\$3,727,540	226	\$ 8,112,725

EXHIBIT H – PART II
SHOWING FEMALE PARTICIPANTS RECEIVING DUTY DISABILITY
CLASSIFIED BY AGE AND LENGTH OF SERVICE AS OF DECEMBER 31, 2002

ATTAINED AGE	Under 1 Year		1 to 4		5 to 9		10 to 14		15 to 19		20 & Over		Total	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 30													0	\$ 0
30 to 34													0	0
35 to 39			1	28,211			1	38,835					2	67,046
40 to 44			1	22,959	1	27,288	2	82,733	1	42,786			5	175,766
45 to 49					3	88,320	7	212,849			1	45,383	11	346,552
50 to 54					4	107,024	3	101,678			1	39,227	8	247,929
55 to 59			1	20,966	1	27,111	1	27,666	2	73,668			5	149,411
60 & over													0	0
Totals	0	\$0	3	\$72,136	9	\$249,743	14	\$463,761	3	\$116,454	2	\$84,610	31	\$ 986,704

EXHIBIT I – PART I
SHOWING MALE PARTICIPANTS RECEIVING ORDINARY DISABILITY
CLASSIFIED BY AGE AND LENGTH OF SERVICE AS OF DECEMBER 31, 2002

ATTAINED AGE	Under 1 Year		1 to 4		5 to 9		10 to 14		15 to 19		20 & Over		Total	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 30													0	\$ 0
30 to 34													0	0
35 to 39													0	0
40 to 44									1	26,312			1	26,312
45 to 49											1	22,748	1	22,748
50 to 54													0	0
55 to 59													0	0
60 & over													0	0
Totals	0	\$0	0	\$0	0	\$0	0	\$0	1	\$26,312	1	\$22,748	2	\$ 49,060

EXHIBIT I – PART II
SHOWING FEMALE PARTICIPANTS RECEIVING ORDINARY DISABILITY
CLASSIFIED BY AGE AND LENGTH OF SERVICE AS OF DECEMBER 31, 2002

ATTAINED AGE	Under 1 Year		1 to 4		5 to 9		10 to 14		15 to 19		20 & Over		Total	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 30													0	\$ 0
30 to 34													0	0
35 to 39													0	0
40 to 44													0	0
45 to 49													0	0
50 to 54													0	0
55 to 59													0	0
60 & over													0	0
Totals	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0	0	\$ 0

EXHIBIT J – PART I
SHOWING MALE PARTICIPANTS RECEIVING OCCUPATIONAL DISEASE DISABILITY
CLASSIFIED BY AGE AND LENGTH OF SERVICE AS OF DECEMBER 31, 2002

ATTAINED AGE	Under 1 Year		1 to 4		5 to 9		10 to 14		15 to 19		20 & Over		Total	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 30													0	\$ 0
30 to 34													0	0
35 to 39													0	0
40 to 44													0	0
45 to 49							3	97,497	1	34,798	4	150,096	8	282,391
50 to 54							1	32,087	5	168,029	9	342,790	15	542,906
55 to 59							3	88,605	5	161,095	52	2,149,773	60	2,399,473
60 & over							2	59,547	5	138,745	53	2,093,612	60	2,291,904
Totals	0	\$0	0	\$0	0	\$0	9	\$277,736	16	\$502,667	118	\$4,736,271	143	\$ 5,516,674

EXHIBIT J – PART II
SHOWING FEMALE PARTICIPANTS RECEIVING OCCUPATIONAL DISEASE DISABILITY
CLASSIFIED BY AGE AND LENGTH OF SERVICE AS OF DECEMBER 31, 2002

ATTAINED AGE	Under 1 Year		1 to 4		5 to 9		10 to 14		15 to 19		20 & Over		Total	
	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments	No.	Annual Payments
UNDER 30													0	\$ 0
30 to 34													0	0
35 to 39													0	0
40 to 44													0	0
45 to 49													0	0
50 to 54													0	0
55 to 59					1	35,244							1	35,244
60 & over													0	0
Totals	0	\$0	0	\$0	1	\$35,244	0	\$0	0	\$0	0	\$0	1	\$ 35,244

EXHIBIT K HISTORY OF AVERAGE ANNUAL SALARIES

Year End	Members in Service ¹	Current Year			Average		Actuarial Assumptions	CPI Chicago
		Increase	Salary	Increase	Salary	Increase		
1972	4,647	--	68,371,056	--	14,713	--	3.5%	3.0%
1973	4,743	2.1%	71,356,838	4.4%	15,045	2.3%	3.5%	6.3%
1974	4,587	(3.3)%	74,052,960	3.8%	16,144	7.3%	3.5%	10.6%
1975	4,484	(2.2)%	81,108,696	9.5%	18,088	12.0%	5.0%	8.0%
1976	4,321	(3.6)%	83,776,152	3.3%	19,388	7.2%	5.0%	4.7%
1977	4,434	2.6%	89,614,440	7.0%	20,211	4.2%	5.0%	6.3%
1978	4,478	1.0%	94,615,320	5.6%	21,129	4.5%	5.0%	8.5%
1979	4,297	(4.0)%	97,074,696	2.6%	22,591	6.9%	5.0%	12.5%
1980	5,054	17.6%	116,136,192	19.6%	22,979	1.7%	5.0%	14.5%
1981	4,884	(3.4)%	122,107,512	5.1%	25,002	8.8%	5.0%	9.5%
1982	4,834	(1.0)%	134,633,208	10.3%	27,851	11.4%	6.0%	6.9%
1983	5,294	9.5%	162,697,584	20.8%	30,732	10.3%	6.0%	4.0%
1984	5,147	(2.8)%	160,434,312	(1.4)%	31,170	1.4%	6.0%	3.8%
1985	5,047	(1.9)%	157,426,898	(1.9)%	31,192	0.1%	6.0%	3.8%
1986	5,103	1.1%	176,451,816	12.1%	34,578	10.9%	6.0%	2.1%
1987	5,183	1.6%	186,840,432	5.9%	36,049	4.3%	6.0%	4.1%
1988	5,233	1.0%	188,093,568	0.7%	35,944	(0.3)%	6.0%	3.9%
1989	5,231	0.0%	194,241,480	3.3%	37,133	3.3%	6.0%	5.0%
1990	5,337	2.0%	211,869,720	9.1%	39,698	6.9%	6.0%	5.4%
1991	5,323	(0.3)%	227,649,000	7.4%	42,767	7.7%	6.0%	4.0%
1992	5,204	(2.2)%	223,578,000	(1.8)%	42,963	0.5%	6.0%	3.0%
1993	4,710	(8.1)%	202,080,072	(8.8)%	42,904	(0.8)%	6.0%	3.0%
1993 ²	5,124	(1.5)%	221,600,136	(0.9)%	43,247	0.7%	6.0%	3.0%
1994 ³	4,753	0.9%	226,703,496	12.2%	47,697	11.2%	6.0%	2.2%
1995	4,678	(1.6)%	228,604,584	0.8%	48,868	2.5%	6.0%	3.2%
1996	4,806	2.7%	233,033,832	1.9%	48,488	(0.8)%	6.0%	2.7%
1997	4,856	1.0%	234,726,936	0.7%	48,338	(0.3)%	5.0%	2.7%
1998	4,783	(1.5)%	262,248,978	11.7%	54,829	13.4%	5.0%	1.5%
1999	4,855	1.5%	271,335,540	3.5%	55,888	1.9%	5.0%	2.6%
2000	4,878	0.5%	275,106,756	1.4%	56,397	0.9%	5.0%	4.0%
2001	4,930	1.1%	277,964,912	1.0%	56,382	0.0%	5.0%	0.8%
2002 ⁴	4,910	(0.4)%	277,053,144	(0.3)%	56,426	0.1%	5.0%	2.5%
Average Increase (Decrease) for the last 5 years:		0.2 %		3.5 %		3.3 %		2.3 %

¹ Includes those members who were on disability through 1994.

² Restates without disabilities for comparison. Percent increases (decreases) are based on change from with disabilities to without disabilities in 1994.

³ Beginning in 1994, occupational disease and duty disability beneficiaries are no longer included as actives. Without disabilities included in 1993, there would have been 4,710 actives with total salaries of \$202,080,072 and an average salary of \$42,904. The percent increase from 1993 to 1994 without disability beneficiaries in either year would be 0.9% for members in service, 12.2% for total salary, and 11.2% for average salary.

⁴ Average annual increase in average salary 1972-2002, is about 4.6% compounded. The average annual increase in the annual average Chicago CPI for the same period is about 5.1% compounded.

EXHIBIT L
NEW ANNUITIES GRANTED DURING 2002

	Annuitants	Widows/ Widowers of Deceased Employees ¹	Widows/ Widowers of Deceased Annuitants	Compensation Widows/ Widowers ³
Number retired/deceased	107	6	67	1
Average age attained [Employee]	59.8	52.6	75.3	71.5
Average length of service	31.3	24.1	29.9	
Average spouse age	57.6	50.8	71.7	70.8
Average annual salary [4 out of 10]	\$ 64,560	N/A	N/A	N/A
Average annual final salary	\$ 65,871	N/A	N/A	N/A
Total annual annuity	4,851,988	126,253	1,190,364	37,539
Average annual annuity	45,346	21,042	17,767	37,539
Total statutory liability	\$ 65,148,551	2,075,007	11,620,459	444,534
Average liability	\$ 608,865	\$ 345,835	\$ 173,440	\$ 444,534
Total investment [Employee-paid for tax purposes]	\$ 7,549,068	N/A	N/A	N/A
Average investment ²	\$ 70,552	N/A	N/A	N/A
Liability/cost	8.63	N/A	N/A	N/A
Liability/final pay	\$ 9.24	N/A	N/A	N/A

¹ Not including compensation or supplemental.

² Based on previously taxed contributions.

³ Does not include transfers from supplemental widows.

EXHIBIT M
RETIREES AND BENEFICIARIES BY TYPE OF BENEFIT

Years	ANNUITANTS						DISABILITY			Widow/ Widower Comp.	Total
	Employee	Disability Pensioner	Spouse	Supplemental Wid/Widower	Child	Parent	Ordinary	Duty	Occup.		
1981	1,777	8	1,229	77	149	3	9	172	189	46	3,659
1982	1,784	4	1,231	78	142	3	15	184	198	43	3,682
1983	1,786	3	1,241	84	122	2	12	187	196	42	3,675
1984	1,813	3	1,228	79	129	2	6	199	198	44	3,701
1985	1,884	2	1,224	77	129	2	6	211	191	49	3,775
1986	2,025	1	1,233	75	126	2	5	226	158	56	3,907
1987	2,080	1	1,236	87	121	2	7	233	143	46	3,956
1988	2,180	1	1,245	83	115	2	9	216	117	43	4,011
1989	2,235	1	1,237	68	108	1	8	235	122	55	4,070
1990	2,242	0	1,248	67	106	1	11	253	133	51	4,112
1991	2,226	0	1,264	65	121	1	14	267	143	49	4,150
1992	2,261	0	1,277	68	113	1	11	286	147	40	4,204
1993	2,257	0	1,291	69	114	1	10	274	140	35	4,191
1994	2,207	0	1,316	66	114	2	6	284	142	36	4,173
1995	2,248	0	1,332	62	110	1	8	297	144	40	4,242
1996	2,257	0	1,328	61	110	1	8	292	169	44	4,270
1997	2,235	0	1,348	60	111	1	11	296	194	46	4,302
1998	2,251	0	1,360	56	125	2	8	295	197	49	4,343
1999	2,351	0	1,450	56	139	2	5	295	203	49	4,550
2000	2,538	0	1,440	51	132	2	6	257	139	49	4,614
2001 ¹	2,422	0	1,330	0	116	2	2	262	147	89	4,370
2002	2,411	0	1,330	0	121	1	2	257	144	85	4,351

¹ In 2002 all Supplemental Widows were moved into the Compensation Widows Group.

EXHIBIT N
AVERAGE EMPLOYEE RETIREMENT BENEFITS PAYABLE

Years Ended	Average Annual Benefit	Average Current Age of Retirees	Average Annual Benefit at Retirement Current Year	Average Age at Retirement Current Year	Average Years of Service at Retirement Current Year
1981	\$ 10,266	67	\$ 16,551	59.2	29.8
1982	11,083	67	15,862	59.0	28.3
1983	11,749	68	19,351	60.8	30.2
1984	13,012	68	21,401	59.4	30.5
1985	14,243	68	22,897	59.1	30.4
1986	15,635	68	24,826	58.6	29.8
1987	16,833	68	26,342	59.1	30.4
1988	18,476	68	28,166	61.4	31.1
1989	19,732	68	29,967	60.4	31.1
1990	20,853	68	30,038	60.3	30.9
1991	21,942	69	30,983	60.0	31.4
1992	23,503	69	32,758	59.9	31.3
1993	25,031	69	34,267	61.6	31.7
1994	26,262	70	34,391	59.8	31.2
1995	27,935	70	38,872	60.3	32.1
1996	29,304	70	40,406	60.4	32.0
1997	30,787	70	41,543	59.8	31.6
1998	32,503	71	43,905	60.1	32.1
1999	34,067	71	44,001	60.4	31.4
2000	36,458	71	48,534	63.5	34.2
2001	38,048	71	45,768	60.2	30.9
2002	40,052	71	45,346	56.7	27.7

EXHIBIT O – PART I
HISTORY OF ANNUITIES 1977-2002
EMPLOYEE ANNUITANTS (MALE AND FEMALE)

Year End	Number of Annuitants	Total Annuities	Average Annuities
1977	1,531	\$ 11,489,466	\$ 7,505
1978	1,622	13,321,159	8,213
1979	1,691	15,196,774	8,987
1980	1,738	16,834,908	9,686
1981	1,785	18,324,696	10,266
1982	1,788	19,816,065	11,083
1983	1,789	21,018,158	11,749
1984	1,816	23,648,174	13,022
1985	1,886	26,863,056	14,243
1986	2,026	31,676,856	15,635
1987	2,081	35,030,176	16,833
1988	2,181	40,296,025	18,476
1989	2,235	44,101,893	19,732
1990	2,242	46,752,084	20,853
1991	2,226	48,843,715	21,942
1992	2,261	53,140,074	23,503
1993	2,257	56,495,862	25,031
1994	2,207	57,960,522	26,262
1995	2,248	62,797,419	27,935
1996	2,257	66,139,690	29,304
1997	2,235	68,808,890	30,787
1998	2,251	73,163,601	32,503
1999	2,351	80,090,897	34,067
2000	2,538	92,529,624	36,458
2001	2,422	92,152,832	38,048
2002	2,411	96,565,842	40,052

EXHIBIT O – PART II
HISTORY OF ANNUITIES 1977-2002
WIDOW/WIDOWER ANNUITANTS
(INCLUDING PARENT BUT NOT COMPENSATION ANNUITANTS)

Year End	Number of Annuitants	Total Annuities	Average Annuities
1977	1,239	\$ 3,304,974	\$ 2,667
1978	1,254	3,462,000	2,761
1979	1,294	3,635,109	2,809
1980	1,322	3,770,964	2,852
1981	1,309	4,390,509	3,354
1982	1,312	5,007,540	3,817
1983	1,327	5,220,709	3,934
1984	1,309	5,203,409	3,975
1985	1,303	5,328,940	4,090
1986	1,310	5,843,911	4,461
1987	1,325	6,273,158	4,734
1988	1,330	6,617,019	4,975
1989	1,319	7,743,932	5,871
1990	1,316	8,031,199	6,103
1991	1,330	9,316,132	7,005
1992	1,346	10,774,709	8,005
1993	1,361	12,121,722	8,906
1994	1,384	13,680,765	9,885
1995	1,395	14,495,633	10,391
1996	1,389	14,709,232	10,590
1997	1,409	15,397,832	10,928
1998	1,418	15,969,975	11,262
1999	1,508	18,136,173	12,027
2000	1,493	18,352,906	12,293
2001	1,332	16,516,021	12,399
2002	1,331	17,006,519	12,777

EXHIBIT P
HISTORY OF RETIREES AND BENEFICIARIES
ADDED TO AND REMOVED FROM BENEFIT PAYROLL

Yr.	Added to Payroll		Removed from Payroll		Payroll End of Year		Average Annual Benefits	Increase to Avg. Benefits
	No.	Annual Benefits.	No.	Annual Benefits	No.	Annual Benefits		
Employee Annuitants (Male and Female)								
1994	64	\$3,884,646	114	\$2,419,986	2,207	\$57,960,532	\$26,262	4.9%
1995	143	7,076,962	102	2,240,065	2,248	62,797,429	27,935	6.4
1996	101	5,578,794	92	2,236,533	2,257	66,139,690	29,304	4.9
1997	98	5,578,537	120	2,909,337	2,235	68,808,890	30,787	5.1
1998	122	5,356,352	106	2,446,381	2,251	73,163,601	32,503	5.6
1999	118	5,192,157	18	245,975	2,351	80,090,897	34,067	4.8
2000	265	12,861,578	78	2,413,778	2,538	92,529,624	36,458	7.0
2001	114	5,171,784	230	5,548,576	2,422	92,152,832	38,048	4.4
2002	107	4,851,988	118	438,978	2,411	96,565,842	40,052	5.3
Widow/Widower Annuitants (Not Including Compensation)								
1994	90	\$2,145,835	67	\$586,792	1,384	\$13,680,765	\$9,885	11.0%
1995	97	1,592,509	86	777,641	1,395	14,495,633	10,391	5.1
1996	64	860,178	70	646,579	1,389	14,709,232	10,590	1.9
1997	91	1,314,596	71	625,996	1,409	15,397,832	10,928	3.2
1998	86	1,188,236	73	778,838	1,418	15,969,975	11,262	3.1
1999	82	1,268,687	0	0	1,508	18,136,173	12,027	6.8
2000	70	1,204,364	85	987,631	1,493	18,352,906	12,293	2.2
2001	127	1,865,460	288	3,702,345	1,332	16,516,021	12,399	0.9
2002 ¹	73	1,316,617	74	826,119	1,331	17,006,519	12,777	3.0

¹ Including Parent Annuitants but not Compensation Annuitants

Appendix 4

Actuarial Methods and Assumptions as of December 31, 2002

ACTUARIAL METHODS AND ASSUMPTIONS
AS OF DECEMBER 31, 2002

I. ACTUARIAL COST METHOD

An Actuarial Cost Method is a set of techniques used by the actuary to develop contribution levels under a retirement plan. The Actuarial Cost Method used in this valuation for all purposes is the Entry Age Actuarial Cost Method. Under this Method, a Normal Cost is developed by amortizing the actuarial value of benefits expected to be received by each active participant over the total working lifetime of that participant, from hire to termination.

To the extent that current assets and future Normal Costs do not support participants' expected future benefits, an Unfunded Actuarial Accrued liability ("UAAL") develops. The UAAL is generally amortized over a defined period of time (e.g. 40 years) The total contribution developed under this method is the sum of the Normal Cost and the payment toward the UAAL.

II. CURRENT ACTUARIAL ASSUMPTIONS

A. Demographic Assumptions

Mortality: 1983 Group Annuity Mortality Table set forward three years for males and set back three years for females.

Disabled Mortality: 1992 Railroad Retirement Board's Disabled Annuitant's Mortality Table.

Rates of Disability: Rate at which members are assumed to become disabled under the provisions of the Fund. The rates assumed are as follows:

Attained	Entry Ages			
	Under 25	25-29	30-34	35 & Over
Age				
20-46	.01	.01	.01	.01
47-49	.01	.01	.01	.02
50-54	.02	.04	.02	.02
55-59	.02	.04	.03	.07
60-64	.03	.04	.05	.07
65 & over	.05	.04	.05	.07

Of the participants who become disabled, 55% are assumed to be duty disability and 45% are assumed to be occupational disease disability.

**ACTUARIAL METHODS AND ASSUMPTIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

Rate of Retirement:

The rates at which members are assumed to retire under the provisions of the Fund have been modified to reflect the mandatory retirement age of 63 for all firefighters except emergency medical technicians. The two tables below show the assumed rates of retirement.

Attained Age	Entry Ages			
	Under 25	25-29	30-34	35 & Over
50	.15	.10	.00	.00
51	.03	.05	.10	.00
52	.03	.05	.03	.00
53	.03	.05	.03	.00
54	.10	.05	.03	.00
55	.10	.10	.04	.00
56	.10	.10	.04	.00
57	.15	.10	.05	.00
58	.15	.10	.05	.00
59	.15	.10	.05	.00
60	.20	.20	.05	.00
61	.20	.20	.06	.00
62	.20	.20	.06	.00
63	1.00	1.00	1.00	1.00

The rates for EMT's are as follows:

Attained Age	Entry Ages			
	Under 25	25-29	30-34	35 & Over
50	.15	.10	.00	.00
51	.03	.05	.10	.00
52	.03	.05	.03	.00
53	.03	.05	.03	.00
54	.10	.05	.03	.00
55	.10	.10	.04	.00
56	.10	.10	.04	.00
57	.15	.10	.05	.00
58	.15	.10	.05	.00
59	.15	.10	.05	.00
60	.20	.20	.05	.00
61	.20	.20	.06	.00
62	.20	.20	.06	.05
63	.20	.15	.20	.05
64	.20	.15	.20	.05
65	.30	.30	.20	.30
66	.30	.30	.20	.30
67	.30	.30	.20	.40
68	.30	.30	.20	.40
69	.30	.30	.20	.40
70	1.00	1.00	1.00	1.00

**ACTUARIAL METHODS AND ASSUMPTIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

Rate of Termination: The following sample rates exemplify the table:

Attained	Entry Ages		
	Age	Under 25	25-29
22	.045	.000	.000
27	.026	.024	.000
32	.015	.015	.021
37	.008	.008	.013
42	.003	.002	.005
47	.001	.000	.001
52	.000	.000	.001

B. *Economic Assumptions*

Investment Return Rate: 8.0% per annum (net of investment expense). This assumption contains a 3.0% inflation assumption and a 5.0% real rate of return assumption.

Future Salary Increases: Assumed rates of individual salary increase at 5.0% per year. The salary assumption includes a 3.0% wage inflation and 2.0% merit and longevity assumption.

Asset Value: For State reporting, the actuarial value of assets is smoothed by using a five-year average market value.

For GASB #25 and #27, the actuarial value of assets is smoothed by using a five-year average market value.

C. *Other Assumptions*

Marital Status: It is assumed that 85% of members have an eligible spouse. The male spouse is assumed six years older than the female spouse. No assumption is made about other dependents.

**ACTUARIAL METHODS AND ASSUMPTIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

Group Health Insurance:	It is assumed for valuation purposes that the current health insurance supplement will continue for life for all employee annuitants (and their future widows/widowers). The amount of the Fund paid health insurance from January 1, 1993 until June 30, 2003 is \$75.00 per month for each annuitant (employees and widows/widowers) not qualified to receive Medicare benefits and \$45.00 if qualified. It is assumed that all annuitants age 65 and over will be eligible for Medicare and all annuitants less than age 65 will not be eligible for Medicare. Future widows of retirees are assumed to be eligible for Medicare, as well as widow annuitants that are currently receiving a health insurance supplement.
Required Ultimate Multiple:	It is based on the actuarial requirements (adjusted for tax levy loss) less expected employee contributions divided by the actual employee contributions made in the second prior year.
Loss in Tax Levy:	4% overall loss on tax levy is assumed.

Appendix 5

Summary of Provisions of the Fund as of December 31, 2002

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002**

PARTICIPANTS

Person employed by the City of Chicago in its fire service as firefighter, fire paramedic, fire engineer, marine engineer, or fire pilot, whose duty it is to participate in the work of controlling and extinguishing fire at the location of any such fire, whether or not he is assigned to fire service other than the actual extinguishing of fire.

SERVICE

In computing service, the following periods shall be counted:

All periods of active service, vacation, leave of absence with whole or part pay, military service, periods of disability for which he receives disability benefit, and leave of absence without pay to perform the duties of a member of the General Assembly prior to January 9, 1997. It is computed on a day to day basis. Employees may purchase the 1980-strike time and periods of suspension less than one year. Employees may purchase, with 4% interest, periods of employment of the Chicago Fire Department from 1970 until the employee entered this fund.

RETIREMENT ANNUITY

Eligibility

Attainment of age 50 with at least 10 years of service.

Mandatory

Retirement is mandatory for a participant who has attained age 63, except for emergency medical technicians.

Accumulation Annuity

At age 50 or more, with 10 or more years of service, the employee is entitled to an annuity based on the sums accumulated for age and service annuity plus 1/10 of the sum accumulated from the contributions by the City for the age and service annuity for each completed year of service after the first 10 years. At age 50 or more with 20 or more years or at age 63, the employee is entitled to an annuity based on all sums accumulated to his or her credit. The maximum is 75 % of highest salary.

Minimum Formula Annuity

- (1) At age 53 and 23 years of service the employee is entitled to 50%, plus 1% for each year of service after 23 years and before age 53, plus 2 % for each year of service after 23 years and age 53, of final average salary (highest 4 consecutive years within last 10). Maximum is 75% of highest salary.

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

- (2) In lieu of the above annuity, if the employee has 20 or more years of service (the annuity will begin no earlier than age 50), he or she is entitled to the following annuity if it is greater than (1) above: 50% plus 2% of the final average salary for each year or fraction of service over twenty years. Maximum is 75% of the final average salary.

Retirement at Age 63 with Less than 23 Years Service¹

An employee who reaches compulsory retirement age with less than 23 years shall be entitled to a minimum annuity equal to an amount determined by the product of his or her years of service and 2% of his or her average salary for the 4 consecutive highest years of salary within the last 10 years. Maximum is 75 % of highest salary.

Automatic Increase in Annuity

If an employee qualifies for a minimum formula annuity, 1.5% of the original annuity, starting on the first of the month one year after retirement or the first of the month following attainment of age 60 (age 55 if born before January 1, 1945, effective January 1, 1996), whichever is later, with a maximum of 30% (20 years). Such increases shall be 3% for firefighters born before January 1, 1945 (effective January 1, 1996), and such firefighters shall not be subject to the 30% maximum increase.

Minimum Annuity

Beginning January 1, 1990, the monthly annuity for any firefighter who has retired at age 50 or over with 20 or more years of service shall be not less than \$475. Beginning January 1, 1992, the monthly annuity is \$650 if the firefighter retired at age 50 or over with at least 20 years of service. Beginning January 1, 1993, the monthly annuity is \$750 if the firefighter retired at age 50 or over with at least 20 years of service. Beginning January 1, 1994, the monthly annuity is \$850 if the firefighter retired at age 50 or over with at least 20 years of service.

WIDOW/WIDOWER ANNUITY

Payable until remarriage if widow/widower remarries before age 60, except Compensation and Supplemental Annuities. If the annuity is suspended because the widow/widower remarries before age 60, annuity payments will be resumed if the subsequent marriage ends. Any widow/widower's annuity, which was suspended on account of remarriage prior to December 31, 1989, will be resumed, if subsequent marriage ends, the later of July 14, 1995 or when the marriage ended.

¹ Between January 1994 and December 2000, benefits have been administered as if there were no compulsory retirement age. Beginning December 2000 benefits have been administered as if age 63 is the compulsory retirement age for non-EMT participants and there is no compulsory retirement age for EMT participants.

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

Death in Service (Non-Duty)

- (1) If the firefighter dies with at least 1.5 years of service, 30% of the salary attached to the rank of a first class firefighter in the classified career service at the time of the firefighter's death; or,
- (2) 50% of the annuity the deceased firefighter would have received if he had retired just prior to the date of death; or,
- (3) money purchase based on the total salary deductions and City contributions for age and service annuity and widow/widower's annuity.

Death In Service (Duty Related)

Compensation Annuity²

The annuity paid to the spouse equals 75% of the firefighter's salary attached to his civil service position at the time of his death payable until the date the firefighter would have attained compulsory retirement age. This amount increases as the salary of the position increases.

Supplemental Annuity²

Payable thereafter in the amount of 40% of the salary attached to the employee's civil service position at the time of his death. This amount increases as the salary of the position increases.

Death after Retirement

- (1) If the firefighter dies after retirement, the annuity is 50% of the retirement annuity that the deceased firefighter was receiving at the time of his or her death; or,
- (2) money purchase based on the sums accumulated for the spouse annuity plus 10% of the accumulated City contributions for each year of service from 10 to 20 years, and full accumulated City contributions after 20 years of service.

Maximum Annuity

No maximum dollar amount.

Minimum Annuity

The minimum monthly annuity for any widow/widower on annuity on January 1, 1992 or future widow/widowers of employees on annuity, who retired at age 50 or more with at least 20 years of service, is \$500. Beginning January 1, 1993, the minimum monthly annuity for a widow/widower of an employee who retired at age 50 or more with at least 20 years of service is \$600. Beginning January 1, 1994, the minimum monthly annuity for a widow/widower of an employee who retired at age 50 or more with at least 20 years of service is \$700. Beginning January 1, 1996, the minimum monthly annuity for any widow/widower who is entitled to an annuity is \$700. Beginning January 1, 1999, the minimum monthly annuity for any widow/widower who is a survivor of an employee who retired at age 50 or over with at least 20 years of service is \$800.

² Between January 1994 and December 2000, benefits have been administered as if there were no compulsory retirement age. Beginning December 2000 benefits have been administered as if age 63 is the compulsory retirement age for non-EMT participants and there is no compulsory retirement age for EMT participants.

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

CHILD ANNUITY

Upon the death of the firefighter, unmarried children less than age 18 (except where child is so physically or mentally handicapped as to be unable to support himself), who have been born or legally adopted and at least one year prior to death or withdrawal (except if duty death, then no one year limit on adoption). The amount of annuity payable for a child is 10% of the current annual maximum salary of a first class firefighter while a widow/widower survives; 15 % when no widow/widower survives.

FAMILY MAXIMUM

The total annuities for widow/widower and children cannot exceed 60% for non-duty death, or 100% for duty death, of the current maximum annual salary of a first class firefighter.

PARENT ANNUITY

Parent's annuity is provided for each surviving parent of a firefighter who dies prior to separation from service, or while out of service with at least 20 years; provided there is no widow/widower or child and that the deceased firefighter was contributing to their support. The benefit is an amount equal to 18% of the current annual salary attached to the classified position held by the firefighter at the time of death.

DISABILITIES

Duty Disability Benefit³

Injury incurred in the performance of duty. The amount of the benefit is 75 % of salary at the time the disability is allowed payable to employee's compulsory retirement age plus \$30 per month for each unmarried child less than age 18 (except where the child is so physically or mentally handicapped as to be unable to support him/herself), but the total amount of child benefits shall not exceed 25% of salary. Effective January 1, 1994 the minimum benefit, if the employee has been on disability at least 10 years, is 50% of current salary at the rank held by the employee when he was removed from the Department payroll. Salary deductions are contributed by the City. There are no age or service requirements for retirement on money purchase annuity and receiving full contributions.

Occupational Disease Disability³

A firefighter who has 10 or more years of service and is unable to perform his or her duties by reason of heart disease, tuberculosis, or any disease of the lungs or respiratory tract, resulting solely from his or her service as a firefighter. Occupational disease also includes disabling cancer of the type which may be caused by exposure to heat, radiation or a known carcinogen as defined by the International Agency for Research on Cancer. The amount of the benefit is 65% of salary at the time of the employee's removal from the Department payroll payable to compulsory retirement age plus \$30 a month for each unmarried child less than age 18 (except where the child is so physically or mentally

³ Between January 1994 and December 2000, benefits have been administered as if there were no compulsory retirement age. Beginning December 2000 benefits have been administered as if age 63 is the compulsory retirement age for non-EMT participants and there is no compulsory retirement age for EMT participants.

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

handicapped as to be unable to support him/ herself), but the total amount of child's benefits shall not exceed 25 % of salary. Effective January 1, 1994 the minimum benefit, if the employee has been on disability at least 10 years, is 50% of current salary at the rank held by the employee when he or she was removed from Department payroll. Salary deductions are contributed by the City. There are no age or service requirements for retirement on money purchase annuity and receiving full contributions.

Ordinary Disability Benefit

Cause other than the performance of an act of duty, payable after 30 days for a period equal to 50% of total service (not including any previous O.D. time), but not to exceed 5 years. The disability benefit is 50% of salary at time of disability less pension deductions. When the disabled firefighter becomes eligible for the minimum formula annuity, the disability benefit shall cease, and he or she shall thereafter receive an annuity; however, there are no age or service requirements to retire on money purchase from disability prior to qualification for the minimum formula annuity if the disability then terminates.

DEATH BENEFIT

In active service, on an authorized leave of absence, if death occurs within 60 days of receipt of salary, receiving duty or ordinary disability benefit, occurring within 60 days of termination of such benefit, or occurring on retirement while in receipt of annuity and separation was effective after age 50 and application was made within 60 days from separation; payable to written beneficiaries or, if none, to estate.

<u>Age</u>	<u>Death in Service After July 1, 1983</u>	<u>Death After Retirement After July 1, 1983</u>
49 and under	\$12,000	\$6,000
50	11,600	6,000
51	11,200	6,000
52	10,800	6,000
53	10,400	6,000
54	10,000	6,000
55	9,600	6,000
56	9,200	6,000
57	8,800	6,000
58	8,400	6,000
59	8,000	6,000
60	7,600	6,000
61	7,200	6,000
62	6,800	6,000
63	6,400	6,000
64 and over	6,000	6,000

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

GROUP HEALTH HOSPITAL AND SURGICAL INSURANCE PREMIUMS

The pension fund may provide up to a maximum of \$75 per month for non-Medicare eligible annuitants (employees or widow/widowers, without regard to age or years of service) and up to \$45 per month for Medicare eligible annuitants until June 30, 2003.

REFUNDS

To Firefighters

Of entire amount (excluding ordinary disability pension deductions) with interest at 4% if entered before June 30, 1953, and 3% otherwise, before age 50, or before age 57 and less than 10 years service. A firefighter who receives a refund and who subsequently reenters the service shall not receive, nor his or her widow/widower or parents, any annuity benefit or pension unless the refund is repaid with 4% interest. Repayment must be made within two years after reentry.

FOR WIDOW/WIDOWER ANNUITY

If the Firefighter is not married when he retires on annuity, he or she will receive a refund of all his or her contributions, with interest, for spouse's annuity.

REFUNDS OF REMAINING AMOUNTS

If amounts contributed by a Firefighter (with interest) are not paid out to him or her, in the form of a refund or annuity, or his or her widow/widower in the form of annuity, the remaining amounts (with interest) shall be paid out to his or her heirs, or to administrator of estate, for burial expense. If there are children under age 18, amount necessary to pay children annuities will not be refunded. There will be no refund paid to a widow/widower whose annuity is suspended because of remarriage.

DEDUCTIONS AND CONTRIBUTIONS

	<u>Deductions</u>	<u>City Contributions¹</u>
Employee	7.125%	8.500%
Spouse	1.500%	2.000%
Ordinary Disability	0.125%	0.000%
Annuity Increase	<u>0.375%</u>	<u>0.000%</u>
	9.125%	10.500%

¹ credited to participant's Accumulation Annuity and Widow's Annuity accounts

The city shall levy a tax annually at a rate on the dollar of the assessed valuation of all taxable property that will produce an amount not to exceed the total amount of contributions by the firefighters to the Fund made in the calendar year 2 years prior multiplied by 2.26 for 1982 and each year thereafter, plus \$142,000 for the Ordinary Death Benefit.

**SUMMARY OF
PRINCIPAL ELIGIBILITY AND BENEFIT PROVISIONS
AS OF DECEMBER 31, 2002 (CONT'D)**

DEATH BENEFIT

Employees contribute \$2.50 per month at the same time and with the same frequency as other deductions (with each payment of salary).

TAX SHELTER OF EMPLOYEE SALARY DEDUCTIONS

Beginning January 1, 1982, employee contributions were designated for income tax purposes to be made by the employer. The W-2 salary is therefore reduced by the amount of contribution. For pension purposes the salary remains unchanged. Income tax will be paid when a refund or annuity is received. For the purpose of benefits, refunds or financing, these contributions will be treated as employee contributions.

COMPULSORY RETIREMENT AGE

Effective January 1, 1994, the federal law allowing compulsory retirement age 63 has lapsed. As such, duty disability and occupational disease disability benefits and widow/widower compensation benefits may be "open ended", i.e., without limiting age.

Effective December 2000 the City of Chicago enacted a compulsory retirement age of 63 for non-EMT participants. As such, all disability benefits for non-EMT participants cease at age 63 and become payable as retiree benefits.

COMPENSATION WIDOWS

Beginning January 1, 2001, mandatory retirement will have no impact on Widow benefits. Therefore, effective with the December 31, 2001 valuation, all Supplemental Widows have been re-classified as Compensation Widows. The classification of Supplemental Widows has been discontinued.

Appendix 6

Legislative Changes 1968 through 2002

LEGISLATIVE CHANGES 1968 THROUGH 2002

1968 to 1979 Sessions

- Compensation widow/widower annuities changed from \$300 to 75% of salary;
- Supplemental widow/widower annuities became 40% of salary;
- 5-year average salary became 4 years;
- Minimum employee annuities increased from \$200 in stages;
- Minimum widow/widower annuities increased from \$100 in stages;
- Children's annuities changed from \$40/\$60 to 10%/15% of salary of first class firefighter;
- Parent annuities increased to 18% of salary of first class firefighter;
- Lump sum benefits were increases; and
- The deduction from salary increased from 1% to 1.5% of salary for the spouse annuity.

1979 Session

SB 854

Recall of elective members of the Board of Trustees.

HB 291

Authorizes investment in Time Deposits of Certificate of Deposit.

HB 2012

Employer may pick up, under IRS Code Section 414(h), the employee contributions for all compensation earned after December 31, 1980 by a reduction in the cash salary, an offset to a future salary increase, or by a combination of both.

1980 Session

Transfer of credit to the General Assembly System.

HB 3635

Reversed all changes made by HB 2012 and put the pick up section as a new paragraph. They are treated as employee contributions for all purposes including refunds and determination of the tax levy.

1981 Session

SB 21

Actuarial Reporting Standards.

SB 851

Authorizes investments in conventional mortgage pass-through securities.

SB 879

Financial statement required by Department of Insurance within 6 months and actuarial statement within 9 months. \$100 penalty per day if late.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

HB 291

Increase minimum survivor's annuity from \$200 to \$250.

Spring 1982 Session

SB 740

3% post-retirement increase for employees born before January 1, 1930. All increases begin at age 60 instead of age 63 effective July 1, 1982.

SB 1127

Group health hospital and surgical insurance premium \$55 for annuitant not qualified to receive Medicare; \$21 if annuitant is qualified, effective January 1, 1983.

SB 1579

Expanded fiduciary standards, prohibited transactions, civil action may be brought by Attorney General or by a participant. List of permitted investments moved to general section of the statute.

HB 2361

Election by mail ballot.

Spring 1983 Session

SB 22

Delegation of investment authority restrictions.

SB 1147

Minimum reporting and actuarial information for 1984.

HB 366, SB 288

Changes fiduciary standards: party in interest definition; reasonable care of co-fiduciary; eliminates civil action.

HB 377

Cancer as occupational disability.

HB 380

Paramedics as members July 1, 1983.

HB 455

Bill of Rights.

HB 483

Temporary position defined.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

HB 514

10% prudent person investment category.

HB 755

Change in lump sum death benefit: \$6,000 if retired, \$12,000 if active and under age 50, reduced by \$400 each year age 50 or older.

HB 758

Vote by mail.

50/20 2% minimum annuity formula (52/22 in 1984; 51/21 in 1985; 50/20 in 1986 and after).

30% salary of first class firefighter; widow/widower of active employee with 1.5 years of service effective June 30, 1984.

50% of retirement pension being paid (includes increases); widow/widower of retiree effective June 30, 1984.

City Ordinance

Change in lump sum death benefit: \$6,000 if retired, \$12,000 if active and under age 50, reduced by \$400 each year age 50 or older.

Changes compulsory retirement from 63 to 70.

1984 Session

Direct deposit.

Illinois Public Employees' Pension Laws Commission abolished.

1985 Session

HB 164

Occupational disability benefits from 50 % to 65 % of salary for new disabilities.

Survivors' annuity for death in service 50% of the firefighter's annuity as if the deceased firefighter had retired just prior to the date of death.

Removes alcoholism and venereal disease prohibition against paying ordinary disability.

Removes adoption before age 50 requirement for child's benefit.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

1986 Session

HB 2630

Removes the age 18 limitation for handicapped children of duty and occupational disease disability recipients.

Provides for waiver of annual physical examination for disability recipients if firefighter is permanently disabled and unable to ever return to service.

1987 Session

None.

1988 Session—City Ordinance

Compulsory retirement changed to age 63.

1989 Session

HB 332

\$325 minimum widow/widower annuity effective January 1, 1988.

SB 95

Changed the amount of fund paid health insurance “supplement” from January 1, 1988 until December 31, 1992 to \$65 per month for each annuitant not qualified to receive Medicare benefits (and \$35 if qualified) and from January 1, 1993 until December 31, 1997 the amounts are \$75 and \$45, respectively. Widow/widowers will now be eligible for supplement. The City will be required to pay 50% of the aggregate cost of health care claims for the retired group under all health care plans offered by the City. A procedure was established for the City to determine, with the help of an independent actuary, the aggregate cost of claims and premiums for each calendar year from 1989 through 1998 for the retired group.

\$475 minimum employee annuity effective January 1, 1990.

Compensation and Supplemental annuitants may remarry after 1989 without loss of benefits.

Employee refunds must be repaid at 4% before the later of 2 years after the date of reentry or January 1, 1992.

3% postretirement increase beginning January 1, 1990 for employees born after December 31, 1929 and before January 1, 1940.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

Employee may purchase periods of suspension (not to exceed a total of 1 year of service) and 1980 strike time (not to exceed 23 days). Paramedic who transferred from the pension fund established under Article 8 of this Code to this Fund by operation of Public Act 83-780 may purchase Article 8 service at 4% annual compound interest rate prior to January 1, 1992, if the employee received a refund from the Article 8 fund.

1990 Session

SB 136

Amends Chapter 120, Paragraph 671 of the Revenue Act to provide for a separate listing on the tax bill of the dollar amount of tax due from the person assessed, which is allocable to a tax levied under the Illinois Pension Code, or any other tax levied by a municipality or township for public pension or retirement purposes. Effective January 1, 1990.

SB 1951

Signed January 14, 1991. Service credit will be given for any periods prior to January 14, 1993 that an active firefighter who is a member of the General Assembly is absent to perform his legislative duties. No payment is required for this service credit. The current salary of the rank would be used for average salary for annuity purposes.

Any firefighter who had service as a paramedic in the Municipal Fund and received a refund of contributions could receive credit for the service in the Fire Fund by making written application to the Board by January 1, 1992 and paying for the service.

December 31, 1990 any firefighter with at least 20 years of service may withdraw from the service at any age and receive an annuity calculated under Section 6-128 beginning at age 50 if under that age at withdrawal.

Beginning January 1, 1990, the minimum widow/widower annuity is \$400 per month for all those receiving a widow/widower annuity on January 14, 1991 and for future widow/widowers of employees who retired at age 50 or over with at least 20 years of service.

If a widow/widower remarries after December 31, 1989, after attaining age 60, the annuity will continue without interruption. If the annuity is suspended because of remarriage before attaining age 60, annuity payments will be resumed if the subsequent marriage ends.

If any widow/widower receives a widow/widower annuity from the Fire Fund and after December 31, 1989 marries a firefighter in the Fund, his/her first widow/widower annuity will be canceled if she accepts any payment of a second widow/widower's annuity after he dies.

Beginning January 14, 1991, any city officer can transfer his Fire service to the Municipal Fund.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

1991 Session

None.

1992 Session

HB 969

Approved March 26, 1992. Beginning January 1992, the minimum retirement annuity (requires retirement at age 50 or over with at least 20 years of service) was increased to \$650 per month and the minimum widow/widower annuity was increased to \$500 for those receiving annuity and those who will be eligible in the future (requires retirement or death in service at age 50 or over with at least 20 years of service).

SB 1650

Approved January 25, 1993.

The minimum retirement annuity (requires retirement at age 50 with at least 20 years of service) was increased to \$750 per month on January 1, 1993 and \$850 per month on January 1, 1994.

The minimum widow/widower annuity (requires retirement or death in service at age 50 or over with at least 20 years of service) was increased to \$600 per month on January 1, 1993 and \$700 per month on January 1, 1994 for those eligible present and future widow/widowers.

Service credit will be given for any periods in General Assembly prior to January 9, 1997 (instead of January 14, 1993).

The annuitant may waive all or any portion of his annuity.

1993 Session

SB 358

Approved January 10, 1994. Beginning January 1, 1994, minimum Duty and Occupational Disease Disabilities have been established, if the employee has been on the disability for 10 years: 50% of current salary of rank at removal from Department payroll.

ADEA

Effective January 1, 1994, the federal law (ADEA) allowing compulsory retirement at age 63 has lapsed. As such, duty disability and occupational disease disability benefits and widow/widower compensation benefits may be "open ended", i.e., without limiting age.

1994 Session

None.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

1995 Session

SB 114

Approved July 14, 1995.

The minimum widow/widower annuity was increased to \$700 per month for anyone entitled to receive a widow/widower annuity.

A widow/widower's annuity that was previously terminated because of remarriage before December 31, 1989 will be resumed upon proper application if the subsequent marriage has ended.

Employees have until 2 years after the date of reentry or January 1, 2000 to repay a refund.

For employee annuitants born before January 1, 1945, the 3 % postretirement increase begins at age 55.

The provisions relating to purchase of credit for certain periods of service as a paramedic or other fire department employee were changed.

The City is authorized to substitute funds obtained from borrowings and other sources for a portion of its authorized tax levy for pension purposes.

The amount of earnings that may be taken into account by any retirement system is limited to the maximum dollar limitation specified in Section 401(a)(17) of the Internal Revenue Code, except for persons who became participants before 1996.

The Fund is authorized to make certain involuntary distributions required by Section 401(a)(9) of the Internal Revenue Code.

SB 424

Approved July 7, 1995.

The Pension Laws Commission was created as a legislative support services agency.

1996 Session

SBJPA

On August 20, 1996 the Small Business Job Protection Act was signed by President Clinton.

Treatment of governmental plans under Code Section 415:

Rule limiting annual benefit to 100% of the average of the highest 3-year compensation no longer applies.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

Excess benefit plans are permitted to provide participants with benefits in excess of the Code Section 415 limits.

Early retirement reduction does not apply to certain survivor and disability benefits.

The definition of compensation now includes elective deferrals.

Taxation of distributions:

\$5,000 death benefit exclusion was repealed for deaths after August 20, 1996.

Five-year averaging for lump sum distributions was repealed effective January 1, 2000.

Annuity payments will be taxed according to a simplified general rule, which uses investment and age as of annuity starting date for annuities, which start on or after November 19, 1996.

1997 Session

HB 313

Signed June 27, 1997.

Coverage in the City group health insurance is extended through June 30, 2002, with some modification in plans offered. Pension fund supplement remains \$45 and \$75 for Medicare eligible and non-Medicare eligible annuitants respectively.

1998 Union Contract Cost of Living Increases

The following salary increases are scheduled:

1.5% effective July 1, 1995.

1.5% effective January 1, 1996.

1.5% effective July 1, 1996.

3.5% effective January 1, 1997.

3.75% effective January 1, 1998.

2.25% effective January 1, 1999.

1998 Session

The minimum widow/widower annuity (requires retirement or death in service at age fifty or over with at least twenty years of service) was increased to \$800 per month on January 1, 1999 for those eligible present and future widow/widowers.

LEGISLATIVE CHANGES 1968 THROUGH 2002 (CONT'D)

1999 Session

None.

2000 Session

In 2000 the City of Chicago enacted mandatory retirement for all firefighters, except for emergency medical technicians, upon attainment of age 63.

2001 Session

None.

2002 Session

HB 5168

Effective June 28, 2002

The pension fund subsidy for retiree health insurance was extended through June 30, 2003 (other than child annuitants). The subsidy is \$75 per month if the annuitant is not eligible for Medicare and \$45 per month if the annuitant is eligible for Medicare.

Appendix 7

Additional Exhibits

EXHIBIT A-1

GASB #25 AND #27 DISCLOSURES

The Governmental Accounting Standards Board (GASB) has adopted Statement #25, changing the way in which governmental retirement systems must report financial information. GASB #25 is effective for Fund and City reporting in 1997.

GASB #25 and #27 make a number of significant changes to retirement plan reporting. They eliminate the dual reporting of actuarial liabilities that was required under GASB #5. Under GASB #5, many plans including the Fund, reported liabilities determined under one actuarial cost method for internal purposes, but were required to also provide liabilities determined under the Projected Unit Credit method for financial reports. Under GASB #25 and #27, systems select one actuarial method from several acceptable alternatives, and report all information on this one basis.

This report includes the following Exhibits with information required to be reported under GASB #25 and #27.

Exhibit A-2: Schedule of Funding Progress for GASB #25

This exhibit shows a six-year history of funding progress. The funding progress is a comparison of Actuarial Value of Assets with the Actuarial Accrued Liability (AAL), and a comparison of the unfunded AAL (UAAL) with compensation.

Exhibit A-3: Schedule of Employer Contributions for GASB #25

This exhibit shows the Annual Required Contribution (ARC) as computed under GASB #25 and the percent of this amount actually received. This exhibit includes a six-year history.

Exhibit A-4: Supplementary Information for GASB #25 and #27

This exhibit has certain information required in the notes to the Fund and City financial reports.

Exhibit A-5: Annual Pension Cost and Contributions Made for GASB #27

This exhibit shows the components of annual pension cost (ARC, interest on the Net Pension Obligation (NPO), and the adjustment to the ARC), increase or decrease in the NPO and the NPO at the end of the year. The exhibit also includes the dollar amount of contributions made.

Exhibit A-6: Pension Cost Summary for GASB #27

This exhibit shows a six-year summary of annual pension cost, percentage of annual pension cost contributed that year and NPO at the end of the year.

Exhibit A-7: Development of Net Pension Obligation (NPO) at January 1, 1997

This exhibit documents the calculation of the pension liability at transition in accordance with GASB #27.

**EXHIBIT A-2
SCHEDULE OF FUNDING PROGRESS
FOR GASB #25**

Actuarial Valuation Date	Actuarial Value of Assets (a)	Actuarial Accrued Liability (AAL) Entry Age (b)	Unfunded AAL (UAAL) (b - a)	Funded Ratio (a/b)	Covered Payroll (c)	UAAL as a Percentage of Covered Payroll ((b - a) / c)
12/31/2002	\$ 1,209,218,603	\$ 2,088,706,217	\$ 879,487,614	57.89%	\$ 277,053,144*	317.44%
12/31/2001	1,245,129,955	2,068,717,901	823,587,946	60.19	277,964,912	296.29
12/31/2000	1,219,486,962	2,053,340,475	883,853,513	59.39	275,106,756	303.10
12/31/1999	1,145,215,019	1,879,666,868	734,451,849	60.93	271,335,540	270.68
12/31/1998	1,066,891,190	1,783,569,178	716,677,988	59.82	262,248,978	273.28
12/31/1997	978,313,319	1,640,020,672	661,707,353	59.65	234,726,936	281.91

EXHIBIT A-3
SCHEDULE OF EMPLOYER CONTRIBUTIONS
FOR GASB #25

For Year Ending December 31	Annual Required Contribution	Actual Employer Contribution	Percentage Contributed
2003	\$111,123,464	TBD	TBD
2002	105,106,367	58,838,300	55.98%
2001	104,014,168	60,399,909	58.07%
2000	90,530,458	65,928,675	72.82%
1999	87,959,556	53,410,352	60.72%
1998	78,020,603	48,397,527	62.03%

EXHIBIT A-4
SUPPLEMENTARY INFORMATION FOR
GASB #25 AND GASB #27

The information presented in the required supplementary schedules was determined as part of the actuarial valuations at the dates indicated. Additional information as of the latest actuarial valuation follows:

Valuation date	December 31, 2002
Actuarial Cost Method	Entry Age
Actuarial Value of Assets	5-year smoothed market
Amortization Method	Level dollar
Remaining Amortization Period	40 years
Actuarial Assumptions:	
Investment rate of return	8.0%
Projected salary increases	5.0% per year (of which 3% was for inflation)
Post-retirement increases	1.5% simple interest for 20 years for members born after 1945 3% simple interest for life for members born in or before 1945

EXHIBIT A-5
ANNUAL PENSION COST AND CONTRIBUTIONS
MADE FOR GASB #27

Contribution rates

City	Proceeds from a tax levy not more than an amount equal to the total amount of contributions by the employees to the Fund made in the calendar year two years prior to the year for which the annual applicable tax is levied, multiplied by 2.26.
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Plan members	9.125%
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Annual Pension Cost:

Annual Required Contribution (ARC)	\$105,106,367
Interest on Net Pension Obligation	43,011,554
Adjustment to ARC	<u>(41,747,175)</u>
Total	\$106,370,746

Contributions Made	\$58,838,300
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Net Pension Obligation (NPO):

NPO, Beginning of Year	\$537,644,429
Increase/(Decrease) in NPO	<u>47,532,446</u>
NPO, End of Year	\$585,176,875

Pension Liability at Transition (January 1, 1997)	\$369,267,330
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**EXHIBIT A-6
PENSION COST SUMMARY
FOR GASB #27**

Year Ended December 31	Annual Pension Cost	% of Annual Pension Cost Contributed	Net Pension Obligation
2002	\$106,370,746	55.31%	\$585,176,875
2001	105,173,254	57.43%	537,644,429
2000	91,629,104	71.95%	492,871,084
1999	88,974,566	60.03%	467,170,655
1998	78,963,730	61.29%	431,606,441

EXHIBIT A-7
DEVELOPMENT OF NET PENSION OBLIGATION (NPO) AT JANUARY 1, 1997

Year Ending December 31:	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996
Assumptions and Method										
Interest Rate	7.5%	7.5%	7.5%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%	8.0%
Amortization Period (years)	40	40	40	40	40	40	40	40	40	40
Cost Method	EAN	EAN	EAN	EAN	EAN	EAN	EAN	EAN	EAN	EAN
Annual Pension Cost										
Actuarially Determined Contribution (ADC)										
Normal Cost	\$44,023,556	\$44,652,516	\$45,746,453	\$43,184,329	\$47,236,555	\$51,515,900	\$52,304,610	\$53,235,963	\$48,144,514	\$49,878,875
40 Year Amortization	39,898,154	39,352,208	40,223,713	42,067,968	46,890,387	51,539,966	50,994,199	50,104,234	58,739,960	60,136,652
Total ADC	\$83,921,710	\$84,004,724	\$85,970,166	\$85,252,297	\$94,126,942	\$103,055,866	\$103,298,809	\$103,340,197	\$106,884,474	\$110,015,527
Interest on NPO	-	2,769,886	5,550,082	8,059,065	10,439,561	13,342,202	16,836,891	20,063,899	23,224,933	26,163,631
Adjustment to ADC	-	(2,827,639)	(5,596,880)	(8,127,020)	(10,527,588)	(13,454,705)	(16,978,861)	(20,233,079)	(23,420,768)	(26,384,245)
Annual Pension Cost	\$83,921,710	\$83,946,971	\$85,923,368	\$85,184,342	\$94,038,915	\$102,943,363	\$103,156,839	\$103,171,017	\$106,688,639	\$109,794,913
Contributions for Year										
Employer Contributions	\$29,562,500	\$34,339,139	\$37,016,865	\$36,478,751	\$36,504,134	\$38,448,497	\$42,036,863	\$42,727,953	\$41,616,542	\$43,527,172
Employee Contributions	17,427,400	17,163,621	17,544,210	18,949,395	21,251,755	20,811,264	20,782,382	20,930,122	28,338,382	24,045,799
Total Contributions	\$46,989,900	\$51,502,760	\$54,561,075	\$55,428,146	\$57,755,889	\$59,259,761	\$62,819,245	\$63,658,075	\$69,954,924	\$67,572,971
Net Pension Obligations (NPO)										
NPO at Beginning of Year	\$0	\$36,931,810	\$69,376,021	\$100,738,313	\$130,494,509	\$166,777,535	\$210,461,137	\$250,798,731	\$290,311,673	\$327,045,388
Annual Pension Cost	83,921,710	83,946,971	85,923,368	85,184,342	94,038,915	102,943,363	103,156,839	103,171,017	106,688,639	109,794,913
Total Contributions	(46,989,900)	(51,502,760)	(54,561,075)	(55,428,146)	(57,755,889)	(59,259,761)	(62,819,245)	(63,658,075)	(69,954,924)	(67,572,971)
NPO at End of Year	\$36,931,810	\$69,376,021	\$100,738,313	\$130,494,509	\$166,777,535	\$210,461,137	\$250,798,731	\$290,311,673	\$327,045,388	\$369,267,330