2019 REGULAR SESSION
ACTUARIAL NOTE HB 15

House Bill 15 HLS 19RS-225
Original

Author: Representative Carpenter
Date: March 13, 2019
LLA Note HB 15.01

Organizations Affected:
Firefighters' Retirement System

OR NO NET IMPACT APV

This Note has been prepared by the Actuarial Services Department of the Legislative Auditor with assistance from either the Fiscal Notes staff of the Legislative Auditor or staff of the Legislative Fiscal Office. The attachment of this Note provides compliance with the requirements of R.S. 24:521 as amended by Act 353 of the 2016 Regular Session.

James J. Rizzo, ASA, MAAA
Senior Consultant & Actuary
Gabriel, Roeder, Smith & Company, Actuary for the Legislative Auditor

Bill Header: RETIREMENT/FIREFIGHTERS: Provides relative to benefit options for certain retirees of the Firefighters' Retirement System

Cost Summary:

The estimated net actuarial and fiscal impact of this proposed legislation on the retirement systems and their plan sponsors is summarized below. Net actuarial costs pertain to estimated changes in the ***net actuarial present value of future benefit payments and administrative expenses incurred by the retirement system***. Net fiscal costs or savings pertain to changes to all cash flows over the next five year period including retirement system cash flows, OPEB cash flows, or cash flows related to other government entities.

An increase in actuarial costs is denoted throughout the actuarial note by "Increase" or a positive number. Actuarial savings are denoted by "Decrease" or a negative number. An increase in expenditures or revenues (fiscal impact) is denoted by "Increase" or a positive number. A decrease in expenditures or revenues is denoted by "Decrease" or a negative number.

Estimated Actuarial Impact:

The top part of the following chart shows the estimated change in the ***net actuarial present value of future benefit payments and expenses***, if any, attributable to the proposed legislation. The bottom part shows the effect on cash flows (i.e., contributions, benefit payments, and administrative expenses). Note: While this legislation contains a retirement system benefit provision having an actuarial cost (see Section I.A.1.), overall there is no net actuarial impact (see chart below).

Net Actuarial Costs (Liabilities) Pertaining to:		**Net Actuarial Cost**
The Retirement Systems		$0
Other Post-employment Benefits (OPEB)		0
Total		$0
Five Year Net Fiscal Cost Pertaining to:	**Expenditures**	**Revenues**
The Retirement Systems	$0	$0
Other Post-employment Benefits	0	0
Other Government Entities	0	0
Total	$0	$0

Bill Information

Current Law

Current law provides for optional benefit allowances for members of the Firefighter's Retirement System (FRS) and designated beneficiaries. The options include providing for a beneficiary to receive retirement benefits after the death of the member. Such options must be made prior to the date the first benefit payment becomes due and are irrevocable on or after the date of that first benefit payment.

Current law also provides that a FRS member who was single at the time of retirement but who married and has been married for at least 12 months may change his benefit after retirement by selecting a benefit option with his spouse as beneficiary. The benefit paid to the member who selects such option shall be actuarially equivalent to the benefit payable immediately prior to the election.

Proposed Law

HB 15 removes the provision that allows an FRS member who was single at the time of retirement to change his benefit upon marriage after retirement.

Implications of the Proposed Changes

Retirees who were single at the time of retirement will lose the option to select an optional benefit allowance covering a new spouse after being married for at least 12 months after retirement.

2019 REGULAR SESSION
ACTUARIAL NOTE HB 15

I. ACTUARIAL ANALYSIS SECTION

A. Analysis of Net Actuarial Costs
(Prepared by LLA)

This section of the actuarial note pertains to net actuarial costs or savings associated with the retirement systems and with OPEB.

1. Retirement Systems

The net actuarial cost or savings of the proposed legislation associated with the retirement systems is estimated to be $0. The actuary's analysis is summarized below.

There is a potential for anti-selection by some members under the current law. Suppose a retiree, single at retirement, in poor health and with only a few years to live marries and lives for at least 12 months. The new spouse would then be entitled to several years of benefit payments after his death. There would be some level of protection to the system by removing the option for that retiree to select an optional benefit allowance in a situation like this. However, the level of net savings would be negligible.

In addition, some retiring FRS members will be single at the time of retirement and marry later. As an example, consider a group of retirees who were not married at the time of retirement, and who would receive pensions of, say, $3,000 per month while single.

- Under current law, some of those retirees will marry and elect an optional form of benefit for their spouses as beneficiaries and take reductions in their monthly pension down to, say, $2,800 per month. Some such retirees will outlive their spouse-beneficiaries, so that throughout their lifetimes they will have received $3,000 per month for some years, then $2,800 for the remainder of their lives.

- Under the proposed law, these same retirees will not be permitted to make that election and will therefore continue to receive the $3,000 for their entire retired lifetime.

Therefore, under the proposed law, these retirees will receive more than they would receive under the current law. This gives rise to an actuarial cost for purposes of a 2/3 vote, which is required whenever any member at any time could receive a larger benefit under the proposed law compared to the current law. This is not true for all single retirees who marry, but only those who would have elected an optional form of benefit and outlive their spouse.

It is not required to know with certainty which retirees would receive a larger benefit, nor is it required to know that more retirees would receive a larger benefit than would receive a lesser benefit. Because of the actuarial equivalency required, the actuarial expectation is that in some such cases, more benefits will be paid over time and in other such cases, fewer benefits will be paid over time. The net actuarial cost or savings is expected to be $0.

Nevertheless, to be classified with an actuarial cost for the Constitutional purposes of the 2/3 vote (Article 10, Section 29(F), it is required that any member at any time could receive a larger benefit if the bill passes as compared to what he or she would receive if the bill did not pass.

2. Other Post-employment Benefits (OPEB)

The actuarial cost or savings of the proposed legislation associated with OPEB, including retiree health insurance premiums, is estimated to be $0. The actuary's analysis is summarized below.

The liability for post-retirement medical insurance protection provided to retirees is not affected by removing the option for a retiree that was single at the time of retirement to change his benefit allowance when becoming married for at least 12 months after retirement.

B. Actuarial Data, Methods and Assumptions
(Prepared by LLA)

Unless indicated otherwise, the actuarial note for the proposed legislation was prepared using actuarial data, methods, and assumptions as disclosed in the most recent actuarial valuation report adopted by the Public Retirement Systems' Actuarial Committee (PRSAC). The data, methods and assumptions are being used to provide consistency with the actuary for the retirement system who may also be providing testimony to the Senate and House retirement committees. With certain exceptions, the actuary for the LLA finds the assumptions used by the retirement systems and PRSAC to be reasonable.

C. Actuarial Caveat
(Prepared by LLA)

There is nothing in the proposed legislation that will compromise the signing actuary's ability to present an unbiased statement of actuarial opinion.

II. FISCAL ANALYSIS SECTION

This section of the actuarial note pertains to fiscal (annual) costs or savings associated with the retirement systems (Table A), with OPEB (Table B), and with other fiscal costs or savings incurred by other government entities (Table C). Fiscal costs or savings in Table A include benefit-related actuarial costs and administrative costs incurred by the retirement systems. The total effect of HB 15 on fiscal costs, fiscal savings, or cash flows is presented in Table D.

A. Estimated Fiscal Impact – Retirement Systems
(Prepared by LLA)

1. Narrative

Table A shows the estimated fiscal impact of the proposed legislation on the retirement systems and the government entities that sponsor them. A fiscal cost is denoted by "Increase" or a positive number. Fiscal savings are denoted by "Decrease" or a negative number. A revenue increase is denoted by "Increase" or a positive number. A revenue decrease is denoted by "Decrease" or a negative number.

Retirement System Fiscal Cost: Table A

EXPENDITURES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

REVENUES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

The proposed legislation will have the following effects on retirement related fiscal costs and revenues during the five year measurement period.

2. Expenditures:

No measurable effects.

3. Revenues:

No measurable effects.

B. Estimated Fiscal Impact – OPEB
(Prepared by LLA)

1. Narrative

Table B shows the estimated fiscal impact of the proposed legislation on actuarial benefit and administrative costs or savings associated with OPEB and the government entities that sponsor these benefit programs. A fiscal cost is denoted by "Increase" or a positive number. Fiscal savings are denoted by "Decrease" or a negative number. A revenue increase is denoted by "Increase" or a positive number. A revenue decrease is denoted by "Decrease" or a negative number.

OPEB Fiscal Cost: Table B

EXPENDITURES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

REVENUES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

The proposed legislation will have the following effects on OPEB related fiscal costs and revenues during the five year measurement period.

2. Expenditures:

No measurable effects.

3. Revenues:

No measurable effects.

C. Estimated Fiscal Impact: Other Government Entities (other than the retirement systems or OPEB)
(Prepared by Bradley Cryer, Director of Local Government Services, LLA)

1. Narrative

From time to time, legislation is proposed that has an indirect effect on cash flows associated with other government entities (other than the retirement systems or OPEB). Table C shows the estimated fiscal impact of the proposed legislation on such government entities. A fiscal cost is denoted by "Increase" or a positive number. Fiscal savings are denoted by "Decrease" or a negative number.

Fiscal Costs for Other Government Entities: Table C

EXPENDITURES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

REVENUES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

The proposed legislation will have the following effects on fiscal costs and revenues related to other government entities during the five year measurement period.

2. Expenditures:

No measurable effects.

3. Revenues:

No measurable effects.

D. Estimated Fiscal Impact − All Retirement Systems, OPEB, and All Government Entities (Prepared by LLA)

1. Narrative

Table D shows the estimated fiscal impact of the proposed legislation on all government entities within the state of Louisiana. Cell values in Table D are the sum of the respective cell values in Table A, table B, and Table C. A fiscal cost is denoted by "Increase" or a positive number. Fiscal savings are denoted by "Decrease" or a negative number. A revenue increase is denoted by "Increase" or a positive number. A revenue decrease is denoted by "Decrease" or a negative number.

Total Fiscal Cost: Table D (Cumulative Costs from Tables A, B, & C)

EXPENDITURES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

REVENUES	2019-20	2020-21	2021-22	2022-23	2023-24	5 Year Total
State General Fund	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0
Agy Self Generated	0	0	0	0	0	0
Stat Deds/Other	0	0	0	0	0	0
Federal Funds	0	0	0	0	0	0
Local Funds	0	0	0	0	0	0
Annual Total	$ 0	$ 0	$ 0	$ 0	$ 0	$ 0

Credentials of the Signatory Staff:

James J. Rizzo is a Senior Consultant and Actuary with Gabriel, Roeder, Smith & Company, which is currently serving as the actuary for the Louisiana Legislative Auditor. He is an Enrolled Actuary, a member of the American Academy of Actuaries, an Associate of the Society of Actuaries and has met the Qualification Standards of the American Academy of Actuaries necessary to render the actuarial opinion contained herein.

Actuarial Disclosure: Risks Associated with Measuring Costs

This Actuarial Note is an actuarial communication, and is required to include certain disclosures in compliance with Actuarial Standards of Practice (ASOP) No. 51.

A full actuarial determination of the retirement system's costs, actuarially determined contributions and accrued liability require the use of assumptions regarding future economic and demographic events. The assumptions used to determine the retirement system's contribution requirement and accrued liability are summarized in the system's most recent Actuarial Valuation Report accepted by the respective retirement board and by the Public Retirement Systems' Actuarial Committee (PRSAC).

The actual emerging future experience, such as a retirement fund's future investment returns, may differ from the assumptions. To the extent that emerging future experience differs from the assumptions, the resulting shortfalls (or gains) must be recognized in future years by future taxpayers. Future actuarial measurements may also differ significantly from the current measurements due to other factors: changes in economic or demographic assumptions; increases or decreases expected as part of the natural operation of the methodology used for these measurements (such as the end of an amortization period; or additional cost or contribution requirements based on the system's funded status); and changes in plan provisions or applicable law.

Examples of risk that may reasonably be anticipated to significantly affect the plan's future financial condition include:

1. Investment risk – actual investment returns may differ from the expected returns (assumptions);
2. Contribution risk – actual contributions may differ from expected future contributions. For example, actual contributions may not be made in accordance with the plan's funding policy or material changes may occur in the anticipated number of covered employees, covered payroll, or other relevant contribution base;
3. Salary and Payroll risk – actual salaries and total payroll may differ from expected, resulting in actual future accrued liability and contributions differing from expected;
4. Longevity and life expectancy risk – members may live longer or shorter than expected and receive pensions for a period of time other than assumed;
5. Other demographic risks – members may terminate, retire or become disabled at times or with benefits other than assumed, resulting in actual future accrued liability and contributions differing from expected.

The scope of an Actuarial Note prepared for the Louisiana Legislature does not include an analysis of the potential range of such future measurements or a quantitative measurement of the future risks of not achieving the assumptions. In certain circumstances, detailed or quantitative assessments of one or more of these risks as well as various plan maturity measures and historical actuarial measurements may be requested from the actuary. Additional risk assessments are generally outside the scope of an Actuarial Note. Additional assessments may include stress tests, scenario tests, sensitivity tests, stochastic modeling, and a comparison of the present value of accrued benefits at low-risk discount rates with the actuarial accrued liability.

However, the general cost-effects of emerging experience deviating from assumptions can be known. For example, the investment return since the most recent actuarial valuation may be less (or more) than the assumed rate, or a cost-of-living adjustment may be more (or less) than the assumed rate, or life expectancy may be improving (or worsening) compared to what is assumed. In each of these situations, the cost of the plan can be expected to increase (or decrease).

The use of reasonable assumptions and the timely receipt of the actuarially determined contributions are critical to support the financial health of the plan. However, employer contributions made at the actuarially determined rate do not necessarily guarantee benefit security.

Information Pertaining to Article (10)(29(F) of the Louisiana Constitution

[X] HB 15 contains a retirement system benefit provision having an actuarial cost.

Some members of the Firefighters' Retirement System could receive a larger benefit with the enactment of HB 15 than what they would have received without HB 15. Refer to the Actuarial Analysis Section above.

Dual Referral Relative to Total Fiscal Costs or Total Cash Flows:

The information presented below is based on information contained in Table D for the first three years following the 2019 regular session.

Senate

[ ] 13.5.1 Applies to Senate or House Instruments.

If an annual fiscal cost ≥ $100,000, then bill is dual referred to:
Dual Referral: Senate Finance

[ ] 13.5.2 Applies to Senate or House Instruments.

If an annual tax or fee change ≥ $500,000, then the bill is dual referred to:

Dual Referral: Revenue and Fiscal Affairs

House

[ ] 6.8F Applies to Senate or House Instruments.

If an annual General Fund fiscal cost ≥ $100,000, then the bill is dual referred to:
Dual Referral to Appropriations

[ ] 6.8G Applies to Senate Instruments only.

If a net fee decrease occurs or if an increase in annual fees and taxes ≥ $500,000, then the bill is dual referred to:
Dual Referral: Ways and Means