MEMORANDUM REPORT

TO:	Donna S. Early
FROM:	BPS&M, LLC
DATE:	January 9, 2015
RE:	Actuarial Analysis of Proposed Legislation 2015 SB 23/GA AA Statement 1 of 1

BPS&M, LLC was asked to prepare an actuarial analysis in compliance with KRS 6.350 with regard to the recent proposed legislation ("2015 SB 23" BR198) that makes changes to the Kentucky Legislators Retirement Plan ("KLRP").

It is our understanding that 2015 SB 23 makes the following changes to KLRP:

1. Allows members who began contributing to KLRP prior to January 1, 2014 to make a onetime election to have their KLRP benefit based solely on their legislative salary after January 1, 2014.

Comments.

Item 1, allowing KLRP participants to have the option to opt out of future non-legislative pay:

- □ This option has historically been available to members. By choosing a different day of retirement for their KLRP benefit and other non-legislative benefit, pay from both sources would not be combined; however, this option has not been selected by any member in the past. Any assumption as to the percentage of participants who will make this election is highly speculative. For informational purposes, we have prepared projections assuming 100% of members choose to opt out of using non-legislative pay compared to the current plan where 0% of members are assumed to opt out. Again, the assumption that 100% of current members opt out of using non-legislative pay is not a prediction; it is simply demonstrates the possible impact.
- □ For purposes of the current actuarial analysis, members who enter on or after January 1, 2014 are assumed to be covered under the new "hybrid" plan. We are estimating the cost of the new "hybrid" plan to be 4% of covered pay per year.
- □ Though new members will continue to have medical insurance, this benefit for new participants is not reflected in either the "current" or "proposed" projections. Excluding this benefit will have no impact on the net impact of 2015 SB 23 (which may be seen by comparing results under the "current" and "proposed" scenarios below).
- □ Recent legislation requires that future cost of living increases will only be granted if the plan is 100% funded or if the annual cost of living increases are pre-funded each year. For purposes of this analysis, we have assumed no cost of living increases in the future.

Actuarially Sound

KRS 6.350 requires us to comment on whether the proposed changes would make KLRP actuarially unsound or, if already actuarially unsound, if such changes would make KLRP "more unsound".

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A plan that has adopted a reasonable funding method, uses reasonable assumptions and contributes at a rate at or above the recommended contribution rate (based on these reasonable methods and assumptions), could be considered to be actuarially sound. Whether or not the changes reflected in this study are or are not adopted, will not necessarily impact the "actuarial soundness" of KLRP.

In order to ensure KLRP is funded in an "actuarially sound manner", we would recommend:

- 1. Revise the actuarial funding method to amortize all past unfunded as well as new liabilities over a period not more than 30 years (in accordance with currently applicable Governmental Accounting Standards 67 and 68) and amortize future gains and losses over a period not more than 15 years.
- 2. Contribute at least the minimum recommended contribution each year.

Deviations from these recommendations could result in an "actuarially unsound" approach to funding KLRP and may eventually result in KLRP becoming insolvent – that is, exhausting assets at which time all future benefits would be made on a pay as you go basis.

Although the Actuarial Standards of Practice 4 "Measuring Pension Obligations" allows for plan liabilities to be calculated under a legally prescribed method, the statement goes on to say,

"If, in the actuary's professional judgment, such an actuarial cost method or amortization method is significantly inconsistent with the plan accumulating adequate assets to make benefit payments when due, assuming that all actuarial assumptions will be realized and that the plan sponsor or other contributing entity will make contributions when due, the actuary should disclose this."

It is our professional actuarial opinion that the current legally prescribed method which requires contributions of normal cost plus interest on the unfunded liability plus 1% of the unfunded liability (per KRS 21.525) is inconsistent with the plan accumulating adequate assets to make benefit payments when due, assuming all actuarial assumptions are realized.

Assumptions

Future results will vary from projections to the extent future experience varies from the assumptions used in the projections. The longer the period of the forecast, the more variation is likely to occur and the less likely future results will match projections.

- 1. Data for projections is as of July 1, 2013.
- 2. Assets for projections are as of June 30, 2013.
- 3. A valuation will be performed July 1 of each odd numbered year (2013, 2015, etc.). The dollar amount of recommended contribution will be contributed each year for two plan years beginning one year after the valuation date. However, hybrid plan contributions are assumed to be 4% of current year pay.
- 4. Except as mentioned herein, all assumptions are consistent with the assumptions and methods used for the July 1, 2013 valuation report.
- 5. Future experience assumptions are consistent with the July 1, 2013 valuation assumptions.
- 6. It is assumed the total population remains constant over the period of the forecast.

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- 7. Since the changes under 2015 SB 23 are effective January 1, 2014, the first year impacted by a valuation recognizing the changes is July 1, 2015; however, the changes would be recognized in the July 1, 2014 Accrued Liability.
- 8. It is assumed that only 53% of the recommended contribution for 2013 will be made.
- 9. Certain changes under 2015 SB 23, may or may not be allowed under state law. Whether or not all changes under 2015 SB 23 are permissible is a legal issue, and we provide no opinion in this regard. For purposes of the attached projections, we have assumed such changes are allowable.

Definitions

Accrued Liability – based on the methods and assumptions used, the amount of assets that would be needed to satisfy future projected benefit payments based on service as of the valuation date.

Normal Cost – cost of benefits earned in the year following the valuation for current active members

Actuarial Asset Value – A smoothed asset value which smoothes in asset gains and losses over a 5 year period (for purposes of this study). For projection years 5 or more years in the future, the actuarial and market value would be the same (assuming assets earn the 7% rate of return which is assumed). As the Plan has experienced consistent gains over the past few years, the current Actuarial Asset Value is smaller than the market value since all prior gains have not yet been recognized.

Current – projections reflecting current rules and regulations, without regards to 2015 SB 23

Proposed - projections reflecting item 1 above from 2015 SB 23

Conclusions

We have prepared projection assuming 100% of active members opt out of using non-legislative pay. Based on prior experience, this result is highly unlikely.

Adopting the changes put forth under 2015 SB 23 item 1 will:

- 1. Reduce the Accrued Liability for KLRP by approximately \$7.7M as of July 1, 2014,
- 2. Reduce future benefit accruals under KLRP,
- 3. Reduce future recommended employer contributions (as shown on the attached forecast),
- 4. Lead to an immediate reduction in the total unfunded accrued liability followed by a gradual increase for the same reasons listed in #5 below and
- 5. Lead to a small initial increase in the funded ratio, reflecting the reduction in liabilities followed by a continued decrease in the funded ratio (meaning the assets will represent a smaller portion of the liabilities at the end of the projection period). The decrease in the funded ratio occurs as liabilities begin to grow faster than assets due to the combination of the current legally required funding method, as well as the medical trend rates which are well in excess of inflation.

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Professional Oualifications

This report has been prepared under the supervision of Alan C. Pennington and David L. Shaub. Both are members of the American Academy of Actuaries, Fellows of the Society of Actuaries, and consulting actuaries with Bryan, Pendleton, Swats and McAllister, LLC who have met the Qualification Standards of the American Academy of Actuaries to render the actuarial opinions herein. To the best of our knowledge this report has been prepared in accordance with generally accepted actuarial standards, including the overall appropriateness of the analysis, assumptions, and results and conforms to appropriate Standards of Practice as promulgated from time to time by the Actuarial Standards Board, which standards form the basis for the actuarial report. We are not aware of any direct or material indirect financial interest or relationship, including investment management or other services that could create, or appear to create, a conflict of interest that would impair the objectivity of our work.

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January 9, 2015 Date

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Cost Projections - SB 23 Prepared by Bryan, Pendleton, Swats & McAllister, LLC January 9, 2015

	Contribution (\$M)				Contribution (%)			Accrued Liability (\$M)				Unfunded Lia	ability	Funded Ratio (Assets/Liabilities)		
Year Beginning July 1	Current		Proposed		Current	Proposed	Current		Proposed			Current	Proposed		Current	Proposed
2013	\$	1.7	\$	1.7	34.2%	34.2%	\$	96.0	\$	96.0	\$	28.7	\$	28.7	82%	82%
2014	\$	3.4	\$	3.4	72.7%	72.7%	\$	97.1	\$	89.4	\$	25.3	\$	17.6	81%	88%
2015	\$	3.4	\$	3.4	73.5%	73.5%	\$	97.8	\$	89.7	\$	20.7	\$	12.7	83%	90%
2016	\$	2.5	\$	1.7	54.6%	36.3%	\$	98.2	\$	89.7	\$	17.3	\$	8.8	84%	92%
2017	\$	2.6	\$	1.7	55.1%	36.7%	\$	98.3	\$	89.5	\$	14.9	\$	7.0	85%	92%
2018	\$	1.9	\$	1.1	40.8%	24.1%	\$	98.2	\$	89.1	\$	14.1	\$	6.8	86%	92%
2019	\$	2.0	\$	1.2	40.0%	23.8%	\$	97.8	\$	88.4	\$	13.7	\$	7.2	86%	92%
2020	\$	1.7	\$	1.1	34.1%	21.4%	\$	97.2	\$	87.7	\$	13.3	\$	7.5	86%	91%
2021	\$	1.7	\$	1.1	33.2%	20.9%	\$	96.5	\$	86.8	\$	13.0	\$	8.0	87%	91%
2022	\$	1.6	\$	1.1	29.7%	20.6%	\$	95.7	\$	85.8	\$	12.7	\$	8.5	87%	90%
2023	\$	1.6	\$	1.1	29.0%	20.1%	\$	94.9	\$	84.8	\$	12.4	\$	9.0	87%	89%
2024	\$	1.5	\$	1.2	26.7%	20.5%	\$	94.0	\$	83.8	\$	12.2	\$	9.6	87%	89%
2025	\$	1.5	\$	1.2	26.1%	20.1%	\$	93.0	\$	82.7	\$	12.0	\$	10.1	87%	88%
2026	\$	1.4	\$	1.2	23.6%	20.1%	\$	91.8	\$	81.4	\$	11.7	\$	10.7	87%	87%
2027	\$	1.5	\$	1.2	23.1%	19.7%	\$	90.4	\$	79.9	\$	11.5	\$	11.3	87%	86%
2028	\$	1.3	\$	1.3	20.4%	19.6%	\$	88.7	\$	78.2	\$	11.2	\$	11.9	87%	85%
2029	\$	1.3	\$	1.3	20.0%	19.1%	\$	86.8	\$	76.3	\$	11.0	\$	12.6	87%	84%
2030	\$	1.3	\$	1.4	18.0%	19.5%	\$	84.8	\$	74.4	\$	10.7	\$	13.3	87%	82%
2031	\$	1.3	\$	1.4	17.5%	19.0%	\$	82.7	\$	72.3	\$	10.5	\$	14.0	87%	81%
2032	\$	1.2	\$	1.5	16.2%	19.7%	\$	80.5	\$	70.2	\$	10.3	\$	14.8	87%	79%
2033	\$	1.2	\$	1.5	15.8%	19.2%	\$	78.2	\$	68.1	\$	10.2	\$	15.5	87%	77%
Sum of Contributions	\$	37.8	\$	31.7												

Assumes 7% future asset returns beginning July 1, 2013 2013 Current Contribution represents approximately 53% of the recommended contribution Unfunded Liability is calculated as Accrued Liability minus the Actuarial Assets Value Funded Ratio is calculated as Market Value of Assets divided by Accrued Liability Contribution (%) is calculated as the Contribution(\$) divided by total payroll for both Current and Proposed A decrease in the annual contribution from 2015 to 2016 is the result of prior gains being recognized

Notes on Proposed Projections (SB 23 effective 1/1/2014)

New entrants participate in Hybrid Plan (annual cost estimated to be 4% per year)

Hybrid Plan assets and liablities are not reflected above

Retiree health care benefits for new hires after 7/1/2013 not reflected above

Assume 100% of active members elect to cease using non-legislative pay effective 1/1/2014