800.521.0498 | P: 248.799.9000 | www.grsconsulting.com

February 8, 2021

Mr. Duncan Baird
Executive Director
Arkansas Public Employees Retirement System
One Union National Plaza
124 West Capitol, Suite 400
Little Rock, Arkansas 72201

Re: Actuarial Analysis of Proposed Benefit Changes
JNL170 Dated 01-18-2021; House Bill 1348 Dated 01-29-2021

Dear Mr. Baird:

As requested, enclosed are the results of a supplemental actuarial valuation related to proposed benefit changes included in JNL170 dated 01-18-2021 and House Bill 1348 dated 01-29-2021 and for the Arkansas Public Employees Retirement System.

Please call if you have any questions or comments.

Respectfully submitted,

Mita Drazilov

Mita D. Drazilov, ASA, FCA, MAAA

David L. Hoffman

David L. Hoffman

Heidi G Barry

Heidi G. Barry, ASA, FCA, MAAA

MDD/DLH/HGB:sc
Enclosure

One Towne Square | Suite 800 | Southfield, Michigan 48076-3723

Arkansas Public Employees Retirement System
Supplemental Actuarial Valuation
as of June 30, 2020
JNL170 Dated 01-18-2021; House Bill 1348 Dated 01-29-2021

Requested By:	Mr. Duncan Baird, Executive Director Arkansas Public Employees Retirement System
Date:	February 8, 2021
Submitted By:	Mita D. Drazilov, ASA, FCA, MAAA, Heidi G. Barry, ASA, FCA, MAAA and David L. Hoffman Gabriel, Roeder, Smith & Company

This report presents results of an actuarial valuation of proposed benefit changes for members of the Arkansas Public Employees Retirement System (APERS). Mita D. Drazilov and Heidi G. Barry are Members of the American Academy of Actuaries (MAAA) as indicated, and meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinions contained herein.

The date of the valuation was June 30, 2020. This means that the results of the supplemental valuation indicate what the June 30, 2020 valuation would have shown if the proposed benefit changes had been in effect on that date. Supplemental valuations do **not** predict the result of future actuarial valuations. Rather, supplemental valuations give an indication of the probable long-term cost of the **benefit changes only** without comment on the complete end result of the future valuations.

Actuarial assumptions and methods were consistent with those used in the regular actuarial valuation of the Retirement System on the valuation date, unless otherwise noted. Actuarial assumptions are adopted by the Retirement Board of Trustees. In particular the assumed rate of investment return was 7.15% and payroll was assumed to increase 3.25% per year.

For supplemental actuarial valuation purposes, changes in the Unfunded Actuarial Accrued Liability (UAAL) were amortized over a closed 20-year period. The Board adopted funding policy requires changes in the UAAL due to changes in benefit provisions to be amortized over a closed 15-year period for active members and a closed 5-year period for non-active members (i.e., retired members and deferred members). However, the funding policy was created anticipating benefit increases rather than benefit reductions. **If the proposed legislation is enacted, we recommend that the Board's funding policy be modified to incorporate this suggested change to the Amortization Method section of the funding policy.**

Given the funded status of APERS and the level of investment risk that the System is currently exposed to, we would suggest that the Board consider keeping the employer contribution rate at the current level in the event this benefit change is enacted.

A brief summary of the data used for purposes of the study as of June 30, 2020 is presented below:

Active Member Group	Number	Annual Pay	Average	
			Age	Benefit Service
Non-Contributory	7,880	$ 391,800,663	53.6 yrs.	21.6 yrs.
Contributory	36,491	1,403,856,832	42.4 yrs.	6.1 yrs.
DROP Participants	1,520	95,469,299	59.8 yrs.	33.0 yrs.

It is our understanding that benefits for current inactive and retired members would not be affected by the proposed benefit change. They were excluded from this study.

Arkansas Public Employees Retirement System
Supplemental Actuarial Valuation
as of June 30, 2020
JNL170 Dated 01-18-2021; House Bill 1348 Dated 01-29-2021

Present Provision: Contributory Plan members contribute 5% of covered compensation.

Proposed Provision: Beginning July 1, 2022, and continuing each of the following fiscal years, the contribution rate for Contributory Plan members shall be increased in increments of twenty-five hundredths of one percent (0.25%) per fiscal year. An increase to the contribution rate shall not result in a contribution rate greater than seven percent (7%).

Actuarial Information: The financial effects of the proposal are shown below. These financial effects include the computed increase in the employer contribution rate expressed as a % of payroll. Payroll includes the payroll for non-contributory and contributory active members as well as DROP participants.

Increase in Employer Contribution Rate	% of Payroll
Normal Cost	(0.00)%
UAAL* (20-year amortization)	(0.00)%
Total	**(0.00)%**

* *Unfunded Actuarial Accrued Liability.*

Notes:

1) If the proposed benefit change were effective on the valuation date of June 30, 2020, the unfunded actuarial accrued liability would not change.
2) There is no immediate impact to the System. Member contributions will be phased-in in 0.25% increments beginning July 1, 2022 through July 1, 2029 and will remain 7% thereafter.
3) Once all active members are in the Contributory Plan and the 8-year phase-in is completed, the potential reduction in the employer contribution rate is expected to be 1.61%.
4) Employers are assumed to contribute on DROP payroll. DROP participants do not make member contributions.

Additional Comments

Comment 1 — The figures shown on the prior page are based on the June 30, 2020 actuarial valuation. Please remember that this change, if adopted, would likely impact the June 30, 2021 valuation since it establishes the Fiscal Year 2024 employer contribution rate. That valuation will likely be completed in the fall of 2021, and is based on member data and financial results as of June 30, 2021, neither of which is available to us at this time.

Comment 2 — The calculations are based upon assumptions regarding future events, which may or may not materialize. They are also based upon present and proposed plan provisions that are outlined in this report. If you have reason to believe that the assumptions that were used are unreasonable, that the plan provisions are incorrectly described, that important plan provisions relevant to this proposal are not described, or that conditions have changed since the calculations were made, you should contact the authors of this report prior to relying on information in this report.

Comment 3 — If you have reason to believe that the information provided in this report is inaccurate, or is in any way incomplete, or if you need further information in order to make an informed decision on the subject matter of this report, please contact the authors of this report prior to making such decision.

Comment 4 — This report is intended to describe the financial effect of the proposed plan change. No statement in this report is intended to be interpreted as a recommendation in favor of the change, or in opposition to it.

Comment 5 — In the event that more than one plan change is being considered, it is very important to remember that the results of separate actuarial valuations cannot generally be added together to produce a correct estimate of the combined effect of all of the changes. The total can be considerably greater than the sum of the parts due to the interaction of various plan provisions with each other, and with the assumptions that must be used.

Comment 6 — This report is intended to describe the financial effect of the proposed plan change on the Retirement System. Except as otherwise noted, potential effects on other benefit plans were not considered.

Additional Comments (Concluded)

Comment 7 — The reader of this report should keep in mind that actuarial calculations are mathematical estimates based on current data and assumptions about future events (which may or may not materialize). Please note that actuarial calculations can and do vary from one valuation year to the next, sometimes significantly if the group valued is very small (less than 30 lives). As a result, the cost impact of a benefit change may fluctuate over time, as the demographics of the group changes.

Comment 8 — This report was prepared using our proprietary valuation model and related software which in our professional judgment has the capability to provide results that are consistent with the purposes of the valuation. We performed tests to ensure that the model reasonably represents that which is intended to be modeled.