CalPERS

Finance and Administration Committee

Agenda Item 8b

April 18, 2017

Item Name: Schools Valuation and Employer/Employee Contribution Rates

Program: Actuarial Office

Item Type: Action

Recommendation

Adopt an employer contribution rate of 15.531 percent for the Schools Pool and a member contribution rate of 6.5 percent for schools employees subject to the Public Employees' Pension Reform Act of 2013 (PEPRA) for the period of July 1, 2017 to June 30, 2018.

Executive Summary

We recommend that the Board adopt the employer contribution rate of 15.531 percent for the period of July 1, 2017 through June 30, 2018 for the Schools Pool. This employer contribution rate is higher than the previous fiscal year but less than what was projected in the June 30, 2015 annual valuation report. The lower contribution is mainly due to the payroll being higher than was projected in the previous valuation.

We also recommend that the Board adopt a member contribution rate of 6.5 percent for schools employees subject to PEPRA effective July 1, 2017. This is 0.5 percent higher than the current rate of 6.0 percent.

The recommended employer and employee contribution rates were generated based on the June 30, 2016 annual valuation using the same discount rate as the prior year, which is 7.50 percent. The CalPERS Board of Administration approved lowering the CalPERS discount rate assumption, the long-term rate of return, from 7.50 percent to 7.00 percent over the next three years. For schools employers, this will start in the June 30, 2017 annual valuation and will increase employer contribution costs beginning in Fiscal Year 2018-19.

The following table summarizes the results of the June 30, 2016 valuation:

Comparison of Key Valuation Results

	June 30, 2015	**June 30, 2016**
Market Value of Assets	$ 56,814,247,327	$ 55,784,854,423
Accrued Liability	$ 73,324,977,003	$ 77,543,827,270
Unfunded Accrued Liability	$ 16,510,729,676	$ 21,758,972,847
Funded Status	77.5%	71.9%
	Fiscal Year 2016-17	**Fiscal Year 2017-18**
Employer Contribution Rate	13.888%	15.531%
PEPRA Member Contribution Rate	6.00%	6.50%

Strategic Plan
This action item is being presented as part of the regular and ongoing workload of the Actuarial Office and supports the Strategic Plan Goal A: Improve long-term pension and health benefit stability.

Background
The Schools Pool provides retirement benefits to members employed by school districts and community college districts in California. It generally does not cover teachers as they are covered by a separate retirement system – the California State Teachers' Retirement System, also known as CalSTRS.

This actuarial valuation determines the funded status as of June 30, 2016 and sets forth the schools employer and employee contribution rates for the plan for Fiscal Year July 1, 2017 through June 30, 2018.

Analysis
Schools Employer Contribution Rates for 2017-18
The Actuarial Office has completed the calculation of the employer contribution rate for the Schools Pool for the Fiscal Year 2017-18. The full actuarial report is expected to be completed this summer and will be provided to the Board and posted online when complete. The additional information provided in the full actuarial report includes details on assumptions, methods, and participant data.

The table below compares the Fiscal Year 2017-18 actuarially required contribution rates and the dollar amounts these rates are anticipated to generate with the rates and contributions for the current Fiscal Year 2016-17.

Comparison of Schools Pool Employer Contribution

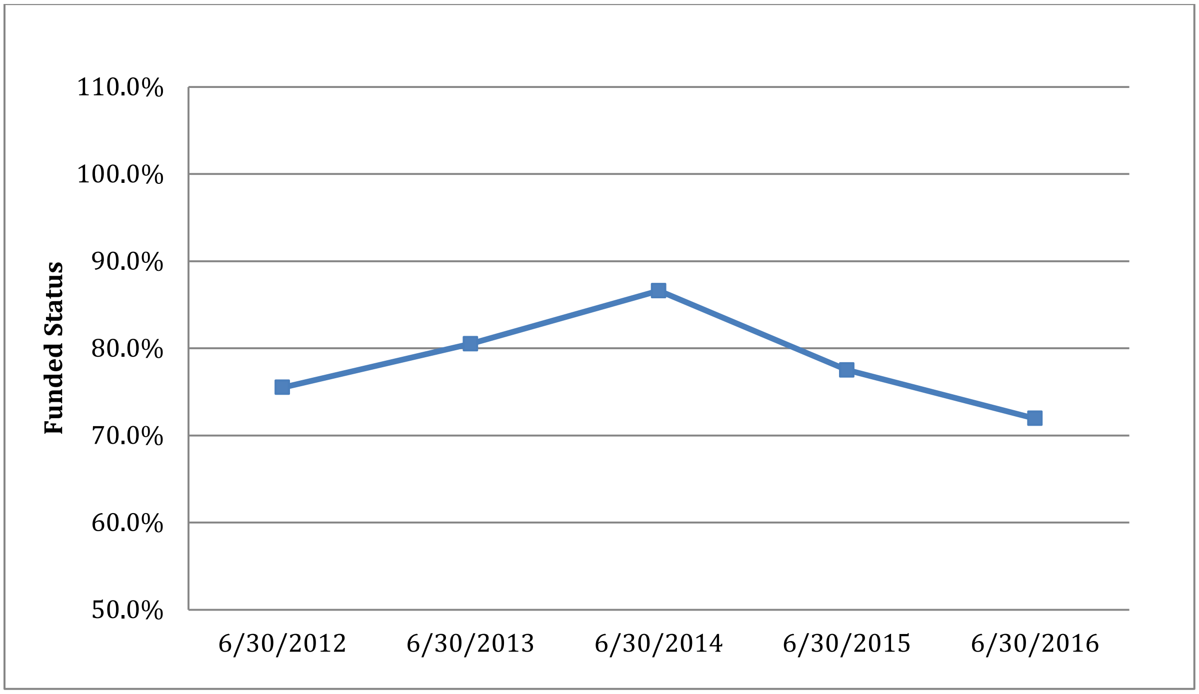
	Fiscal Year 2016-17	**Fiscal Year 2017-18**
Employer Contribution Rate		
Employer Normal Cost	8.242%	8.103%
Unfunded Rate	5.646%	7.428%
Required Employer Rate	13.888%	15.531%
Expected Employer Contribution Dollars		
Employer Normal Cost	$ 997,121,741	$ 1,055,145,859
Unfunded Rate	$ 683,059,487	$ 967,270,839
Required Employer Rate	$ 1,680,181,228	$ 2,022,416,698

Note that the payroll used to calculate the expected dollar contributions is the payroll used in the valuation incorporating two years of payroll growth using the payroll growth assumption of 3 percent. To the extent that payroll in the contribution year is different than projected payroll, the actual contribution amounts will be different than the expected contributions shown in the table above.

Funded Status

The funded status of a pension plan is defined as the ratio of assets to a plan's accrued liabilities. Plans with a lower funded ratio are, all other things being equal, more at risk of not being able to meet their future benefit obligations. From June 30, 2015 to June 30, 2016 the funded status for the Schools Pool decreased by 5.6 percent. This was mainly due to the investment return for 2015-16 being less than expected. The graph below shows the average funded status for the past five years for the Schools Pool.

Funded Status of the Schools Pool
(Based on the Market Value of Assets)



Reasons for Changes in the Schools Employer Contribution Rate

Overall, the required contributions for the Schools Pool are expected to increase by $342.2 million between Fiscal Year 2016-17 and Fiscal Year 2017-18.

The increase is driven mostly by recent investment experience and the continued phase-in of the change in actuarial assumptions that took place in the 2015 annual valuation.

The Board has adopted an amortization and smoothing policy that spreads rate increases or decreases over a 5-year period. In this valuation, the impact of the assumption changes adopted in 2014 and implemented in the 2015 annual valuation and the impact of previous investment experience are still being phased into the contribution requirement. The 2014 assumption change will continue to impact contribution requirements for another three years.

In addition, the investment return for the fiscal year ending June 30, 2016 was 0.6 percent, less than the assumed return of 7.5 percent. The impact of this investment loss is being recognized for the first time and will be phased in over five years in accordance with the Board policy.

As stated earlier, the Board's decision to lower the discount rate assumption has not yet affected the contribution requirement for the Schools Pools employers. The lowering of the discount rate assumption will first impact the schools contributions in Fiscal Year 2018-19.

The table below highlights the major contributors to the change in required contributions.

Reason for Change in Projected Schools Pool Employer Contributions (in millions)

Growth in overall payroll	$76.1
Decrease in normal cost due to PEPRA	(18.1)
Second year of 5-year phase in of 2014 change in assumptions	90.0
5-year phase in policy for all previous gains and losses bases	114.6
Normal progression of existing amortization bases after 5-year ramping	13.1
First installment of the 5-year phased-in 30-year amortization of the following gains or losses	
Investment loss in 2015-16	60.1
Demographic gains and losses	7.7
Impact of greater than expected contributions received in 2015-16	(1.3)
Total Change in Required Contributions	$342.2

PEPRA Member Contribution Rates

With the enactment of PEPRA, new members hired on or after January 1, 2013 are subject to PEPRA and are required to contribute 50 percent of the total annual normal cost of their pension benefit as determined by the actuary. PEPRA schools members currently contribute 6 percent of salary. The contribution rate for schools members not subject to PEPRA, i.e. classic members, is set by statute and is currently 7 percent of salary for schools employees.

Current law contains a provision that requires a change in PEPRA member contribution rate when the total normal cost changes by more than 1 percent of payroll. When a change is triggered, the member contribution rate is adjusted once again to half the normal cost, rounded to the nearest quarter of one percent.

When the schools member PEPRA contribution rate was set in 2013, the normal cost was calculated to be 11.85 percent of payroll. To trigger a change in the PEPRA member contribution rate, the normal cost for schools PEPRA members has to increase above 12.85 percent of payroll. Last year, following the adoption of the 2014 change in actuarial assumptions, the PEPRA normal cost increased to 12.82 percent of payroll. The change in PEPRA normal cost was 0.97 percent of payroll, less than the 1 percent threshold in PEPRA. As a result, no change was made to the member contribution rate.

In this valuation, shifts in plan demographics have resulted in an increase in the PEPRA normal cost for schools members. The new normal cost is 12.91 percent of payroll. The normal cost has now changed by more than one percent since the last time the member contribution rate was established. As a result, an adjustment to the PEPRA member contribution rate is necessary. The member contribution rate for the Schools Pool PEPRA members will be increased to 6.5 percent effective July 1, 2017. This is 0.5 percent higher than the current 6.0 percent.

Note that as of June 30, 2016, there are 82,530 active PEPRA members in the Schools Pool, which represents 27 percent of the total active population of the Schools Pool.

Expected Future Changes

The CalPERS Board of Administration approved a lowering of the CalPERS discount rate assumption at the December 21, 2016 meeting. The discount rate will be lowered from the current 7.50 percent to 7.00 percent over the next three years. For the Schools Pool, the discount rate will be lowered for the first time to 7.375 percent effective next year with the June 30, 2017 actuarial valuation, impacting the Schools Pool employer contribution rates beginning in Fiscal Year 2018-19. The discount rate will be lowered further over the following two valuations.

Lowering the discount rate means both the normal cost and the accrued liabilities will increase in the future. These increases will result in higher required employer contributions. Consistent with the existing board amortization and smoothing policy, the impact of each change in discount rate will be phased in over a five-year period. As a result, the full impact of the reduction in the discount rate will not be felt until fiscal year 2024-25.

Below is a table showing projected schools employer contribution rates.

Projected Future Schools Employer Contribution Rates
(as a percentage of payroll)

Valuation Date	Fiscal Year Impact	Discount Rate	Projected Employer Contribution Rate
6/30/2017	2018-19	7.375%	18.1%
6/30/2018	2019-20	7.25%	20.8%
6/30/2019	2020-21	7.00%	23.8%
6/30/2020	2021-22	7.00%	25.2%
6/30/2021	2022-23	7.00%	26.1%
6/30/2022	2023-24	7.00%	26.8%
6/30/2023	2024-25	7.00%	27.3%

The above table is based on the June 30, 2016 annual valuation for the Schools Pool, reflecting anticipated increases caused by the phasing in of the impact of the reduction in the discount rate assumption. The projected rates also assume that all other actuarial assumptions will be realized and no other changes will occur during the projection period. These projections do not take into account the positive impact PEPRA is expected to gradually have on the cost.

A more comprehensive projection will be included in the full valuation report that will reflect the expected impact of the investment return for 2016-17 as well as the anticipated decrease in cost due to new hires being subject to the lower PEPRA benefit formula. Future investment returns and plan experience will impact the rates provided in the above table.

In addition to increases in the schools employer contribution rate, active PEPRA members may also see their contribution rate rise in the future if the lowering of the discount rate results in another change in normal cost of more than 1 percent. At this time, it is estimated the normal cost will most likely increase by more than 1 percent when the discount rate is lowered to 7.0 percent. Therefore, an adjustment to the PEPRA member contribution rate is expected when the June 30, 2019 annual valuation is completed, resulting in a PEPRA member contribution rate of 7.25 percent effective for fiscal year 2020-21. This is only an estimate. The PEPRA normal cost will be reassessed each year in the future to determine whether or not a change is required.

Budget and Fiscal Impacts
Not applicable.

Benefits and Risks
Information about the risks associated with the funding of these plans will be included in the valuation report that is expected to be released this summer. This information includes investment return scenarios, discount rate sensitivity, and volatility ratios.

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