

Actuarial Section

DELAWARE
PUBLIC
EMPLOYEES'
RETIREMENT
SYSTEM

- a component unit of the State of Delaware

A MILLIMAN GLOBAL FIRM



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September 3, 2002

Board of Pension Trustees
Delaware Public Employees' Retirement System
McArdle Building
860 Silver Lake Blvd., Suite 1
Dover, Delaware 19904-2402

Dear Board Members:

At your request, we have prepared our annual actuarial valuations of each of the funded pension plans administered by the Board as of June 30, 2002. The results of these valuations are contained in this report. Any distribution of this report must be in its entirety, including this cover letter, unless prior written consent is obtained.

Funding Objective

The funding objective of the System is to establish contribution rates which, over time, will remain level as a percent of payroll. In order to achieve this, a contribution rate has been determined which will provide for current cost (i.e., normal cost expressed as a level percent of payroll) plus level percent of payroll amortizations of each layer of the unfunded liability over the periods disclosed on page 44 of the CAFR. This funding objective is currently being realized.

Furthermore, each of the plans is subject to statutory funding requirements which, in our judgement, are in conformity with generally accepted actuarial principles and practices. To our knowledge, the State has consistently funded the full amounts required based on the actuarial valuations and specific statutory provisions.

Assumptions

The actuarial assumptions and methods used in these valuations have been recommended by the actuary and adopted by the Board of Trustees. The assumptions are annually screened for their continued applicability to this plan. We believe that the assumptions and methods are reasonable, and in the aggregate represent our best estimate of anticipated experience under the plans. Nevertheless, the emerging costs will vary from those presented in this report to the extent that actual experience differs from that projected by the actuarial assumptions.

The assumptions and methods used for funding purposes meet the parameters set for the disclosures presented in the financial section by Government Accounting Standards Board Statement No. 25, *Financial Reporting for Defined Benefit Pension Plans*.



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Reliance on Others

In preparing our report, we relied, without audit, on employee census data provided by the Delaware State Pension Office. Census data provided by the Office has been reviewed for reasonableness, and for consistency with the data used in prior years. It should be noted that if any data or other information is inaccurate or incomplete, our calculations may need to be revised.

Supporting Schedules

The figures disclosed in Schedule 1 of the Supporting Schedules to the Financial Section were provided by Milliman USA, as were the Notes to Trend Data. In addition, we were responsible for the following schedules to be found in the Actuarial Section: Actuarial Assumptions and Methods, Schedule of Active Member Valuation Data, Solvency Test.

Certification

I believe that the State's pension plans are adequately and appropriately financed, in that the contributions are determined and funded on a level cost basis using reasonable actuarial methods and assumptions.

I, Fiona E. Liston, am a consulting actuary for Milliman USA. I am a member of the American Academy of Actuaries and meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained herein.

I hereby certify that, to the best of my knowledge, this report is complete and accurate and has been prepared in accordance with generally recognized and accepted actuarial principles and practices which are consistent with the applicable Guides to Professional Conduct, Amplifying Opinions, and Supporting Recommendations and Interpretations of the American Academy of Actuaries.

Sincerely,

Milliman USA

Fiona E. Liston, F.S.A.
 Consulting Actuary

Actuarial Assumptions and Methods

Asset Valuation Method

The market value of assets, representing the realizable value of the assets on a particular day, is not necessarily an appropriate value for the purpose of setting contribution rates. This is because funding will take place over a long period into the future during which time market values can be expected to fluctuate widely. If market values were used to develop contribution rates, the resulting contribution rates would also vary widely.

In order to produce a stable pattern of contribution rates, market values are adjusted so that some of the volatility is removed. The actuarial value of assets has been calculated by taking 1/5th of the market value plus 4/5th of the expected value, where the expected value is last year's actuarial value and subsequent cash flows into and out of the System accumulated with interest at the valuation rate (8.5%).

Funding Method

All plans currently use the Aggregate Entry Age Normal Method with projection to determine costs. In prior years, the municipal plans used a modification of this method known as the Frozen Initial Liability Method. Under the Entry Age method, a total contribution rate is determined which consists of two elements, the normal cost rate and the unfunded liability rate (UAL). In addition, the overall contribution rate includes a provision for the plan's expenses.

For each State plan, an Individual Entry Age Normal cost rate is determined for the typical new entrant of each respective plan. This rate is determined by taking the value, as of entry into the plan, of the member's projected future benefits less the member's projected future employee contributions, and dividing it by the value, also as of the member's entry age, of his expected future salary.

In addition to contributions required to meet the normal cost, contributions will be required to meet each plan's unfunded actuarial liability. Actuarial liability is defined as the present value of future benefits less the present value of future normal costs and future employee contributions. The unfunded liability is the total of the actuarial liability for all members less the actuarial value of the System's assets.

A portion of the unfunded liability will be paid through future, scheduled transfers from the Post-Retirement Increase Fund (PRI). These transfers will cover the liability increases due to the cost-of-living increases granted on July 1, 1997, July 1, 1998, July 1, 1999, July 1, 2000, and July 1, 2001. The remaining unfunded actuarial liability will be amortized over the next 15 years (for the State Employees' Plan, 19 years for the Judiciary Plan, 18 years for the New State Police Plan, 25 years for the Volunteer Firemen's Plan, and 20 years for the Diamond State Corporation Plan) through the unfunded liability amortization component of the total contribution.

