

KPMG LLP Suite 600 701 West Eighth Avenue Anchorage, AK 99501

#### **Independent Auditors' Report**

The Division of Retirement and Benefits and Members of the Alaska Retirement Management Board State of Alaska Teachers' Retirement System:

We have audited the accompanying combining statement of fiduciary net position of the State of Alaska Teachers' Retirement System (the System) (a component unit of the State of Alaska) as of June 30, 2015, and the combining statement of changes in fiduciary net position for the year then ended, and the related notes to the financial statements, which collectively comprise the System's basic financial statements as listed in the table of contents.

#### Management's Responsibility for the Financial Statements

Management is responsible for the preparation and fair presentation of these financial statements in accordance with U.S. generally accepted accounting principles; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error.

#### Auditors' Responsibility

Our responsibility is to express an opinion on these financial statements based on our audit. We conducted our audit in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditors' judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. Accordingly, we express no such opinion. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

## Financial Section

#### **Opinion**

In our opinion, the financial statements referred to above present fairly, in all material respects, the fiduciary net position of the State of Alaska Teachers' Retirement System as of June 30, 2015, and the changes in fiduciary net position for the year then ended, in accordance with U.S. generally accepted accounting principles.

#### Other Matters

Prior-Year Comparative Information

We have previously audited the System's 2014 financial statements, and we expressed an unmodified opinion on those financial statements in our report dated December 9, 2014. In our opinion, the summarized comparative information presented herein as of and for the year then ended June 30, 2014 is consistent, in all material respects, with the audited financial statements from which it has been derived.

#### Required Supplementary Information

U.S. generally accepted accounting principles require that the management's discussion and analysis on pages 15-23, and the schedule of changes in employer net pension liability and related ratios, schedule of employer and nonemployer contributions, schedule of investment returns, schedule of funding progress, and schedule of contributions from employers and the state of Alaska on pages 46-62 be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the GASB, which considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audit of the basic financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

#### Supplemental Schedules

Our audit was conducted for the purpose of forming opinions on the financial statements that collectively comprise the System's basic financial statements. The supplemental schedules on pages 64-65 are presented for purposes of additional analysis and are not a required part of the basic financial statements. The supplemental schedules are the responsibility of management and were derived from and relate directly to the underlying accounting and other records used to prepare the basic financial statements. Such information has been subjected to the auditing procedures applied in the audit of the basic financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the basic financial statements or to the basic financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the supplemental schedules are fairly stated in all material respects in relation to the basic financial statements as a whole.



December 4, 2015

Teachers' Retirement System
(A Component Unit of the State of Alaska)

## Management's Discussion and Analysis (Unaudited)

June 30, 2015

(With summarized financial information for June 30, 2014 and 2013)

This section presents management's discussion and analysis (MD&A) of the Teachers' Retirement System's (System) financial position and performance for the year ended June 30, 2015. This section is presented as a narrative overview and analysis. Please read the MD&A in conjunction with the financial statements, notes to financial statements, required supplementary information, and supplemental schedules to better understand the financial condition and performance of the System during the fiscal year ended June 30, 2015.

#### Financial Highlights

The System's financial highlights as of June 30, 2015 were as follows:

- The System's fiduciary net position restricted for pension and postemployment healthcare benefits increased by \$1.87 billion during fiscal year 2015.
- The System's plan member and employer contributions increased by \$292,000 during fiscal year 2015.
- The State of Alaska directly appropriated \$2.0 billion during fiscal year 2015.
- The System's net investment income decreased \$761.4 million to \$235.9 million during fiscal year 2015.
- The System's pension benefit expenditures totaled \$416.4 million during fiscal year 2015.
- The System's postemployment healthcare benefit expenditures totaled \$109.7 million in fiscal year 2015.

#### Overview of the Financial Statements

This discussion and analysis is intended to serve as an introduction to the System's financial statements. The System's financial statements are composed of three components: (1) combining statement of fiduciary net position, (2) combining statement of changes in fiduciary net position, and (3) notes to the financial statements. This report also contains required supplementary information and other supplemental schedules.

Combining Statement of Fiduciary Net Position – This statement presents information regarding the System's assets, liabilities, and resulting net position restricted for pension benefits, postemployment healthcare benefits, and individuals. This statement reflects the System's investments at fair market value, along with cash and short-term investments, receivables, and other assets less liabilities at June 30, 2015 and 2014.

Combining Statement of Changes in Fiduciary Net Position – This statement presents how the System's net position restricted for pension and postemployment healthcare benefits changed during the fiscal years ended June 30, 2015 and 2014. This statement presents contributions and investment income during the period. Deductions for pension and postemployment healthcare benefits, refunds, and operating deductions are also presented.

The above statements represent resources available for investment and payment of benefits as of June 30, 2015 and the sources and uses of those funds during fiscal year 2015.

Teachers' Retirement System
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Notes to Financial Statements – The notes to the financial statements are an integral part of the financial statements and provide additional detailed information and schedules that are essential to a full understanding of the System's financial statements.

Required Supplementary Information and Related Notes – The required supplementary information consists of five schedules and related notes concerning the funded status of the system and actuarial assumptions and methods used in the actuarial valuation.

Supplemental Schedules – Supplemental schedules include detailed information on administrative and investment deductions incurred by the System and payments to consultants (other than investment advisors) for professional services.

#### **Condensed Financial Information** (In thousands)

System net position

			_	Increase (		
Description		2015	2014	Amount	Percentage	2013
Assets:						
Cash and cash equivalents	\$	159,119	204,330	(45,211)	(22.1)% \$	81,133
Due from State of Alaska						
General Fund		8,798	3,933	4,865	123.7	4,177
Contributions receivable		4,039	4,317	(278)	(6.4)	5,711
Other receivables		87	3	84	2,800.0	5
Due from Retiree Health Fund		_	_	_	_	1
Investments, at fair value		8,027,200	6,113,985	1,913,215	31.3	5,283,803
Other assets	_	711	1,497	(786)	(52.5)	1,179
Total assets	_	8,199,954	6,328,065	1,871,889	29.6	5,376,009
Liabilities:						
Accrued expenses		4,748	3,989	759	19.0	4,639
Claims payable		14,451	18,979	(4,528)	(23.9)	20,062
Forfeitures payable to employers		7,592	5,997	1,595	26.6	4,498
Due to State of Alaska General Fund	_	4,425	374	4,051	1,083.2	1,838
Total liabilities	_	31,216	29,339	1,877	6.4	31,037
Net position	\$	8,168,738	6,298,726	1,870,012	29.7% \$	5,344,972

Teachers' Retirement System
(A Component Unit of the State of Alaska)

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June 30, 2015

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Changes in system net position

			system net position	Increase (		
Description		2015	2014	Amount	Percentage	2013
Net position, beginning of year	\$	6,298,726	5,344,972	953,754	17.8% \$	4,783,937
Additions:						
Contributions		163,251	162,959	292	0.2	163,551
Nonemployer contribution -						
State of Alaska		2,000,000	316,846	1,683,154	531.2	302,777
Net investment income		235,889	997,262	(761,373)	(76.3)	608,251
Other additions	_	15,441	6,254	9,187	(14.3)	4,173
Total additions	_	2,414,581	1,483,321	931,260	62.8	1,078,752
Deductions:						
Pension and postemployment						
healthcare benefits		526,094	513,395	12,699	2.5	501,120
Refund of contributions		9,232	7,739	1,493	19.3	6,405
Administrative	_	9,243	8,433	810	9.6	6,945
Total deductions		544,569	529,567	15,002	2.8	514,470
Less adjustment to beginning of position						3,247
Increase in net position	_	1,870,012	953,754	916,258	96.1	561,035
Net position, end of year	\$	8,168,738	6,298,726	1,870,012	29.7% \$	5,344,972

#### Financial Analysis of the System

The statements of fiduciary net position as of June 30, 2015 and 2014 show net position restricted for pension benefits, postemployment healthcare benefits, and individuals of \$8,168,738,000 and \$6,298,726,000, respectively. The entire amount is available to cover the System's obligations to pay pension and postemployment healthcare benefits to its members and their beneficiaries, as well as administrative costs.

During the Twenty-Eighth Alaska State Legislature and as part of the State's Fiscal Year 2015 Capital Budget, Senate Bill 119 appropriated \$2 billion from the Constitutional Budget Reserve Fund to the Department of Administration for deposit in the Defined Benefit Pension and the Alaska Retiree Healthcare Trust funds. In addition, House Bill 385 specified that the level percent of pay methodology based on amortization of the past service liability for a closed term of 25 years would be used in the calculation of the appropriate contribution rate for liquidating the past service liability of the TRS DB Plan.

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These amounts represent an increase in the System's net position restricted for pension benefits, postemployment healthcare benefits, and individuals of \$1,870,012,000 or 29.7% from fiscal year 2014 to 2015 and \$953,754,000 or 17.8% from fiscal year 2013 to 2014. Over the long term, plan member, employer, and nonemployer contributions, as well as investment income earned, are expected to sufficiently fund the pension benefit and postemployment healthcare costs of the System.

The investment of pension funds is a long-term undertaking. On an annual basis, the Alaska Retirement Management Board (the Board) reviews and adopts an asset allocation strategy to ensure the asset mix will remain at an optimal risk/return level given the System's constraints and objectives.

#### System Asset Allocation

During fiscal years 2015 and 2014, the Board adopted the following asset allocation for the Defined Benefit Pension Plan (DB Plan) and Defined Contribution Pension Plan's (DC Plan) retiree major medical insurance fund, health reimbursement, and occupational death and disability fund:

	2015	2015		
	Pension and Heal	thcare Trust		
	Allocation	Range		
Broad domestic equity	26.0%	± 6%		
Global equity ex-U.S.	25.0	± 4		
Private equity	9.0	± 5		
Real assets	17.0	± 8		
Absolute return	5.0	± 4		
Fixed composite	12.0	± 8		
Alternative equity strategies	3.0	-2/+4		
Cash equivalents	3.0	-3/+8		
Total	100.0%			
Expected return five-year geometric mean	7.22%			
Projected standard deviation	15.01			
	2014			
	Pension and He	althcare Trust		
	Allocation	Range		
Broad domestic equity	26.0%	± 6%		
Global equity ex-U.S.	25.0	± 4		
Private equity	9.0	± 5		
Real assets	17.0	± 8		
Absolute return	5.0	± 4		
Fixed composite	12.0	± 5		
Alternative equity strategies	3.0	± 2		
Cash equivalents	3.0	-3/+1		
Total	100.0%			
Expected return five-year geometric mean	7.16%			
Projected standard deviation	14.81			

For fiscal years 2015 and 2014, the DB Plan's investments generated a 3.30% and 18.46% rate of return, respectively.

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(With summarized financial information for June 30, 2014 and 2013)

#### Contributions, Investment Income, and Other Additions

The additions required to fund retirement benefits are accumulated through a combination of employer and plan member contributions, State of Alaska appropriation, investment income, and other additions as follows:

	<b>Additions</b> (In thousands)									
		Increase (decrease)								
	_	2015	2014	Amount	Percentage	2013				
Plan member contributions	\$	68,002	68,313	(311)	(0.5)%	68,495				
Employer contributions		95,249	94,646	603	0.6	95,056				
Nonemployer contributions – State										
of Alaska		2,000,000	316,846	1,683,154	531.2	302,777				
Net investment income		235,889	997,262	(761,373)	(76.3)	608,251				
Other additions		15,441	6,254	9,187	146.9	4,173				
Total	\$	2,414,581	1,483,321	931,260	62.8%	1,078,752				

The System's employer contributions increased from \$94,646,000 in fiscal year 2014 to \$95,249,000 in fiscal year 2015, an increase of \$603,000 or 0.6%. The System's employer contributions decreased from \$95,056,000 in fiscal year 2013 to \$94,646,000 in fiscal year 2014, a decrease of \$410,000 or 0.4%. The decrease in employer contributions is attributable to a decrease in the active DB Plan membership.

The State of Alaska provided \$2 billion for fiscal year 2015 and \$316,846,000 for fiscal year 2014 in nonemployer contributions as required by Alaska Statute (AS) 14.25.085. The employer on-behalf amount (or additional state contribution as defined in AS 14.25.085) is calculated by the System's actuary. It is based on projected payroll and the difference between the actuarially determined contribution rate and the statutory effective rate. The employer effective contribution rate of 12.56% is established in AS 14.25.070(a). In fiscal year 2015, in an effort to bolster the funding levels of both pension and healthcare defined benefit plans, the Alaska legislature appropriated an amount in excess of the actuarially determined contribution rate, in anticipation that this additional funding would decrease future nonemployer contributions.

The System's net investment income in fiscal year 2015 decreased by \$761,373,000 or 76.3% from amounts recorded in fiscal year 2014. The System's net investment income in fiscal year 2014 increased by \$389,011,000 or 64.0% from amounts recorded in fiscal year 2013. Over the long term, investment income has been a major component of additions to System assets.

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The System's investment rates of return at June 30 are as follows:

	Year ended					
	2015	2014	2013			
System returns	3.30%	18.46%	12.59%			
Domestic equities	7.85	25.45	21.24			
International equities	(3.28)	23.41	15.03			
Private equity	13.77	24.19	11.68			
Real assets	3.69	12.71	10.65			
Absolute return	9.24	6.51	8.41			
Fixed income	(0.73)	5.14	0.57			
Alternative equity	(0.88)	24.55	_			
Cash equivalents	0.27	0.26	0.25			
Actuarial rate of return	8.00	8.00	8.00			

#### **Benefits and Other Deductions**

The primary deduction of the DB Plan is the payment of pension and postemployment healthcare benefits. The primary deduction of the DC Plan is the refund of contributions. These benefit payments, healthcare claims paid, refunds of contributions, and the cost of administering the System comprise the cost of operations as follows:

	<b>Deductions</b> (In thousands)							
	_			Increase (d	lecrease)			
		2015	2014	Amount	Percentage	2013		
Pension benefits	\$	416,354	396,614	19,740	5.0% \$	380,265		
Postemployment healthcare benefits		109,740	116,781	(7,041)	(6.0)	120,855		
Refund of contributions		9,232	7,739	1,493	19.3	6,405		
Administrative		9,243	8,433	810	9.6	6,945		
Total	\$	544,569	529,567	15,002	2.8% \$	514,470		

The System's pension benefit payments in 2015 increased \$19,740,000 or 5.0% from fiscal year 2014 and increased \$16,349,000 or 4.3% from fiscal year 2013. The increase in pension benefits in fiscal year 2014 is the result of an increase in the number of retirees.

The System's postemployment healthcare benefit payments in fiscal year 2015 decreased \$7,041,000 or 6.0% from fiscal year 2014 and decreased \$4,074,000 or 3.4% from fiscal year 2013. The Division contracted with two new TPAs in January 2014, both of whom use networks to help reduce healthcare benefit costs. Currently, the System's DB healthcare trust is benefiting through the use of the networks provided by the TPAs by seeing lower costs from the prior TPA, as well as reduced annual cost increases percentage wise.

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The System's refund of contributions increased \$1,493,000 or 19.3% from fiscal year 2014 and increased \$1,334,000 or 20.8% from fiscal year 2013. The increase in refunds is primarily in the DC Plan, where refunds increased \$1,689,000 between fiscal year 2014 to 2015, and increased \$1,615,000 from fiscal year 2013 to 2014. The System continues to look at ways to retain member contributions by emphasizing the low investment costs to members to maintain funds within the DC Plan, with a number of investment options available.

The System's administrative deductions in 2015 increased \$810,000 or 9.6% from fiscal year 2014 and increased \$1,488,000 or 21.4% from fiscal year 2013. The increase in administrative costs in fiscal year 2014 is related to an increase in contractual services related to data processing and the health insurance third-party administrator transition project member fees.

#### **Net Pension Liability**

GASB Statement No. 67, implemented in 2014, requires the DB Plan to report the Total Pension Liability (TPL), Fiduciary Net Position (FNP), and the Net Pension Liability (NPL). The TPL determines the total obligation for the DB Plan's pension benefits related to costs incurred as a result of years of service, changes in benefit terms, changes in actuarial assumptions, and any differences between the actuarial assumptions and actual experience. The DB Plan's FNP determines the assets available to pay the DB Plan's future payment stream. The assets are derived from contributions received from participating employers, plan members, and nonemployer contributions, as well as investment earnings, less benefit payments during the year and the related costs to administer the DB Plan. The difference between the TPL and FNP is the NPL, or the unfunded portion of the TPL. The components of the NPL of the participating employers were as follows (in thousands):

	_	2015	2014
Total pension liability	\$	7,107,406	6,770,201
Plan fiduciary net position	_	(5,246,955)	(3,771,139)
Employers' net pension			
liability	\$	1,860,451	2,999,062
Plan fiduciary net position as a percentage			
of the total pension liability		73.82%	55.70%

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#### **Funding**

Retirement benefits are financed by accumulations from employers, plan members, State of Alaska nonemployer contributions, and income earned on System investments.

- The employer contribution rate is determined by the System's consulting actuary and considered for adoption by the Board annually. AS 14.25.070(a) sets the employer effective contribution rate at 12.56%. The difference between the actuarially determined contribution rate adopted by the Board and the statutory employer effective rate is paid by the State of Alaska as a direct nonemployer contribution per AS 14.25.085.
- AS 14.25.085 requires that additional state contributions are made each July 1 or as soon after July 1 for the ensuing fiscal year that when combined with the total employer contributions are sufficient to pay the System's past service liability at the contribution rate adopted by the Board for that fiscal year.
- Plan member contributions are established by AS14.25.050 for the DB Plan and AS 14.25.340 for the DC Plan.
- The Board works with an external consultant to determine the proper asset allocation strategy.

#### Legislation

During fiscal year 2015, the Twenty-Ninth Alaska State Legislature enacted one law that affects the System:

House Bill 2001 appropriates \$130.1 million from the general fund to the Department of Administration for deposit in the System's defined benefit pension fund and the retiree healthcare trust as partial payment of the participating employers' contribution for fiscal year ending June 30, 2016. This appropriation is to fund the difference between the statutory required contribution of 12.56% paid by participating employers for both defined benefit and defined contribution members, and the actuarially determined contribution rate adopted by the Board for that fiscal year, and is specified in Alaska Statute 14.25.085 – Additional State Contributions.

#### Economic Conditions, Future Contribution Rates, and Status of Unfunded Liability

Fiscal year 2015 was another year of positive, but significantly lower investment returns than fiscal year 2014. Net investment income decreased from \$997,262,000 in fiscal year 2014 to \$235,889,000 in fiscal year 2015, a decrease of \$761,373,000 or 76.3%. The return on the System's investments was less than one-half the actuarially assumed return of 8.00% with the System's rate of return of 3.30% at June 30, 2015. In fiscal year 2014, the System's investments returned 18.56%, more than twice the actuarially assumed return of 8.00%. The Board continues to work with its investment counsel and the Alaska Department of Revenue, Treasury Division, to diversify the portfolio of the System to maintain an optimal risk/return ratio.

The consulting actuary recommended an increase from the System's actuarially determined contribution rate of 53.62% in fiscal year 2014 to 70.75% in fiscal year 2015. The Board adopted the fiscal year 2015 actuarially determined

## Teachers' Retirement System (A Component Unit of the State of Alaska)

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contribution rate of 70.75%, which represented an increase of 17.13%. The statutory employer effective contribution rate remained at 12.56% for fiscal years 2015 and 2014.

The June 30, 2014 and 2013 actuarial valuation reports for the DB Plan reported funding ratios based on valuation assets of 61.2% and 51.9%, respectively, as well as unfunded liabilities of \$3.8 billion and \$4.6 billion, respectively.

The System expects a decline in the DB Plan's recommended actuarially determined contribution rate and a corresponding increase in the pension and healthcare funding ratios as of the June 30, 2015 actuarial valuation report with the infusion of \$2 billion appropriated from the Constitutional Budget Reserve Fund during fiscal year 2015. Additionally, due to statutory changes implemented by the Alaska Legislature in conjunction with the \$2 billion infusion to the TRS DB pension and DB healthcare plans, the statute (1) established the level percentage of pay approach as a replacement to the level dollar approach and (2) reset the 25-year amortization period. Beginning July 1, 2014, actuarial projections reflect that the required additional state contribution would be significantly reduced for a period of time.

For fiscal years 2015 and 2014, the DC Plan's employer contribution rate was established by Alaska statute at 12.56%. The DC Plan's actuarially determined occupational death and disability rate was adopted by the Board to be 0.00%. The DC Plan retiree medical plan actuarially determined contribution rate was adopted by the Board to be 2.04% and 0.47%, respectively.

#### Requests for Information

This financial report is designed to provide a general overview of the finances for all those with interest in the finances. Questions concerning any of the information provided in this report or requests for additional information should be addressed to:

State of Alaska Teachers' Retirement System
Division of Retirement and Benefits, Finance Section
P.O. Box 110203
Juneau, Alaska 99811-0203

Questions concerning any of the investment information provided in this report or requests for additional investment information should be addressed to:

State of Alaska Department of Revenue, Treasury Division P.O. Box 110405 Juneau, Alaska 99811-0405

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## **Combining Statement of Fiduciary Net Position**

June 30, 2015 (With summarized financial information for June 30, 2014)

(In thousands)

Personal p		Other Postemployment Benefit Plans							
Secretary   Secr		Benefit	Contribution	Healthcare	Occupational Death and	Retiree	Healthcare Reimbursement	Total	Total
Column   C	Acerte						g		<u></u>
Trail only and early experiences 19,000	Cash and cash equivalents (note 3 and 4): Short-term fixed income pool	\$ 90,096		59,171	74	562	1,567		
Secondarian   Social Secondaria	Empower money market fund - nonparticipant directed		1,461					1,461	4,045
Contributions	Total cash and cash equivalents	90,096	7,649	59,171	74	562	1,567	159,119	204,330
December of Alaska's Center Hard Fund   478   2.17   1.88   10   25   260   8.78   3.33									
Profess									
Total control		4,/16						0,/90	5,955
International equity		87						87	3
Front income securities	Total receivables	8,717	2,181	1,443	10	303	270	12,924	8,253
Tranker ministry lands   289,689   - 143,232   74   951   3,251   47,257   352,588	Investments (notes 3, 4, and 5), at fair value:								
Tacable monicpal bones   49,887   - 4,4666   30   164   500   75,307   64,032   Tacatol fine flownene pool   26,707   - 13,250   16   80   101   104,000   Tacatol fine flownene pool   35,709   - 14,718   51   277   947   127,333   108,031   Termitron fine flownene pool   35,709   - 17,868   21   177   947   127,333   108,031   Tond fixed home securities   - 23,117   - 308,119   374   2,045   6,094   940,709   74,0785   Tanglares debt pool   171,467   - 579,206   703   3,443   13,147   1,766,356   135,4393   Tanglares pop pool   171,467   - 579,206   703   3,443   13,147   1,766,356   135,4393   Tanglares pop pool   171,467   - 579,206   703   3,443   13,147   1,766,356   135,4393   Tanglares pop pool   120,1454   - 70,4521   855   4,675   15,092   2,150,973   1,654,727   Tanglares pop pool   100,1894   - 593,868   655   3,582   12,255   1,648,254   1,117,789   Tanglares quipy multipool   1,100   - 353,033   43   234   801   107,781   23,086   Termitron dequipy multipool   1,100   - 64,233   782   24,255   1,668,254   1,117,789   Termitron dequipy multipool   1,150   - 64,233   782   24,255   1,662   1,567,071   1,469,056   Tanglares parkes equipy pool   1,150   - 64,233   783   43   43   13   1,100   23,435   Tanglares parkes equipy pool   1,150   - 64,233   783   43   43   13   1,100   23,435   Tanglares parkes equipy pool   1,150   - 64,233   783   43   43   1,100   23,435   Tanglares parkes equipy pool   1,150   - 64,233   783   43   43   1,100   23,435   Tanglares parkes equipy pool   1,150   - 64,233   783   1,100   2,100   2,100   Tanglares parkes pool   1,150   - 64,233   783   1,100   2,100   2,100   Tanglares parkes pool   1,150   - 73									
Tactical fixed income pool			_						
High yield fixed income pool			_						04,052
Immirational fixed income pool   84,365     41,715     277   947   127,353   108,908   21     204			_						162,623
Total fixed income securities			_		51				
Read stanctic equity:	Emerging markets debt pool	35,759		17,680	21	117	401	53,978	44,199
Large cap pool         1,171,457         —         579,206         703         3,843         1,147         1,768,569         1,849,819           Small cap pool         253,545         —         15,515         15.2         823         2,968,31         1         29,848,41         1         1,849,819         29,848,41         1         1,877,82         1,245,107         1         29,848,41         1         1,877,89         1,8	Total fixed income securities	623,177	_	308,119	374	2,045	6,994	940,709	734,985
Large cap pool         1,171,457         —         579,206         703         3,843         1,147         1,768,569         1,849,819           Small cap pool         253,545         —         15,515         15.2         823         2,968,31         1         29,848,41         1         1,849,819         29,848,41         1         1,877,82         1,245,107         1         29,848,41         1         1,877,89         1,8	Broad domestic equity:								
Broad international equity:	Large cap pool		_						
Private quity pool	Small cap pool	253,453		125,315		832	2,845	382,597	299,834
International equity proof   1,091,894   — \$339,868   655   3,582   12,255   1,648,254   1,187,789   1,187,189   1,187,189   1,187,189   1,187,189   1,187,189   1,187,189   1,187,189   1,189,180   1,190	Total broad domestic equity	1,424,910		704,521	855	4,675	15,992	2,150,953	1,654,727
International equity small cap pool	Broad international equity:								
Fromier market pool	International equity pool		_						
Emerging markets equity pool 138,066 — 64,293 782 4.275 14,625 19,670,71 1,489,056 Total broad international equity 151,623 — 74,067 91 497 1,702 228,880 20,538 Convertible bond pool 43,513 — 72,1514 26 143 488 65,684 260,008 Private equity pool 43,605 — 96,6481 117 640 2,190 24,564 260,008 Private equity pool 403,605 — 195,556 242 1,324 4,530 609,257 498,442 Aboute return pool 298,331 — 147,505 179 979 3,348 493,342 226,889 Aboute return pool 298,331 — 147,505 179 979 3,348 493,342 226,889 Aboute return pool 298,331 — 147,505 179 979 3,348 493,342 226,889 Aboute return pool 298,331 — 147,505 179 979 3,348 493,342 236,889 Aboute return pool 36,343 — 33,343 38 208 712 95,573 — 147,575 Aboute return pool 36,343 — 31,333 38 208 712 95,573 — 147,575 Aboute return pool 36,343 — 31,333 38 208 712 95,573 — 147,575 Aboute private pool 36,343 — 31,333 38 208 712 95,573 — 147,575 Aboute private private pool 35,538 — 27,371 33 182 621 83,565 47,537 Aboute private pool 32,466 — 11,103 13 74 252 33,898 30,854 Aboute private private pool 32,466 — 11,103 13 74 252 33,898 30,854 Aboute private private pool 34,662 — 41,859 51 278 950 17,800 103,801 Transur private pool 34,662 — 446,85 542 2,963 10,134 1,364,218 10,268,25 Aboute provided investment funds — 132,377 — — — — — — 132,377 10,005 10,3801 Transur private pool 34,662 — 446,85 542 2,963 10,134 1,364,218 1,026,855 Aboute provided investment funds — 132,377 — — — — — — — — — — 17,700 10,675 Collective measured funds — — — — — — — — — — — — — — — — — — —	International equity small cap pool		_						
Total broad international equity	Frontier market pool		_				13	1,805	
Alternative equity: Alternative equity: Alternative equity: Alternative equity: Alternative equity: Alternative equity:  151,623									
Alternative equity   51,623		1,303,096		044,293	/82	4,2/3	14,023	1,96/,0/1	1,489,056
Convertible bond pool   43,513     21,514   26   143   488   56,647   26,008	Alternative equity:	151 (22		74.067	0.1	407	1.703	220 000	202 520
Total alternative equity   195,136			_						
Privace equity pool         403,605         —         199,556         242         1,324         4,530         609,257         498,442           Absolute return pool         298,331         —         147,505         179         979         3,348         450,342         236,850           Real sesters         —         147,505         179         979         3,348         450,342         236,850           Real sesters         —         143,389         174         952         3,254         438,844         383,978           Real estate investment trust pool         63,432         —         35,577         43         236         808         108,619         104,798           Infrastructure public pool         55,358         —         27,371         33         182         621         83,565         47,537           Master limited partnership pool         115,919         —         57,314         70         380         1,301         14,9006           Energy pool         22,456         —         11,103         13         74         252         33,898         30,854           Farmland pool         160,838         —         83,973         102         557         1,906         256,776	*								
Absolute return pool   298,331	* *								
Real assets:         Real estate pool         291,075         —         143,389         174         952         3,254         438,844         383,978           Real estate pool         71,955         —         35,577         43         236         808         108,619         104,798           Infrastructure private pool         63,432         —         31,363         38         208         712         95,753         —           Master limited partnership pool         115,919         —         57,314         70         380         1,301         174,984         140,906           Energy pool         22,456         —         11,103         13         74         252         33,898         30,884           Farmland pool         169,838         —         83,973         102         557         1,906         256,376         204,863           Timber pool         84,662         —         418,59         51         278         50         127,800         103,801           Total real assets         904,094         —         446,485         542         2,963         10,134         1,364,218         1,026,825           Other investment funds         —         117,709         —         —									
Real estrate pool         291,075         —         143,389         174         952         3,254         438,844         333,978           Real estrate investment trust pool         63,432         —         31,563         38         208         712         95,753         —           Infrastructure piviate pool         63,432         —         31,363         38         208         712         95,753         —           Infrastructure public pool         15,538         —         27,711         33         182         621         83,565         47,537           Master limited partnership pool         115,919         —         75,7314         70         380         1,301         174,984         140,906           Energy pool         22,456         —         11,103         13         74         252         33,898         30,885           Farmland pool         168,838         —         88,973         102         557         19,06         255,376         204,863           Tresury inflation protected securities pool         29,399         —         145,366         18         96         330         44,379         10,068           Total real sasets         —         12,327         —         — <td>•</td> <td>298,331</td> <td></td> <td>147,505</td> <td>179</td> <td>979</td> <td>3,348</td> <td>450,342</td> <td>236,850</td>	•	298,331		147,505	179	979	3,348	450,342	236,850
Real estate investment trust pool (54,342 — 35,577 43 236 808 108,619 104,798 Infrastructure private pool (63,432 — 31,363 38 208 712 95,753 — 1,000 105,000 115,000 115,000 115,000 — 57,314 70 380 1.30 174,984 140,906 115,000 — 57,314 70 380 1.30 174,984 140,906 115,000 — 57,314 70 380 1.30 174,984 140,906 115,000 — 57,314 70 380 1.30 174,984 140,906 100,900 115,0		201.075		1.62.200	174	052	2.254	420.044	202.070
Infrastructure private pool         63.432 b         —         31.363 b         38 b         208 b         712 b         95.753 b         —           Infrastructure public pool         55.588 b         —         27.371 b         33 b         182 b         621 b         83.565 b         47.537 b           Master limited partnership pool         115.919 b         —         57.314 b         70 b         380 b         1.301 b         174.984 b         140.906 b           Farmland pool         169.838 b         —         83.973 b         102 b         557 b         1.906 b         256.376 b         204.863 b           Timber pool         84.62 b         —         41.859 b         51 b         278 b         59 b         127.800 b         103.801 b           Timber pool         84.62 b         —         446.485 b         542 b         2.963 b         10.134 b         1,364.218 b         10.088 b           Total cral assets         904.094 b         —         446.485 b         542 b         2.963 b         10.134 b         1,364.218 b         1,026.825 b           Collective investment funds, a fair value:         —         —         —         —         —         —         —         —         107.65 b         107.65 b			_						
Infrastructure public pool   55,558   — 27,371   33   182   621   83,565   47,575			_						
Energy pool         22,456         —         11,103         13         74         252         33,898         30,854           Farmland pool         169,838         —         83,973         102         557         1,066         25,636         204,863           Timber pool         84,662         —         41,859         51         278         950         127,800         103,801           Treasury inflation protected securities pool         29,399         —         14,536         18         96         330         44,379         10,088           Total real assets         904,094         —         446,485         542         2,963         10,134         1,364,218         1,026,825           Other investment funds, at fair value:         —         —         —         —         —         —         —         132,377         107,675           Collective investment funds         —         1117,709         —         —         —         —         117,709         105,417           Total other investment funds         —         250,086         —         —         —         —         —         117,709         105,417           Total other investment funds         —         250,086         2	Infrastructure public pool	55,358	_	27,371				83,565	
Farmland pool         169,838         —         83,973         102         557         1,906         256,376         204,863           Timber pool         84,62         —         41,859         51         278         95         127,800         103,801           Total reasury inflation protected securities pool         29,399         —         14,536         18         96         330         44,379         10,088           Total real assets         904,094         —         446,485         542         2,963         10,134         1,364,218         1,026,825           Orbital six structures funds, at fair value:           Pooled investment funds         —         132,377         —         —         —         —         132,377         107,675           Collective investment funds         —         117,709         —         —         —         —         —         117,709         105,475           Total other investment funds         —         250,086         —         —         —         —         —         —         117,709         105,419           Total assets         5,152,349         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,									
Timber pool Treasury inflation protected securities pool         84,662 — 41,859 — 51 — 278 — 950 — 127,800 — 103,801 — 10,088 — 10,088 — 11,536 — 18 — 96 — 96,000 — 10,									
Treasury inflation protected securities pool         29,399         —         14,536         18         96         330         44,379         10,088           Total real assets         904,094         —         446,485         542         2,963         10,134         1,364,218         1,026,825           Ober investment funds, at fair value:           Pooled investment funds         —         132,377         —         —         —         —         132,377         107,675           Collective investment funds         —         1117,709         —         —         —         —         117,709         105,475           Total other investment funds         —         250,086         —         —         —         —         —         —         105,047         105,475           Total other investment funds         —         250,086         —         —         —         —         —         —         —         —         132,377         105,475           Total other investment funds         —         —         —         —         —         —         —         —         —         —         —         —         —         —         —         —         —         — <t< td=""><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>									
Total real assets         904,094         —         446,485         542         2,963         10,134         1,364,218         1,026,825           Other investment funds, at fair value:         —         —         —         —         —         —         132,377         —         —         —         —         132,377         107,675           Collective investment funds         —         —         117,709         —         —         —         117,709         105,475           Total other investment funds         —         250,086         —         —         —         —         —         250,086         213,092           Total other investments         5,152,349         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,113,985           Other assets         —         —         711         —         —         —         711         1,497           Total assets         5,251,162         259,916         2,608,285         3,175         17,766         59,650         8,199,594         6,328,065           Liabilities           Acrused expenses         3,985         76         676         11         —         —			_						
Other investment funds, at fair value:         —         132,377         —         —         —         132,377         107,675           Pooled investment funds         —         117,709         —         —         —         117,709         105,417           Collective investment funds         —         250,086         —         —         —         —         250,086         213,092           Total other investments         5,152,349         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,113,985           Other assets         —         —         711         —         —         —         711         1,497           Total assets         5,251,162         259,916         2,608,285         3,175         17,766         59,650         8,199,594         6,328,065           Liabilities         —         —         —         711         —         —         —         711         1,497           Accounced expenses         3,985         76         676         11         —         —         4,748         3,899           Claims payable (note 8)         —         —         14,451         —         —         4,1451 <td< td=""><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></td<>									
Pooled investment funds         —         132,377         —         —         —         —         132,377         107,675           Collective investment funds         —         117,709         —         —         —         117,709         105,475           Total other investment funds         —         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,113,985           Other assets         —         —         711         —         —         —         711         1,497           Total assets         —         —         711         —         —         —         —         711         1,497           Liabilities         —         —         711         —         —         —         —         711         1,497           Accrued expenses         3,985         76         676         11         —         —         —         4,788         3,989           Claims payable (note 8)         —         7,592         —         14,512         —         —         4,759         5,997           Due to State of Allaska General Fund         —         2,232         —         4,192         11         —         —		,01,0)1		110,109		2,703	10,151	1,501,210	1,020,029
Collective investment funds         —         117,709         —         —         —         —         117,709         105,417           Total other investment funds         —         250,086         —         —         —         —         —         250,086         213,092           Total investments         5,152,349         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,113,985           Other assets         —         —         711         —         —         —         711         1,497           Total assets         5,251,162         259,916         2,608,285         3,175         17,66         59,650         8,199,954         6,328,065           Liabilities           Accorded expenses         3,985         76         676         11         —         —         4,748         3,895           Claims payable (note 8)         —         —         14,451         —         —         4,461         18,979           Forficiture payable         —         7,592         —         —         —         7,592         5,997           Due Ostate of Alaska General Fund         222         —         4,192		_	132 377	_	_	_	_	132 377	107 675
Total investments         5,152,349         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,113,985           Other assets         —         —         711         —         —         —         711         1,497           Total assets         5,251,162         259,916         2,608,285         3,175         17,766         59,650         8,199,954         6,328,065           Labilities         *** Accrued expenses**           Accrued expenses         3,985         76         676         11         —         —         4,748         3,989           Claims payable (note 8)         —         —         14,451         18,979									
Total investments         5.152,349         250,086         2,546,960         3,091         16,901         57,813         8,027,200         6,113,985           Other assets         —         —         711         —         —         —         711         1,497           Total assets         5,251,162         259,916         2,608,285         3,175         17,766         59,650         8,199,954         6,328,065           Lishlities         *** Accrued expenses**           Accrued expenses         3,985         76         676         11         —         —         4,748         3,989           Claims payable (note 8)         —         —         14,451         18,979           Porfeiture payable         —         —         14,451         18,979           Porfeiture payable         —         —         4,192         11         —         —         4,445         3,599           Due to State of Allskia General Fund         222         —         4,192         11         —         —         4,445         3,74           Total liabilities         4,207         7,668         19,319         22         —         9         4,025         374           Net positio	Total other investment funds		250,086					250,086	213,092
Other assets         —         711         —         —         711         1,497           Total assets         5,251,162         259,916         2,608,285         3,175         17,766         59,650         8,199,954         6,328,065           Liabilities         8         76         676         11         —         —         4,748         3,989           Claims payable (note 8)         —         —         14,451         —         —         4,451         18,979           For ficture payable         —         7,592         —         —         —         7,592         5,997           Due to State of Alaska General Fund         222         —         4,192         11         —         —         4,425         374           Total liabilities         4,207         7,668         19,319         22         —         —         31,216         29,339           Net position held in trust for pension benefits,         —         —         7,668         19,319         22         —         —         3,1216         29,339	Total investments	5,152,349	250,086	2,546,960	3,091	16,901	57,813	8,027,200	6,113,985
Total assets         5,251,162         259,916         2,608,285         3,175         17,766         59,650         8,199,954         6,328,065           Liabilities:              1         -         -         4,748         3,989           Claims payable (note 8)         -         -         -         14,451         -         -         4,1451         18,979           Forfeiture payable         -         7,592         -         -         -         -         7,592         5,997           Due State of Aska Gereal Fund         222         -         4,192         11         -         -         4,425         374           Total liabilities         4,207         7,668         19,319         22         -         -         31,216         29,339           Net position held in trust for pension benefits,         -         -         4,628         19,319         22         -         -         31,216         29,339	Other assets	_	_		_	_	_		
Liabilities:		5 251 162	259 916		3 175	17 766	59.650		
Accrued expenses 3,985 76 676 11 — 4,748 3,989 Claims papable (note 8) — 1,451 — — 4,748 1,899 Forfeiture payable (note 8) — 7,592 — — — 7,592 5,997 Due to State of Alsaka General Fund 222 — 4,192 11 — 4,425 374 Total liabilities 4,207 7,668 19,319 22 — 31,216 29,339 Net position held in trust for pension benefits,		5,251,102	233,310	2,000,20)	3,173	17,700	37,070	0,177,774	0,320,003
Claims payable (note 8)		3 985	76	676	11	_	_	4 748	3 989
Forfiture payable — 7,592 — — — 7,592 5,997 Due to State of Alaska General Fund 222 — 4,192 11 — 4,425 374  Total liabilities 4,207 7,668 19,319 22 — 31,216 29,339  Net position held in trust for pension benefits,							_	14,451	
Total liabilities         4,207         7,668         19,319         22         —         —         31,216         29,339           Net position held in trust for pension benefits,	Forfeiture payable	_	7,592	-	_	_		7,592	5,997
Net position held in trust for pension benefits,	Due to State of Alaska General Fund	222		4,192	11			4,425	374
	Total liabilities	4,207	7,668	19,319	22			31,216	29,339
	Net position held in trust for pension benefits,								
	postemployment healthcare benefits, and individuals	\$ 5,246,955	252,248	2,588,966	3,153	17,766	59,650	8,168,738	6,298,726

See accompanying notes to financial statements.

Teachers' Retirement System
(A Component Unit of the State of Alaska)

## Combining Statement of Changes in Fiduciary Net Position

Year Ended June 30, 2015 (With summarized financial information for June 30, 2014)

(In thousands)

		Other Postemployment Benefit Plans							
	_	Defined Benefit Pension	Defined Contribution Pension	Alaska Retiree Healthcare Trust	Occupational Death and Disability	Retiree Medical	Healthcare Reimbursement Arrangement	System Total June 30, 2015	System Total June 30, 2014
Additions: Contributions:									
Employers Plan members Nonemployer State of Alaska	\$	36,374 45,506 1,662,700	17,863 22,269 —	26,922 227 337,300		5,670 — —	8,420 — —	95,249 68,002 2,000,000	94,646 68,313 316,846
Total contributions	_	1,744,580	40,132	364,449		5,670	8,420	2,163,251	479,805
Investment income: Net appreciation in fair value Interest Dividends	_	75,069 18,195 68,442	5,550 15 —	36,145 9,502 35,739	43 12 45	230 52 198	801 203 765	117,838 27,979 105,189	905,490 22,803 82,141
Total investment income		161,706	5,565	81,386	100	480	1,769	251,006	1,010,434
Less investment expense	_	9,145	745	5,212	1	3	11	15,117	13,172
Net investment income		152,561	4,820	76,174	99	477	1,758	235,889	997,262
Other: Other	_	9		15,432				15,441	6,254
Total additions	_	1,897,150	44,952	456,055	99	6,147	10,178	2,414,581	1,483,321
Deductions: Pension and postemployment benefits Refunds of contributions Administrative	_	416,354 2,191 2,789	7,041 931	109,740 — 5,484		  		526,094 9,232 9,243	513,395 7,739 8,433
Total deductions	_	421,334	7,972	115,224	21	18		544,569	529,567
Net increase		1,475,816	36,980	340,831	78	6,129	10,178	1,870,012	953,754
Net position held in trust for pension benefits, postemployment healthcare benefits, and individuals: Balance, beginning of year	_	3,771,139	215,268	2,248,135	3,075	11,637	49,472	6,298,726	5,344,972
Balance, end of year	\$_	5,246,955	252,248	2,588,966	3,153	17,766	59,650	8,168,738	6,298,726

See accompanying notes to financial statements.

Teachers' Retirement System
(A Component Unit of the State of Alaska)

#### Notes to Financial Statements

June 30, 2015

(With summarized financial information for June 30, 2014)

#### (1) Description

The State of Alaska Teachers' Retirement System (TRS or the System) is a component unit of the State of Alaska (the State). The System is governed by the Alaska Retirement Management Board (the Board), which consists of nine trustees, as follows: two members, consisting of the commissioner of administration and the commissioner of revenue; two trustees who are members of the general public; one trustee who is employed as a finance officer for a political subdivision participating in either the Public Employees' Retirement System (PERS) or TRS; two trustees who are members of PERS; and two trustees who are members of TRS.

TRS acts as the common investment and administrative agency for the following multiple-employer plans:

Type of plan
Cost-sharing, Defined Benefit Pension
Defined Contribution Pension
Cost-sharing, Defined Benefit OPEB
Cost-sharing, Defined Benefit OPEB
Cost-sharing, Defined Benefit OPEB
Defined Contribution OPEB

At June 30, 2015 and 2014, the number of participating local government employers and public organizations including the State was as follows:

State of Alaska	1
School districts	53
Other	4
Total employers	58

Inclusion in the Defined Benefit Pension Plan (DB Plan) and Defined Contribution Pension Plan (DC Plan) is a condition of employment for permanent school district, University of Alaska, and State Department of Education employees who meet the eligibility requirements for participation.

#### **Defined Benefit Pension Plan**

#### General

The DB Plan provides pension benefits for teachers and other eligible members. Benefit and contribution provisions are established by State law and may be amended only by the State Legislature. With the passage of Senate Bill (SB) 141, the DB Plan is closed to all new members effective July 1, 2006.

Teachers' Retirement System
(A Component Unit of the State of Alaska)

#### Notes to Financial Statements

June 30, 2015

(With summarized financial information for June 30, 2014)

The DB Plan's membership consisted of the following at June 30, 2015:

Inactive plan members or beneficiaries currently receiving benefits	12,080
Inactive plan members entitled to but not yet receiving benefits	3,156
Active plan members	5,606
	20,842

#### Pension Benefits

Vested members hired prior to July 1, 1990 are entitled to pension benefits beginning at normal retirement age, 55, or early retirement age, 50. For members hired after June 30, 1990, the normal and early retirement ages are 60 and 55, respectively. Members may also retire at any age and receive a normal benefit when they accumulate the required credited service.

The normal annual pension benefit is based on years of service and average base salary. The average base salary is based upon the members' three highest contract years' salaries.

The benefit related to all years of credited service prior to July 1, 1990 and for years of service through a total of 20 years is equal to 2% of the employee's average base salary. The benefit for each year over 20 years of service subsequent to June 30, 1990 is equal to 2.5% of the employee's base salary.

Minimum benefits for members eligible for retirement are \$25 per month for each year of credited service.

Married members must receive their benefits in the form of a joint and survivor annuity unless their spouse consents to another form of benefit or benefits are payable under the 1% supplemental contributions provision.

The DB Plan has two types of postretirement pension adjustments (PRPA). The automatic PRPA is issued annually to all eligible benefit recipients when the cost of living increases in the previous calendar year. The automatic PRPA increase is paid beginning July 1 of each year. The discretionary PRPA may be granted to eligible recipients by the DB Plan's administrator if the cost of living in the previous calendar year rises and the financial condition of the DB Plan's permits. If both an automatic and discretionary PRPA are granted, and a retiree is eligible for both adjustments, the one that provides the retiree the greater increase will be paid.

Teachers' Retirement System
(A Component Unit of the State of Alaska)

#### **Notes to Financial Statements**

June 30, 2015

(With summarized financial information for June 30, 2014)

#### Contributions

Contributions requirements of the active plan members and the participating employers are actuarially determined and approved by the Board as an amount that, when combined, is expected to finance the costs of benefits earned by plan members during the year, with an additional amount to finance any unfunded accrued liability. The DB Plan members contribute 8.65% of their base salary as required by statute. Employer effective contribution rates are 12.56% of annual payroll. Alaska Statute 14.25.085 requires that additional state contributions made each July 1, or as soon after July 1, for the ensuing fiscal year that when combined with the total employer contributions is sufficient to pay the System's past service liability at the actuarially determined contribution rate adopted by the Board for that fiscal year. Additionally, there is a Defined Benefit Unfunded Liability (DBUL) amount levied against the DCR Plan payroll. The DBUL amount is computed as the difference between:

- (A) The amount calculated for the statutory employer contribution rate of 12.56% on eligible salary less
- (B) The total of the employer contributions for:
  - (1) The defined contribution employer matching amount
  - (2) Major medical
  - (3) Occupational death and disability and
  - (4) Health reimbursement arrangement

The difference is deposited based on an actuarial allocation into the DB Plan's pension and healthcare funds.

#### Refunds

DB Plan member contributions may be voluntarily or, under certain circumstances, involuntarily refunded to the employee or a garnishing agency 60 days after termination of employment. Voluntary refund rights are forfeited on July 1 following the member's 75th birthday or within 50 years of the member's last termination date. Members who have had contributions refunded forfeit all retirement benefits, including postemployment healthcare benefits. Members are allowed to reinstate refunded service due to involuntary refunds by repaying the total involuntary refunded balance and accrued interest. Members are allowed to reinstate voluntarily refunded service by repaying the voluntarily refunded balance and accrued interest, as long as they reestablish an employee relationship with a participating DB Plan employer before July 1, 2010. Members who have not reestablished an employee relationship with a participating DB Plan employer by June 30, 2010 will not be eligible to reinstate voluntarily refunded service and will forfeit any claim to DB Plan membership rights. Balances refunded to members accrue interest at the rate of 7.0% per annum, compounded semiannually.

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#### **Defined Contribution Retirement Plan**

#### General

The DC Plan provides retirement benefits for eligible employees hired after July 1, 2006. Benefit and contribution provisions are established by State law and may be amended only by the State Legislature.

At June 30, 2015, membership in the DC Plan consisted of 4,076 members.

#### Retirement Benefits

A participating member is immediately and fully vested in that member's contributions and related earnings (losses). A member shall be fully vested in the employer contributions made on that member's behalf, and related earnings (losses), after five years of service. A member is partially vested in the employer contributions made on that member's behalf, and the related earnings, in the ratio of (a) 25% with two years of service; (b) 50% with three years of service; (c) 75% with four years of service; and (d) 100% with five years of service.

#### **Contributions**

Alaska statutes require an 8.00% contribution rate for DC Plan members. Employers are required to contribute 7.00% of the member's compensation.

#### Participant Distributions

A member is eligible to elect distribution of their account 60 days after termination of employment.

#### Participant Accounts

Participant accounts under the DC Plan are self-directed with respect to investment options. Investment options are disclosed in note 3.

Each participant designates how contributions are to be allocated among the investment options. Each participant's account is credited with the participant's contributions and the appreciation or depreciation in unit value for the investment funds.

Record-keeping/administrative fees consisting of a fixed amount, applied in a lump sum each calendar year, and a variable amount, applied monthly, are deducted from each participant's account, applied pro rata to all the funds in which the employee participates. This fee is for all costs incurred by the record keeper and by the State. The investment management fees are netted out of the funds' performance.

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#### **Defined Benefit Other Postemployment Benefit Plans**

#### Alaska Retiree Healthcare Trust Plan

Beginning July 1, 2007, the Alaska Retiree Healthcare Trust Plan (ARHCT), a healthcare trust fund of the State, was established. The ARHCT is self-funded and provides major medical coverage to retirees of the System. The System retains the risk of loss of allowable claims for eligible members. The ARHCT began paying member healthcare claims on March 1, 2008. Prior to that, healthcare claims were paid for by the Retiree Health Fund (RHF).

Membership in the plan was as follows as of June 30, 2015:

Inactive plan members or beneficiaries currently receiving benefits	12,080
Inactive plan members entitled to but not yet receiving benefits	3,156
Active plan members	5,606
	20,842

#### **OPEB Benefits**

When pension benefits begin, major medical benefits are provided without cost to (1) all members first hired before July 1, 1990, (2) members hired after July 1, 1990 with 25 years of membership service, and (3) members who are disabled or age 60 or older, regardless of their initial hire dates. Members first hired after June 30, 1990 may receive major medical benefits prior to age 60 by paying premiums.

#### Contributions

Employer contribution rates are actuarially determined and adopted by the Board. The 2015 employer effective contribution rate is 12.56% of member's compensation.

#### Occupational Death and Disability Plan

The Occupational Death and Disability Plan provides death benefits for beneficiaries of plan participants and long-term disability benefits to all active members with the System. Members in the Death and Disability Plan consisted of the following at June 30, 2015:

Active plan members	4,076
Participating employers	58
Open claims	_

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#### **Death Benefits**

If (1) the death of an employee occurs before the employee's retirement and before the employee's normal retirement date, (2) the proximate cause of death is a bodily injury sustained or a hazard undergone while in the performance and within the scope of the employee's duties, and (3) the injury or hazard is not the proximate result of willful negligence of the employee, a monthly survivor's pension shall be paid to the surviving spouse. If there is no surviving spouse or if the spouse later dies, the monthly survivor's pension shall be paid in equal parts to the dependent children of the employee.

When benefits are payable under the 1% supplemental contribution provision, the DB Plan member's spouse is eligible for a spouse's pension if there is/are no dependent child(ren). If there is/are dependent child(ren), a survivor's allowance may be payable to the DB Plan member's spouse, or guardian of the dependent child(ren). The amount of the pension or allowance is determined by the DB Plan member's base salary. DB Plan members first hired after June 30, 1982 are not eligible to participate in this provision.

If an active DB Plan member dies from occupational causes, the spouse may receive a monthly pension from the DB Plan. When death is due to occupational causes and there is no surviving spouse, the DB Plan member's dependent child(ren) may receive a monthly pension until the child(ren) is/are no longer dependents. If the member does not have a spouse or dependent children at the time of death, a lump-sum death benefit is payable to the named beneficiary(ies). The amount of the occupational death pension is 40% of the member's base salary at the time of death. The amount of the occupational death pension changes on the date the DB Plan member's normal retirement would have occurred if the DB Plan member had lived. The new benefit is based on the DB Plan member's average base salary at the time of death and the credited service that would have accrued had the DB Plan member lived and continued to work until normal retirement. If benefits are payable under the 1% supplemental contribution provision, benefits are not payable under this provision. If the death was from nonoccupational causes, and the DB Plan member was vested, the spouse may receive a monthly 50% joint and survivor option benefit based on the member's credited service and average base salary at the time of death. If the DB Plan member is not married or vested, a lump-sum death benefit is payable to the named beneficiary(ies).

The monthly survivor's pension section for survivors of DC Plan employees is 40% of the employee's monthly compensation in the month in which the employee dies. While the monthly survivor's pension is being paid, the employer shall make contributions on behalf of the employee's beneficiaries based on the deceased employee's gross monthly compensation at the time of occupational death.

#### **Disability Benefits**

If a DB Plan member has been in membership service for five or more years for which contributions have been made, is not eligible for normal retirement benefits, and becomes permanently disabled, the DB Plan member is entitled to a monthly benefit. The annual disability benefit is equal to 50% of the base salary at the time of the disability plus an additional 10% of his/her base salary for each dependent child up to a maximum of four children. At normal retirement age, a disabled System member receives normal retirement benefits.

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A DC Plan member is eligible for an occupational disability benefit if employment is terminated because of a total and apparently permanent occupational disability before the employee's normal retirement date. The occupational disability benefits accrue beginning the first day of the month following termination of employment as a result of the disability and are payable the last day of the month. If a final determination granting the benefit is not made in time to pay the benefit when due, a retroactive payment shall be made to cover the period of deferment.

#### **Contributions**

An employer shall contribute to each member's account based on the member's compensation. For fiscal year 2015, the rate is 7.00%.

#### Retiree Medical Plan

The retiree medical plan is established under AS 14.25.480 – Medical benefits. The Department of Administration, Division of Retirement & Benefits, who administers the System's health plans, is in the process of formalizing and finalizing the retiree medical plan. Members will be eligible for the DC Plan's health benefits plan beginning in June 2016. Currently, no members are eligible to use this plan until they have at least 10 years of service.

#### Defined Contribution Other Postemployment Benefit Plan

The Healthcare Reimbursement Arrangement Plan was established to allow medical expenses to be reimbursed from individual savings accounts established for eligible participants. For each member of the plan, an employer shall contribute an amount equal to 3.0% of the average annual compensation of all employees of all employers in the System. As of June 30, 2015, there were 6,170 members.

#### (2) Summary of Significant Accounting Policies

#### Basis of Accounting

The accompanying financial statements have been prepared using the economic resources measurement focus and on the accrual basis of accounting in conformity with U.S. generally accepted accounting principles (GAAP), as prescribed by the Governmental Accounting Standards Board (GASB). Contributions are due to the System when employee services have been performed and paid. Contributions are recognized as revenues when due pursuant to statutory requirements. Benefits and refunds are recognized when due and payable and expenses are recorded when the corresponding liabilities are incurred, regardless of when contributions are received or payment is made.

#### Use of Estimates

The preparation of financial statements in conformity with U.S. generally accepted accounting principles requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amounts of additions and deductions during the reporting period. Actual results could differ from those estimates.

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#### Defined Benefit Pension and OPEB Investments

The System owns shares in various investment pools that are administered by the State of Alaska Department of Revenue, Division of Treasury (Treasury). The System's investment in the pools, except for the Short-Term Fixed Income Pool, are reported at fair value based on the net asset value reported by the Treasury.

The Short-Term Fixed Income Pool maintains a share price of \$1. Each participant owns shares in the pool, the number of which fluctuates daily with contributions and withdrawals.

#### Defined Contribution Participant Directed Investments

The Board contracts with an external investment manager who is given the authority to invest in a wholly owned pooled environment to accommodate 13 participant-directed funds. Additionally, the Board contracts with external managers who manage a mix of collective investment funds. Income for the Pooled Investment and Collective Investment Funds is credited to the fund's net asset value on a daily basis and allocated to pool participants daily on a pro rata basis.

Pooled Participant Directed Investment Funds, held in trust, are stated at fair value based on the unit value as reported by the Trustees multiplied by the number of units held by the Plan. The unit value is determined by the Trustees based on fair value of the underlying assets. Purchases and sales of securities are recorded on a trade-date basis. Underlying assets comprise domestic and international stocks, investment-grade bonds, federally guaranteed mortgages, money market instruments, and other cash equivalent instruments with maturities of less than one year, which include but are not limited to commercial paper, asset-backed securities, banker acceptances, certificates of deposit with ratings of A1/P1 or better as well as obligations of the U.S. government and its agencies, and repurchase agreements collateralized by U.S. Treasury instruments.

Collective Investment Funds, held in trust, are stated at fair value based on the unit value as reported by the Trustees multiplied by the number of units held by the Plan. The unit value is determined by the Trustees based on fair value of the underlying assets. Purchases and sales of securities are recorded on a trade-date basis. Underlying assets are comprised of commingled investment funds, alongside other investors, through ownership of equity shares.

#### Contributions Receivable

Contributions from the System's members and employers for service through June 30 are accrued. These contributions are considered fully collectible, and accordingly, no allowance for uncollectible receivables is reflected in the financial statements.

#### Administrative Costs

Administrative costs are paid from investment earnings.

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#### Due from (to) State of Alaska General Fund

Amounts due from (to) the State of Alaska General Fund represent the net difference between amounts paid by the System on behalf of others and amounts paid by others on behalf of the System.

#### Federal Income Tax Status

The DB Plan and DC Plan are qualified plans under Section 401(a) and 414(d) of the Internal Revenue Code and are exempt from federal income taxes under Section 501(a).

#### GASB Statement No. 67

The System implemented the provisions of GASB Statement No. 67, Financial Reporting for Pension Plans during the year ended June 30, 2014. GASB Statement No. 67 requires the disclosures of the total pension liability, fiduciary net position, and net pension liability for single-employer and cost-sharing multiple-employer defined benefit pension plans. GASB Statement No. 67 also requires certain additional note disclosures for defined benefit pension plans including the annual money-weighted rate of return on plan investments. GASB Statement No. 67 revised the reporting requirements for required supplementary information to include schedules which provide trend information related to (1) changes in the net pension liability, (2) the actuarially and contractually determined contributions of employer contributing entities, and (3) the annual money-weighted rate of return on plan investments.

#### (3) Investments

The Board is the investment oversight authority of the System's investments. As the fiduciary, the Board has the statutory authority to invest the assets under the Prudent Investor Rule. Fiduciary responsibility for the Board's Invested Assets is pursuant to Alaska Statutes 37.10.210-390.

Alaska Statute 37.10.071 provides that investments shall be made with the judgment and care under circumstances then prevailing that an institutional investor of ordinary professional prudence, discretion, and intelligence exercises in managing large investment portfolios.

Treasury provides staff for the Board. Treasury has created a pooled environment by which it manages investments of the Board. Additionally, Treasury manages a mix of Pooled Investment Funds and Collective Investment Funds for the DC Participant Directed Pension Plans under the Board's fiduciary responsibility.

Actual investing is performed by investment officers in Treasury or by contracted external investment managers. The Board has developed investment guidelines, policies, and procedures for Treasury staff and external investment managers to adhere to when managing investments. Treasury manages the U.S. Treasury Fixed Income Pool, Dow Jones Dividend 100 Index Fund in the Alternative Equity Strategies Pool, Real Estate Investment Trust Pool, Treasury Inflation Protected Securities (TIPS) Pool, and cash holdings of certain external managers in addition to acting as oversight manager for all externally managed investments. All other investments are managed by external management companies.

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The Short-Term Fixed Income Pool is a State pool managed by Treasury that holds investments on behalf of the Board as well as other state funds.

#### Rate of Return

The money-weighted rate of return expresses investment performance, net of investment expense, adjusted for the changing amounts actually invested. The annual money-weighted rate of return, net of investment expense, for the year ended June 30, 2015 for the defined benefit pension plan is 3.30%.

#### (4) Deposit and Investment Risk

#### **Interest Rate Risk**

Interest rate risk is the risk that changes in interest rates will adversely affect the fair value of an investment.

Short-Term Fixed Income Pool

As a means of limiting its exposure to fair value losses arising from increasing interest rates, Treasury's investment policy limits individual fixed rate securities to 14 months to maturity or 14 months expected average life upon purchase. Floating rate securities are limited to three years to maturity or three years expected average life upon purchase. At June 30, 2015, the expected average life of individual fixed rate securities ranged from 10 days to 3.3 years and the expected average life of floating rate securities ranged from 10 days to 14.5 years.

#### Other Defined Benefit Fixed Income Pools

Duration is a measure of interest rate risk. It measures a security's sensitivity to a 100-basis-point change in interest rates. The duration of a pool is the average fair value weighted duration of each security in the pool taking into account all related cash flows.

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At June 30, 2015, the effective duration of the DB Plan's fixed income pools was as follows (in years):

Bank loans	(0.05)
Certificate of deposit	0.14
Convertible bonds	0.07
Corporate bonds	4.32
Foreign government bonds	6.26
Mortgage backed	1.75
Municipal bonds	11.15
Other asset backed	0.69
U.S. government agency	7.89
U.S. Treasury bills, notes bonds, and TIPS	4.65
Yankee corporate	4.13
Yankee government	6.18
Total portfolio	4.97

#### Defined Contribution Pooled Investment Funds

The Board contracts with an external investment manager, who is given the authority to invest funds in a wholly owned pooled environment to accommodate 13 participant-directed funds. Through the Board's investment policy, exposure to fair value losses arising from increasing interest rates is managed by limiting the duration as follows:

- Under normal conditions, the Trust will invest in cash equivalent instruments with maturities of less than one year. Additionally, under normal conditions, for government debt, corporate debt, and mortgage-backed securities, duration is limited to ± 0.2 years of the blended benchmark of 70% Barclays U.S. Intermediate Aggregate Bond Index, 15% Barclays U.S. Floating Rate Note Index, 10% Barclays TIPS Index, and 5% Barclays Long U.S. Treasury Bond Index. Further deviations are acceptable if they do not contribute significantly to the overall risk of the portfolio. In no event at time of purchase shall effective duration exceed ± 0.4 years relative to the index.
- At June 30, 2015, the duration of the government corporate debt and mortgage-backed securities was 4.00 years and the duration of the blended Barclays Bond Index was 3.98 years.

Defined Contribution Collective Investment Funds

The Board does not have a policy to limit interest rate risk for its collective investment funds.

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#### Credit Risk

Credit risk is the risk that an issuer or other counterparty to an investment will not fulfill its obligations. The System's ownership held in the investment pools are not separately rated. See the separately issued report on the State of Alaska Retirement and Benefits Plan Invested Assets for credit ratings of investments within the pools.

#### Custodial Credit Risk – Deposits

Custodial credit risk is the risk that deposits may not be returned in the event of a bank failure. The Board does not have a policy in relation to custodial credit risk for deposits.

#### Foreign Currency Risk

Foreign Currency Risk is the risk that changes in exchange rates will adversely impact the fair value of an investment. However, through its asset allocation policy, the Board limits total investments in international fixed income, global equity ex-U.S., and private equity to the following:

Fixed income	Global equity ex-U.S.	Private equity pool
20%	29%	14%

#### Concentration of Credit Risk

At June 30, 2015, the Board's Invested Assets did not have exposure to any one issuer greater than 5% of total invested assets.

#### (5) Foreign Exchange, Derivative, and Counterparty Credit Risk

The investment pools for which the System is a part, are exposed to credit risk on underlying investment derivative instruments that are in asset positions. The Board has no policy of requiring collateral or other security to support derivative instruments subject to credit risk. Additionally, the Board has no policy regarding entering into netting arrangements when it enters into derivative instrument transactions with a counterparty, nor does the Board have a policy for contingencies.

The International Equity Pool includes foreign currency forward contracts to buy and sell specified amounts of foreign currencies at specified rates on specified future dates. The counterparties to the foreign currency forward contracts consist of a diversified group of financial institutions. Credit risk exposure exists to the extent of nonperformance by these counterparties; however, the risk of default is considered to be remote. The market risk is limited to the difference between contractual rates and forward rates at the balance sheet date. For additional information on foreign exchange, derivatives and counterparty credit risk see the separately issued report on the State of Alaska Retirement and Benefits Invested Assets.

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#### (6) Net Pension Liability – Defined Benefit Pension Plan

The components of the net pension liability of the participating employers at June 30, 2015 were as follows (in thousands):

Total pension liability \$ 7,107,406
Plan fiduciary net position (5,246,955)

Employers' net pension liability \$ 1,860,451

Plan fiduciary net position as a percentage

#### Actuarial Assumptions

The total pension liability was determined by an actuarial valuation as of June 30, 2014, using the following actuarial assumptions, applied to all periods included in the measurement, and rolled forward to the measurement date of June 30, 2015:

Inflation 3.12%

Salary increases Graded by service, from 8.11% to 3.87%

of the total pension liability

Rate of return 8.00%, net of pension plan investment expenses.

This is based on an average inflation rate of 3.12% and a real rate of return of 4.88%.

73.82%

Post-termination mortality rates were based on 94% of the male rates and 97% of the female rates of the RP-2000 Mortality Table, 2000 Base Year projected to 2018 with Projection Scale BB, with a 3-year setback for males and 4-year setback for females. The rates for pre-termination mortality were 68% of the male rates and 60% of the female rates of the post-termination mortality rates. Deaths are assumed to result from non-occupational causes 85% of the time.

The actuarial assumptions used in the June 30, 2014 actuarial valuation were based on the results of an actuarial experience study for the period from July 1, 2009 to June 30, 2013, resulting in changes in actuarial assumptions adopted by the Board to better reflect expected future experience.

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The long-term expected rate of return on pension plan investments was determined using a building-block method in which best-estimate ranges of expected future real rates of return (expected returns, net of pension plan investment expense and inflation) are developed for each major asset class. These ranges are combined to produce the long-term expected rate of return by weighting the expected future real rates of return by the target asset allocation percentage and by adding expected inflation. Best estimates of arithmetic real rates of return for each major asset class included in the pension plan's target asset allocation as of June 30, 2015 (see the discussion of the pension plan's investment policy) are summarized in the following table:

Asset class	Long-term expected real rate of return
Domestic Equity	5.35%
Global Equity (non-U.S.)	5.55
Private Equity	6.25
Fixed Income Composite	0.80
Real Estate	3.65
Alternative Equity	4.70

#### Discount Rate

The discount rate used to measure the total pension liability was 8%. The projection of cash flows used to determine the discount rate assumed that employer and nonemployer State contributions will continue to follow the current funding policy, which meets State statutes. Based on those assumptions, the pension plan's fiduciary net position was projected to be available to make all projected future benefit payments of current plan members. Therefore, the long-term expected rate of return on pension plan investments was applied to all periods of projected benefit payments to determine the total pension liability.

#### Sensitivity of the Net Pension Liability to Changes in the Discount Rate

The following presents the net pension liability of the System calculated using the discount rate of 8%, as well as what the System's net pension liability would be if it were calculated using a discount rate that is one-percentage-point lower (7%) or one-percentage-point higher (9%) than the current rate:

		Current			
	_	1% Decrease (7%)	discount rate (8%)	1% Increase (9%)	
Net pension liability	\$	2,685,169	1,860,451	1,169,348	

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#### (7) Defined Benefit OPEB Funding Status

The funded status of the occupational death and disability plan, retiree healthcare trust, and retiree medical benefits is as follows (in thousands):

	Actuarial valuation date	Actuarial accrued liability (AAL) entry age	Actuarial valuation assets	Funded ratio	Unfunded actuarial accrued liability (UAAL)	Covered payroll	UAAL as a percentage of covered payroll
Healthcare trust	June 30, 2014 \$	3,114,113	2,248,135	72.2%	865,978	523,580	165.4%
Occupational death as	nd						
disability plan	June 30, 2014	23	2,820	12,260.9	(2,797)	229,971	(1.2)
Retiree medical	June 30, 2014	18,290	10,791	59.0	7,499	229,971	3.3

The funding ratio as of June 30, 2014 has increased. The increase in funding ratio is primarily due to the asset returns in fiscal year 2014 of 18.46%, well above the expected return of 8%. This increase was combined with positive experiences in demographic experience and retiree medical costs, which when factored in with other factors resulted in the slight decrease.

Actuarial valuations of an ongoing plan involve estimates of the value of reported amounts and assumptions about the probability of occurrence of events far into the future. Examples include assumptions about future employment, mortality, and healthcare cost trend. Actuarially determined amounts are subject to continual revisions as actual results are compared with past expectations and new estimates are made about the future. The schedules of funding progress, presented as required supplementary information following the notes to the financial statements, present multiyear trend information about whether the actuarial values of plan assets are increasing or decreasing over time relative to the actuarial accrued liabilities for benefits.

The accompanying schedules of contributions (unaudited) from employers present trend information about the amounts contributed to the plan by employers in comparison to the actuarially required contribution (ARC), an amount that is actuarially determined in accordance with the parameters of GASB Statement No. 43. The ARC represents a level of funding that, if paid on an ongoing basis, is projected to cover normal cost for each year and amortize any unfunded actuarial liabilities (or funding excess) over a period not to exceed 30 years.

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Projections of benefits for financial reporting purposes are based on the substantive plan (the plan as understood by the employer and plan members) and include the types of benefits provided at the time of each valuation and the historical pattern of sharing benefit costs between the employer and the plan members to that point. The actuarial method and assumptions used include techniques that are designed to reduce the effects of short-term volatility in actuarial accrued liabilities and the actuarial value of assets, consistent with the long-term perspective of the calculations. Additional information as of the latest actuarial valuation is as follows:

#### June 30, 2014

	June 30, 2014
	Defined Benefit
Actuarial cost method	Entry age normal; level percentage of pay normal cost basis for pension and healthcare
Amortization method	Level percentage of pay, closed
Equivalent single amortization period	25 years
Asset valuation method	5-year smoothed fair value; reinitialized to fair value as of June 30, 2014.
Actuarial assumptions: Investment rate of return	8.00% for pension, 5.08% for healthcare; includes price inflation at 3.12%
Projected salary increases	6.11% for first 5 years of service grading down to 3.62% after 20 years
Cost-of-living adjustment	Postretirement pension adjustment
	June 30, 2014
	ODD and Retiree Medical
Actuarial cost method	Entry age normal; level percentage of pay normal cost basis for occupational death and disability, and retiree medical

Amortization method Level percentage of pay, closed with bases established annually

Equivalent single amortization period

Asset valuation method 5-year smoothed market 80%/120% of fair value corridor

Actuarial assumptions:

Investment rate of return 8.00% for pension, 5.08% for healthcare; includes price inflation at 3.12% Projected salary increases 8.11% for first 5 years of service grading down to 3.87% after 22 years

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Health cost trend for occupational death and disability, and retiree medical plans is as follows:

Fiscal year	Medical pre-65	Medical post-65	Prescription drugs
2015	10.0%	6.0%	6.0%
2016	9.4	5.9	5.7
2017	8.8	5.8	5.4
2018	8.2	5.7	5.1
2019	7.6	5.6	4.8
2020	7.0	5.6	4.6
2021	6.5	5.6	4.4
2025	5.6	5.6	4.2
2050	4.4	4.0	4.0
2100	4.4	4.0	4.0

GASB Statement No. 43 requires that the discount rate used in the valuation be the estimated long-term yield on investments that are expected to finance postemployment benefits. Depending on the method by which a plan is financed, the relevant investments could be plan assets, employer assets, or a combination of plan and employer assets. The investment return should reflect the nature and the mix of both current and expected investments and the basis used to determine the actuarial value of assets.

The System's retiree healthcare benefits are partially funded. GASB outlines two reasonable methods of developing a blended discount rate when a plan is partially funded. These methods base the proportion of assumed plan and employer asset returns on (1) the funded ratio and (2) the percentage of the ADC actually being contributed to the plan. The State has utilized the second methodology to develop a discount rate of 5.08% as of June 30, 2012, to be used for fiscal 2015 disclosure.

The System's retiree medical benefits are fully funded. Therefore, the 8.00% discount rate used for GASB Statement No. 25 reporting is also applied herein for GASB Statement No. 43 reporting.

Based on GASB accounting rules, the retiree drug subsidy (RDS) the State receives under Medicare Part D has not been recognized for GASB Statement No. 43 disclosure purposes.

Disregarding future Medicare Part D payments, the fiscal 2016 employer ADC for accounting purposes is 2.36% of pay for retiree medical benefits and 2.36% of pay for retiree medical and death and disability benefits combined.

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(With summarized financial information for June 30, 2014)

#### (8) Claims Payable

The liability for claims incurred but not reported represents the estimated amounts necessary to settle all outstanding claims, incurred but not reported, as of the balance sheet date. The ARHT and Retiree Medical Plan's reserve estimates are based primarily on historical development patterns adjusted for current trends that would modify past experience. Claims are reevaluated periodically to consider the effects of inflation, claims settlement trends, and other economic factors. The process of establishing loss reserves is subject to uncertainties that are normal, recurring, and inherent in the healthcare business.

Changes in the balances of claims liabilities are as follows (in thousands):

	2015	2014
Beginning of year: Due to State of Alaska General Fund for		
outstanding warrants \$	_	_
Incurred but not reported	18,979	20,062
Total, beginning of year	18,979	20,062
Benefit deductions	109,740	116,781
Benefits paid	(110,076)	(117,864)
Total, end of year \$	18,643	18,979
End of year:		
Due to State of Alaska General Fund for		
outstanding warrants \$	4,192	
Incurred but not reported	14,451	18,979
Total, end of year \$	18,643	18,979

#### (9) Commitments and Contingencies

#### Commitments

The Board entered into an agreement through external managers to provide capital funding for limited partnerships in the domestic equity, private equity, energy, and real estate portfolios. At June 30, 2015, the Board's unfunded commitments were as follows (in thousands):

Portfolio	<u>c</u>	Unfunded ommitment	Estimated to be paid through
Domestic equity	\$	_	May be canceled annually in December with 90 days' notice
Private equity		415,392	Fiscal year 2026
Energy		26,144	Fiscal year 2023
Real estate		67,850	Fiscal year 2024
	\$	509,386	

Teachers' Retirement System
(A Component Unit of the State of Alaska)

#### Notes to Financial Statements

June 30, 2015

(With summarized financial information for June 30, 2014)

#### Contingencies

The Division of Retirement and Benefits (the Division) is a defendant in various lawsuits. Although the outcome of these lawsuits is not presently determinable, in the opinion of the Division's counsel, the resolution of these matters will not have a material adverse effect on the financial condition of the Division.

#### (10) Medicare Part D Retiree Drug Subsidy

One of the provisions of Medicare Part D provides sponsors of pension healthcare plans the opportunity to receive a RDS payment if the sponsor's plan provides a prescription drug benefit that is actuarially equivalent to the Medicare Part D benefit. The RDS is equal to 28% of the amount of eligible prescription drug benefit costs of retirees who are eligible for, but not enrolled in, Medicare Part D, by virtue of continuing to be covered by the sponsor's plan. The ARHT Plan was approved for participation in the Medicare Part D program beginning calendar year 2006.

#### (11) Early Retiree Reinsurance Program

The Early Retiree Reinsurance Program (ERRP) was a temporary program that provided reimbursement to participating employment-based plans for a portion of the costs of health benefits for retirees age 55 and older who are not eligible for Medicare, and their spouses and surviving spouses and dependents. The amount of the reimbursement to the plan was up to 80% of claims cost for health benefits between \$15,000 and \$90,000. The program was authorized by the Affordable Care Act as part of the U.S. government health reform package. The plan started participation in the ERRP beginning calendar year 2011. The program ended on January 1, 2014.

# REQUIRED SUPPLEMENTARY INFORMATION (Unaudited)

Teachers' Retirement System
(A Component Unit of the State of Alaska)

## Required Supplementary Information (Unaudited)

## Schedule of Changes in Employer Net Pension Liability and Related Ratios - Defined Benefit Pension Plan

(In thousands)

	_	2015	2014	2013	2012
Total pension liability:					
Service cost	\$	63,608	64,324	69,113	69,548
Interest		540,981	515,325	517,511	501,252
Changes of benefit terms		_	_	_	_
Differences between expected and actual		(5.500)			10.006
experience		(5,693)	_	1,108	10,986
Changes of assumptions		156,854	_	_	_
Benefit payments, including refunds of member contributions		(418,545)	(399,001)	(397,956)	(378,113)
	_				
Net change in total pension liability		337,205	180,648	189,776	203,673
Total pension liability – beginning	_	6,770,201	6,589,553	6,399,777	6,196,104
Total pension liability – ending (a)	_	7,107,406	6,770,201	6,589,553	6,399,777
Plan fiduciary net position:					
Contributions – employer		36,374	37,571	37,372	38,189
Contributions – member		45,506	47,724	50,201	52,020
Contributions – nonemployer entity (State)		1,662,700	208,890	196,945	157,387
Total net investment income		152,561	599,958	373,868	2,190
Other miscellaneous income		9	27	19	17
Benefit payments, including refunds of member			,		
contributions		(418,545)	(399,001)	(382,933)	(363,839)
Administrative expenses	_	(2,789)	(3,160)	(2,989)	(2,847)
Net change in plan fiduciary net position		1,475,816	492,009	272,483	(116,883)
Plan fiduciary net position – beginning	_	3,771,139	3,279,130	3,006,647	3,123,530
Plan fiduciary net position – ending (b)	_	5,246,955	3,771,139	3,279,130	3,006,647
Plan's net pension liability (a) - (b)	\$	1,860,451	2,999,062	3,310,423	3,393,130
Plan fiduciary net position as a percentage of the total pension liability		73.82%	55.70%	49.76%	46.98%
Covered-employee payroll	\$	490,667	514,035	550,044	561,971
Net pension liability as a percentage of covered-employee payroll		379.17%	583.44%	601.85%	603.79%

This schedule is intended to present information for 10 years. Additional years will be displayed as they become available.

See accompanying notes to required supplementary information (unaudited) and independent auditors' report.

Teachers' Retirement System
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## Required Supplementary Information (Unaudited) Schedule of Employer and Nonemployer Contributions

## Defined Benefit Pension Plan Last 10 Fiscal Years

(In thousands)

	2,015		2014	2013	2012	2011
Actuarially determined contribution	\$	321,971	240,366	259,786	229,509	167,978
Contributions in relation to the actuarially determined contribution	_	1,699,074	246,461	234,317	195,576	142,147
Contribution deficiency (excess)	\$	(1,377,103)	(6,095)	25,469	33,933	25,831
Covered-employee payroll	\$	490,667	514,035	550,044	561,971	584,068
Contributions as a percentage of covered-employee payroll		346.28%	47.95%	42.60%	34.80%	24.34%

See accompanying notes to required supplementary information (unaudited) and independent auditors' report.

Teachers' Retirement System
(A Component Unit of the State of Alaska)

## Required Supplementary Information (Unaudited)

## Schedule of Employer and Nonemployer Contributions

## Defined Benefit Pension Plan Last 10 Fiscal Years (continued)

(In thousands)

	_	2010	2009	2008	2007	2006
Actuarially determined contribution	\$	170,788	94,388	134,544	169,974	170,019
Contributions in relation to the actuarially determined contribution		134,275	131,533	142,550	105,775	91,902
Contribution deficiency (excess)	\$	36,513	(37,145)	(8,006)	64,199	78,117
Covered-employee payroll	\$	564,887	557,026	549,148	554,245	574,409
Contributions as a percentage of covered-employee payroll		23.77%	23.61%	25.96%	19.08%	16.00%

See accompanying notes to required supplementary information (unaudited) and independent auditors' report.

## Teachers' Retirement System

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## Required Supplementary Information (Unaudited)

## **Schedule of Investment Returns**

	2015	2014
Annual money-weighted rate of return, net of		
investment expense	3.30%	18.41%

This schedule is intended to present information for 10 years. Additional years will be displayed as they become available.

See accompanying notes to required supplementary information (unaudited) and independent auditors' report.

Teachers' Retirement System
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## Required Supplementary Information (Unaudited)

# Schedules of Funding Progress Defined Benefit OPEB Plans

June 30, 2015 (In thousands)

#### Alaska Retiree Healthcare Trust Plan

Actuarial valuation year ended June 30	 Actuarial accrued liabilities (AAL)	Actuarial value of plan assets	Funded ratio	Unfunded actuarial accrued liabilities (UAAL)	Covered payroll	UAAL as a percentage of covered payroll
2008	\$ 4,648,055	1,266,890	27.3% \$	3,381,165	549,148	615.7%
2009	4,604,820	1,357,239	29.5	3,247,581	557,026	583.0
2010	3,076,388	1,479,260	48.1	1,597,128	564,887	282.7
2011	3,635,492	1,591,988	43.8	2,043,504	584,068	349.9
2012	5,046,942	1,674,160	33.2	3,372,782	561,971	600.2
2013	5,002,345	1,803,763	36.1	3,198,582	550,044	581.5
2014	3,114,113	2,248,135	72.2	865,978	523,580	165.4

#### Occupational Death and Disability Benefits Plan

Actuarial valuation year ended June 30	 Actuarial accrued liabilities (AAL)	Actuarial value of plan assets	Funded ratio	Unfunded actuarial accrued liabilities (UAAL)	Covered payroll	UAAL as a percentage of covered payroll
2008	\$ 44	420	954.5% \$	(376)	56,369	(0.7)%
2009	14	1,071	7,650.0	(1,057)	89,708	(1.2)
2010	18	1,577	8,761.1	(1,559)	118,813	(1.3)
2011	57	2,193	3,847.4	(2,136)	170,606	(1.3)
2012	63	2,348	3,727.0	(2,285)	200,043	(1.1)
2013	80	2,532	3,165.0	(2,452)	206,771	(1.2)
2014	23	2,820	12,260.9	(2,797)	229,971	(1.2)

#### Retiree Medical Benefits Plan

Actuarial valuation year ended June 30	 Actuarial accrued liabilities (AAL)	Actuarial value of plan assets	Funded ratio	Unfunded actuarial accrued liabilities (UAAL)	Covered payroll	UAAL as a percentage of covered payroll
2008	\$ 899	1,308	145.5% \$	(409)	56,369	(0.7)%
2009	1,690	2,353	139.2	(663)	89,708	(0.7)
2010	2,809	3,895	138.7	(1,086)	118,813	(0.9)
2011	4,386	5,373	122.5	(987)	170,606	(0.6)
2012	19,427	6,937	35.7	12,490	200,043	6.2
2013	25,152	8,614	34.2	16,538	206,771	8.0
2014	18,290	10,791	59.0	7,499	229,971	3.3

See accompanying notes to required supplementary information (unaudited) and independent auditors' report.

Teachers' Retirement System

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## Required Supplementary Information (Unaudited)

## Schedules of Contributions from Employers and the State of Alaska

Defined Benefit OPEB Plans

June 30, 2015 (In thousands)

#### Alaska Retiree Healthcare Trust Plan

			Percentage contributed		
Year ended June 30	Actuarial valuation year ended June 30 <sup>(1)</sup>	 Annual required contribuiton	By employer	By State of Alaska (note 3)	Total percentage contributed (note 3)
2008	2005	\$ 185,271	23.6%	85.7%	109.3%
2009	2006	164,171	28.7	62.1	90.8
2010 <sup>(2)</sup>	2007	312,922	13.6	38.8	52.4
2011	2008	167,686	25.8	51.5	77.3
2012	2009	192,700	18.8	46.6	65.4
2013	2010	330,411	10.7	33.3	44.0
2014	2011	320,797	10.0	35.6	45.6

 $<sup>^{\</sup>left(1\right)}$  Actuarial valuation related to annual required contribution for fiscal year.

#### Occupational Death and Disability Benefits Plan

Year ended June 30	Annual required contribution	Percentage of ARC contributed
2008	\$ 408	100.0%
2009	623	100.0
2010	442	100.0
2011	474	100.0
2012	_	100.0
2013	_	100.0
2014	_	100.0

#### Retiree Medical Benefits Plan

Year ended June 30	 Annual required contribution	Percentage of ARC contributed
2008	\$ 763	85.0%
2009	1,162	85.0
2010	1,628	87.0
2011	1,422	81.0
2012	1,420	82.0
2013	1,241	89.0
2014	1,334	89.0

See accompanying notes to required supplementary information (unaudited) and independent auditors' report.

<sup>(2)</sup> In the year ended June 30, 2010, the postemployment healthcare annual required contribution and percentage contributed included the Mercer legal settlement, net of legal fees, as well as the Medicare Part D subsidy contributed by the State to the healthcare fund.

Teachers' Retirement System
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## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

#### (1) Description of Schedule of Funding Progress

Each time a new benefit is added, which applies to service already rendered, an "unfunded actuarial accrued liability" is created. Laws governing the System require that these additional liabilities be financed systematically over a period of future years. Also, if actual financial experiences are less favorable than assumed financial experiences, the difference is added to the unfunded actuarial accrued liability.

In an inflationary economy, the value of the dollar is decreasing. This environment results in employee pay increasing in dollar amounts resulting in unfunded actuarial accrued liabilities increasing in dollar amounts, all at a time when the actual value of these items, in real terms, may be decreasing.

#### (2) Actuarial Assumptions and Methods

The actuarial valuation was prepared by Buck Consultants. The significant actuarial assumptions used in the defined benefit pension and postemployment healthcare benefit plan valuation as of June 30, 2014 are as follows:

- (a) Actuarial cost method Entry Age Actuarial Cost method of funding. Any funding surplus or unfunded accrued liability is amortized over 25 years as a level percentage of payroll amount. State statutes allow the contribution rate to be determined on payroll for all members, defined benefit, and defined contribution member payroll combined.
- (b) Valuation of assets The actuarial asset value was reinitialized to equal fair value of assets as of June 30, 2014. Beginning in 2015, the asset value method recognizes 20% of the gain or loss each year, for a period of up to five years. All assets are valued at fair value. Assets are accounted for on an accrued basis and are taken directly from financial statements.
- (c) Valuation of medical benefits Base claims cost rates are incurred healthcare costs expressed as a rate per member per year. Ideally, claims cost rates should be derived for each significant component of cost that can be expected to require differing projection assumptions or methods, i.e., medical claims, prescription drug claims, administrative costs, etc. Separate analysis is limited by the availability and credibility of cost and enrollment data for each component of cost. This valuation reflects nonprescription claims separated by Medicare status, including eligibility for free Part A coverage. Prescription costs are analyzed separately as in prior valuations. Administrative costs are assumed in the final per capita claims cost rates used for valuation purposes. Analysis to date on Medicare Part A coverage is limited since Part A claim data is not available by individual, nor is this status incorporated into historical claim data.
- (d) Investment return/discount rate 8.00% per year (geometric), compounded annually, net of expenses.
- (e) Salary scale Inflation 3.12% per year and productivity 0.50% per year.
- (f) Payroll growth -3.62% per year (inflation + productivity).

## Teachers' Retirement System (A Component Unit of the State of Alaska)

## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

- (g) Total inflation Total inflation as measured by the Consumer Price Index for urban and clerical workers for Anchorage is assumed to increase 3.12% annually.
- (h) Mortality (pre-termination) Based upon the 2010–2013 actual experience. 68% of male rates and 60% of female rates of post-termination mortality. Deaths are assumed to result from nonoccupational causes 85% of the time.
- (i) Mortality (post-termination) Based upon the 2010–2013 actual experience study. 94% of male and 97% of female rates of RP-2000, 2000 base year, projected to 2018 with Projection Scale BB, with a three-year setback for males and a four-year setback for females.
- (j) Turnover Select and ultimate rates based upon the 2010–2013 actual withdrawal experience.
- (k) Disability Incidence rates based upon the 2010–2013 actual experience. Postdisability mortality in accordance with the RP-2000 Disabled Retiree Mortality Table, 2000 base year, projected to 2018 with Projection Scale BB.
- (l) Retirement Retirement rates based on the 2010–2013 actual experience. Deferred vested members are assumed to retire at their earliest unreduced retirement date.
- (m) Marriage and age difference Wives are assumed to be three years younger than husbands. 85% of male members and 75% of female members are assumed to be married.
- (n) Dependent children Benefits to dependent children have been valued assuming members who are married and between the ages of 25 and 45 have two dependent children.
- (o) Contribution refunds 5% of terminating members with vested benefits are assumed to have their contributions refunded. 100% of those with nonvested benefits are assumed to have their contributions refunded.
- (p) Cost of living allowance (COLA) Of those benefit recipients who are eligible for the COLA, 60% are assumed to remain in Alaska and receive the COLA.
- (q) Sick leave 4.5 days of unused sick leave for each year of service are assumed to be available to be credited once the member retires, terminates, or dies.
- (r) Postretirement pension adjustment (PRPA) 50% and 75% of assumed inflation, or 1.56% and 2.34%, respectively, is valued for the annual automatic PRPA as specified in the statute.
- (s) Expenses All expenses are net of investment return assumption.
- (t) Part-time status Part-time members are assumed to earn 0.75 years of credited service per year.

Teachers' Retirement System
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## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

- (u) Reemployment option All reemployed retirees are assumed to return to work under the Standard Option.
- (v) Service Total credited service is provided by the State. The actuary assumes that this service is the only service that should be used to calculate benefits. Additionally, the State provides claimed service (including Bureau of Indian Affairs Service). Claimed service is used for vesting and eligibility purposes.
- (w) Final average earnings Final average earnings is provided on the data for active members. This amount is used as a minimum in the calculation of the average earnings in the future.
- (x) Per capita claims cost Sample claims cost rates adjusted to age 65 for FY15 medical benefits and prescriptions are shown below:

	Medical	Prescription drugs
Pre-Medicare	\$ 12,362	2,624
Medicare Parts A and B	1,657	2,624
Medicare Part B Only	7,920	2,624
Medicare Part D	N/A	507

- (y) Third-party administrator fees \$193.98 per person per year; assumed trend rate of 5% per year.
- (z) Medicare Part B Only For actives and retirees not yet Medicare-eligible, participation is set based on whether the member/retiree will have 40 quarters of employment after March 31, 1986, depending upon date of hire and/or rehire.

## Teachers' Retirement System (A Component Unit of the State of Alaska)

## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

(aa) Health cost trend – The table below shows the rate used to project the cost from the shown fiscal year to the next fiscal year. For example, 10.0% is applied to the FY15 pre-Medicare medical claims costs to get the FY16 medical claims cost.

Fiscal year	Medical pre-65	Medical post-65	Prescription drugs
2015	10.0%	6.0%	6.0%
2016	9.4	5.9	5.7
2017	8.8	5.8	5.4
2018	8.2	5.7	5.1
2019	7.6	5.6	4.8
2020	7.0	5.6	4.6
2021	6.5	5.6	4.4
2025	5.6	5.6	4.2
2050	4.4	4.0	4.0
2100	4.4	4.0	4.0

For the June 30, 2012 valuations and later, the updated Society of Actuaries' Healthcare Cost Trend Model is used to project medical and prescription drug costs. This model effectively begins estimating trend amounts beginning in 2012 and projects out to 2100. This model has been populated with assumptions that are specific to the State of Alaska.

### (bb) Aging factors:

Age	Medical	Prescription drugs
0–44	2.0%	4.5%
45–54	2.5	3.5
55–64	3.5	3.0
65–73	4.0	1.5
74–83	1.5	0.5
84–93	0.5	_
94 +	_	_

Teachers' Retirement System
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## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

(cc) Retired member contributions for medical benefits – Currently, contributions are required for TRS members who are under age 60 and have less than 25 years of service. Eligible Tier 1 members are exempt from contribution requirements. Annual FY15 contributions based on monthly rates shown below for calendar 2014 and 2015 are assumed based on the coverage category for current retirees. The composite rate shown is used for current active and inactive members in Tier 2 who are assumed to retire prior to age 60 with less than 25 years of service and who are not disabled:

	Calend	ar 2015	Calendar 2014
Coverage category	Annual contribution	Monthly contribution	Monthly contribution
Retiree only	9,876	823	823
Retiree and spouse	19,764	1,647	1,647
Retiree and child(ren)	13,956	1,163	1,163
Retiree and family	23,844	1,987	1,987
Composite	14,676	1,223	1,223

(dd) Trend rate for retired member contributions – The table below shows the rate used to project the retired member medical contributions from the shown fiscal year to the next fiscal year. For example, 7.0% is applied to the FY15 retired member medical contributions to get the FY16 retired member medical contributions.

Fiscal year	_
2015	7.0%
2016	6.6
2017	6.2
2018	5.8
2019	5.4
2020	5.0
2025	4.1
2050	4.0
2100	4.0

Graded trend rates for retired member medical contributions were reinitialized for the June 30, 2014 valuation. Note that actual FY15 retired member medical contributions are reflected in the valuation, so trend on such contribution during FY15 is not applicable.

(ee) Healthcare participation – 100% of system paid members and their spouses are assumed to elect healthcare benefits as soon as they are eligible. 10% of nonsystem paid members and their spouses are assumed to elect healthcare benefits as soon as they are eligible.

Teachers' Retirement System
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## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

The significant actuarial assumptions used in the defined contribution occupational death and disability and retiree medical benefits plan valuation as of June 30, 2014 are as follows:

- (a) Actuarial cost method Liabilities and contributions are computed using entry age actuarial cost method of funding. Any funding surplus or unfunded accrued liability is amortized over 25 years as a level percentage of expected payroll. However, in keeping with GASB requirements, the net amortization period will not exceed 30 years.
- (b) Valuation of assets Recognizes 20% of the investment gain or loss in each of the current and preceding four years. This method will be phased in over five years. Fair value of assets was \$0 as of June 30, 2006. All assets are valued at fair value. Assets are accounted for on an accrued basis and are taken directly from audited financial statements. Valuation assets are constrained to a range of 80% to 120% of fair value of assets
- (c) Valuation of retiree medical benefits Due to the lack of experience for the DC Plan only, base claims costs are based on those described in the actuarial valuation as of June 30, 2014 for defined benefit pension and postemployment healthcare benefit plan (TRS DB Plan) with some adjustments. The claim costs were adjusted to reflect the differences between the DC medical plan and the DB medical plan. These differences include network steerage, different coverage levels and an indexing of the retiree out-of-pocket dollar amounts. To account for higher initial copays, deductibles, and out-of-pocket limits, FY14 claim costs were reduced to 11.9% for medical and 7.1% for prescription drugs. Retiree out-of-pocket amounts were indexed 0.2% each year to reflect the effect of the deductible leveraging on trend and other plan design features.
- (d) Investment return/discount rate 8.00% per year (geometric), compounded annually, net of expenses.
- (e) Salary scale Inflation 3.12% per year. Productivity 0.5% per year.
- (f) Payroll growth 3.62% per year (inflation + productivity).
- (g) Total inflation Total inflation as measured by the Consumer Price Index for urban and clerical workers for Anchorage is assumed to increase 3.12% annually.
- (h) Mortality (pre-termination) Based upon the 2009–2013 actual experience for the TRS DB Plan. 60% of the RP-2000 Mortality Table, 2000 Base Year projected to 2018 with Projection Scale BB, for females and 68% for males. 15% of deaths are assumed to result from occupational causes. The mortality assumptions include an allowance for expected future mortality improvement. The mortality table used was set in 2014 with an actual deaths to expected deaths ratio of 110%.

## Teachers' Retirement System (A Component Unit of the State of Alaska)

## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

- (i) Mortality (post-termination) Based upon the 2009–2013 actual experience of the TRS DB Plan. Three-year setback of the RP-2000 Mortality Table, 2000 Base Year projected to 2018 with Projection Scale BB, with a four-year setback for females and three-year setback for males. The mortality assumptions include an allowance for expected future mortality improvement. The mortality table used was set in 2014 with an actual deaths to expected deaths ratio of 110%.
- (j) Turnover Select and ultimate rates based upon the 2010–2013 actual withdrawal experience of the TRS DB Plan.
- (k) Disability Incidence rates based upon the 2010–2013 actual experience of the TRS DB Plan. Disabilities are assumed to result from occupational causes 15% of the time.
- (l) Retirement Retirement rates based upon the 2010–2013 actual experience of the TRS DB Plan. Deferred vested members are assumed to retire at their earliest unreduced retirement date.

Age	Rate
Age < 55	2.0%
55–59	3.0
60	5.0
61	5.0
62	10.0
63	5.0
64	5.0
65	25.0
66	25.0
67	25.0
68	20.0
69	20.0
>70	100.0

- (m) Marriage and age difference Wives are assumed to be three years younger than husbands. 85% of male members and 75% of female members are assumed to be married.
- (n) Dependent children Benefits to dependent children have been valued assuming members who are married and between the ages of 25 and 45 have two dependent children.
- (o) Contribution refunds 5% of terminating members with vested benefits are assumed to have their contributions refunded. 100% of those with nonvested benefits are assumed to have their contributions refunded.
- (p) Expenses All expenses are net of the investment return assumption.

## Teachers' Retirement System (A Component Unit of the State of Alaska)

## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

(q) Per capita claims cost – Sample claims cost rates adjusted to age 65 for FY15 medical benefits are shown below:

	 Medical	Prescription drugs
Pre-Medicare	\$ 12,362	2,624
Medicare Parts A and B	1,657	2,624
Medicare Part B Only	7,920	2,624
Medicare Part D	N/A	507

- (r) Third-party administrator fees \$193.98 per person per year; assumed trend rate of 5% per year.
- (s) Base claims cost adjustments Due to higher initial copays, deductibles, out-of-pocket limits, and member cost sharing compared to the DB medical plan, the following cost adjustments were applied to the per capita claims cost rates: 0.881 for medical plan, 0.929 for the prescription drug plan, and 0.998 for the annual indexing for member cost sharing.
- (t) Health cost trend The table below shows the rate used to project the cost from the shown fiscal year to the next fiscal year. For example, 10.0% is applied to the FY15 pre-Medicare medical claims cost to get the FY16 medical claims costs:

Fiscal year	Medical Pre-65	Medical Post-65	Prescription drugs
2015	10.0%	6.0%	6.0%
2016	9.4	5.9	5.7
2017	8.8	5.8	5.4
2018	8.2	5.7	5.1
2019	7.6	5.6	4.8
2020	7.0	5.6	4.6
2021	6.5	5.6	4.4
2025	5.6	5.6	4.2
2050	4.4	4.0	4.0
2100	4.4	4.0	4.0

For the June 30, 2014 valuation and later, the updated Society of Actuaries' Healthcare Cost Trend Model is used to project medical and prescription drug cost. This model effectively begins estimating trend amounts beginning in 2014 and projects out to 2090. The model has been populated with assumptions that are specific to the State.

Teachers' Retirement System
(A Component Unit of the State of Alaska)

## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

### (u) Aging factors:

Age	Medical	Prescription drugs
0–44	2.0%	4.5%
45–54	2.5	3.5
55–64	3.5	3.0
65–73	4.0	1.5
74–83	1.5	0.5
84–93	0.5	_
94 +	_	_

### (v) Retiree medical participation:

Decrement	dua to	disability	
i <i>jec</i> remeni	anne na	ausamiiiv	

#### Decrement due to retirement

of participation 40.0%
50.0
55.0
60.0
65.0
70.0
75.0
80.0
85.0
90.0
70.5%
75.2
79.9
89.3
94.0

Participation rates reflect the expected plan election rate that varies by reason for decrement, duration that a member may pay full cost prior to Medicare eligibility, and availability of alternative and/or lower cost options, particularly in the Medicare market.

Teachers' Retirement System
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## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

#### Changes in Actuarial Methods Since the Prior Valuation

Defined benefit pension and postemployment healthcare benefit plan

In accordance with Senate Bill 119, signed into law May 28, 2014, and House Bill 385, signed into law on June 23, 2014, the following changes were effective for the June 30, 2014 actuarial valuation report:

- 1) The amortization method used for funding changed from the level dollar amount to the level percentage of payroll method and the amortization period is reinitialized to a closed 25-year period from June 30, 2014.
- 2) The additional state contribution for fiscal year ending June 30, 2015 is \$2 billion.
- 3) The two-year rate setting time lag is intended to be eliminated. The two-year lag in the setting of contribution rates is replaced by a two-year rollforward of liabilities and projected normal costs and a one-year rollforward of June 30, 2015 assets.
- 4) The actuarial value of assets is reset to the fair value as of June 30, 2014; the five-year smoothing method with grow-in will be implemented over the next five years.
- 5) The 20% corridor over/under the fair value of assets is eliminated in the calculation of the actuarial value of assets.

Defined contribution occupational death and disability and retiree medical benefits plan

There have been no changes in methods since the prior valuation.

Teachers' Retirement System
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## Notes to Required Supplementary Information (Unaudited)

June 30, 2015

## Changes in Actuarial Assumptions Since the Prior Valuation

	June 30, 2013	June 30, 2014
Salary scale	Based on actual experience from 2005 to 2009.	Rates adjusted on actual experience from 2010 to 2013.
Pre-termination mortality	The 1994 GAM Sex-distinct Table, 1994 Base Year projected to 2013 using Projection Scale AA, adjusted 45% for males, and 55% for females.	68% of male rates and 60% of female rates of RP-2000, 2000 Base Year projected to 2018 with Projection Scale BB.  Deaths are assumed to result from nonoccupational causes 85% of the time.
Post-termination mortality	The 1994 GAM Sex-distinct Table, 1994 Base Year projected to 2013 using Projection Scale AA, three year setback for females and a four year setback for males.	94% of male rates and 97% of female rates of RP-2000, 2000 Base Year projected to 2018 with Projection Scale BB, with a three year setback for males and a four year setback for females.
Disability mortality	RP-2000 Disabled Retiree Mortality Table.	RP-2000 Disabled Retiree Mortality Table, 2000 Base Year projected to 2018 with Projection Scale BB.
Turnover	Based on actual experience from 2005 to 2009.	Select and ultimate rates based upon the 2010–2013 actual withdrawal experience.
Disability	Based on actual experience from 2005 to 2009 and stop rates at earliest retirement age.	Retirement rates based on 2010–2013 experience. Male/female rates increased and changed to Unisex rates.  Disabilities are assumed to result from occupational causes 15% of the time.
Retirement	Rates adjusted based on actual experience from 2005 to 2009.	Retirement rates based on 2010–2013 experience.
Part-time service	0.60 years of credited service per year.	Part-time employees are assumed to earn 0.75 years of credited service per year.

## **SUPPLEMENTAL SCHEDULES**

## Teachers' Retirement System

(A Component Unit of the State of Alaska)

## Schedule of Administrative and Investment Deductions

Years ended June 30, 2015 and 2014

(In thousands)

			Totals	
	Administrative	Investment	2015	2014
Personal services:				_
Wages \$	1,622	95	1,717	1,662
Benefits	984	39	1,023	951
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Total personal services	2,606	134	2,740	2,613
Travel:				
Transportation	18	39	57	62
Per diem	4	18	22	23
Total travel	22	57	79	85
Contractual services:				
Management and consulting	5,096	14,263	19,359	17,098
Accounting and auditing	98	318	416	66
Data processing	527	223	750	1,071
Communications	55	14	69	72
Advertising and printing	22	3	25	35
Rentals/leases	138	21	159	152
Legal	127	35	162	152
Medical specialists	20	_	20	44
Repairs and maintenance	2	3	5	6
Transportation	22	1	23	59
Other professional services	58	16	74	61
Total contractual services	6,165	14,897	21,062	18,816
Patient Protection and Affordable Care Act:				
Transitional Reinsurance Program	378	_	378	_
PCORI Fees	<del></del>	_	<del></del>	5
Total Patient Protection	270		270	_
and Affordable Care Act	378		378	5
Other:				
Equipment	17	6	23	19
Supplies	55	23	78	67
Total other	72	29	101	86
Total administrative and				
investment deductions \$	9,243	15,117	24,360	21,605

See accompanying independent auditors' report.

Teachers' Retirement System

(A Component Unit of the State of Alaska)

## Schedule of Payments to Consultants Other than Investment Advisors

Years ended June 30, 2015 and 2014 (In thousands)

Firm	Services	 2015	2014
Buck Consultants, an Xerox Company	Actuarial services	\$ 395 \$	355
KPMG LLP	Auditing services	107	51
State Street Bank Corporation	Custodian banking services	374	287
Applied Microsystems Inc.	Data processing consultants	203	359
Computer Task Group, Inc.	Data processing consultants	47	51
Mythics Inc.	Data processing consultants	_	4
Wostmann Group LLC	Data processing consultants	101	88
State of Alaska, Department of Law	Legal services	127	123
Michael Silverman	Management consulting services	_	93
The Wilson Agency LLC	Management consulting services	_	1
State of Alaska, Department of Health and Social Services	Medical expertise and counseling	 15	44
		\$ 1,369 \$	1,456

See accompanying independent auditors' report.

