THE BOARD OF SUPERVISORS OF THE COUN	TY OF STANISLAUS RY
DEPT: StanCERA	BOARD AGENDA # <u>*B-9</u>
Urgent 🗂 Routine 🖬 🔿	AGENDA DATE May 24, 2011
CEO Concurs with Recommendation YES NO	4/5 Vote Required YES 🔲 NO 🔳
(Information Attached)	· · · · · · · · · · · · · · · · · · ·

SUBJECT:

Approval to Adopt Retirement Contribution and Interest Rates for Fiscal Year 2011-2012

STAFF RECOMMENDATIONS:

- 1. Adopt the revised retirement contribution rates based on the revised actuarial assumptions for fiscal year 2011-2012 as recommended by the Board of Retirement.
- Direct the Auditor-Controller to change the employer retirement contribution rates for the fiscal year 2011-2012 in accordance with the actuarial valuation of June 30, 2010, and the supplemental schedule (copies available from the Clerk of the Board of Supervisors) on the payroll check date of July 27, 2011.

## FISCAL IMPACT:

The overall fiscal impact of the retirement contribution rates after the impact of the \$12.6 million contribution from non-valuation reserves to offset County employer contributions is approximately \$25.9 million, of which approximately \$11.4 million is General Fund cost. This represents 12.4% of total covered County payroll. The overall cost of \$25.9 million is included in the individual department level budgets for fiscal year 2011-2012. In addition to these costs, the County continues to make semi-annual debt-service payments of over \$10.8 million annually to retire the Pension Obligation Bonds (POBs) issued in 1995.

BOARD ACTION AS FOLLOWS:

No. 2011-311

On motion of Supervisor	Chiesa	, Seconded by Supervisor <u>Withrow</u>
and approved by the follo	wing vote,	
Ayes: Supervisors:	<u>O'Brien, Chiesa, Wit</u>	hrow, DeMartini, and Chairman Monteith
Noes: Supervisors:	None	
<b>Excused or Absent: Supe</b>	rvisors: None	
Abstaining: Supervisor:	None	
1) X Approved as r	ecommended	
2) Denied		
3) Approved as a	mended	
4) Other:		
MOTION:		

ATTEST:

CHRISTINE FERRARO TALLMAN, Clerk

File No.

Approval to Adopt Retirement Contribution and Interest Rates for Fiscal Year 2011-2012 Page 2

## **DISCUSSION:**

On March 9, 2011, the actuarial report and valuation of the Stanislaus County Employees' Retirement Association (StanCERA) as of June 30, 2010, was presented to the Board of Retirement by Graham Schmidt of EFI Actuaries. Representatives from the Chief Executive Office were in attendance.

The Board of Retirement held one additional meeting on March 22, 2011, to further review the report and the assumptions. The Board of Retirement adopted the actuarial report on April 13, 2011, with the following assumption changes. The assumed rate of return was decreased from 8.16% to 8.00%; member mortality rates increased; a factor for vacation cash outs was included in actuarial calculations, and active members shared in cost of living adjustments. Also, the Board of Retirement approved transfers of \$14.3 million from non-valuation reserves to offset County and former County, City of Ceres, and District(s) employer contributions for fiscal year 2011-2012. The revised employer contribution rate assumption changes are a pdf-format file with two (2) tables entitled, "Revised Employer Contribution Rates for County/Former County Members 2011-2012," and "Revised Employer Contribution Rates for Ceres/Other District Members 2011-2012." These tables were reviewed and approved by EFI Actuaries. The tables have been provided to all StanCERA employer members. The assumption changes were made to maintain the soundness of the retirement system so that retirement benefits promised by the Board of Supervisors may be paid to active, deferred, and retired members as promised. The report contains an interest assumption rate of 8%, an average recommended Employee contribution rate of 8.01% and an average Employer contribution rate of 12.44%. This results in an increase in average Employee rates of 0.82%, and an increase in average Employer rates of 0.93%. The Employer rates are delineated by membership type (General or Safety), and tier. The current rates in effect are:

County Contribution Rates – Existing (FY 2010-2011)												
	<u>Safety</u>	<u>Tiers</u>										
1	2	3	4	5	4	5						
4.20%	15.52%	5.88%	9.47%	10.09%	6.13%	18.85%						

The recommended County employer rates for FY 2011-2012 are:

	<u>(</u>	General Tie	Safety Tiers					
Tier 1	Tier 2	Tier 3	Tier 4	Tier 5	Tier 2	Tier 4	Tier 5	
N1/A	0.000/	0 4 4 9 /	0 700/	10 740	47 600/	40.400/	20.05%	
N/A	9.63%	0.44%	9.70%	10.74%]	17.03%	13.13%	20.95%	

The report and supplemental schedule are available from the Clerk of the Board of Supervisors.

Approval to Adopt Retirement Contribution and Interest Rates for Fiscal Year 2011-2012 Page 3

## **POLICY ISSUES:**

Effective July 1, 1948, the Stanislaus County Board of Supervisors began offering retirement benefits to County employees pursuant to the County Employees Retirement Law of 1937 (Government Code Section 31450 et seq). Retirement benefits are funded on an actuarially sound basis according to the 1937 Act.

Specifically, Pursuant to Government Code Section 31454:

"The Board of Supervisors shall.... adjust the rate of interest, the rates of contributions of members, and county and district appropriations in accordance with the recommendation of the Board [of Retirement], but shall not fix them in such amounts as to reduce the individual benefits provided in this chapter [CERL]."

Government Code Section 31584 further states that:

"The Board of Supervisors shall make the appropriations and if it fails or neglects to make appropriations, the County Auditor shall transfer from any money available in any fund in the County Treasury the sums specified by this chapter [CERL], and this transfer shall have the same force and effect as it would have had if the required appropriations had been made by the Board of Supervisors."

## STAFFING IMPACT:

While the production and implementation of retirement contribution rates annually does not require additional staff, StanCERA acknowledges that increases or decreases in required contribution rates does affect participating agencies' ability to provide staffing service levels.

## CONTACT INFORMATION:

Tom Watson, Retirement Administrator, (209) 525-6393, or, at <u>www.retirement.org</u> with any questions.

# Stanislaus County Employees' Retirement Association

Actuarial Review and Analysis as of June 30, 2010

Final Report April 5, 2011

## Contents

Analysis of Results1
Section 1: Summary of Plan Provisions, Member Statistics, and Actuarial Assumptions9
1.1: Brief Outline of Plan Provisions10
1.2: Participant Data as of July 1, 201019
1.3: Actuarial Methods and Assumptions
1.4: Glossary of Actuarial Terms49
Section 2: Asset Information51
2.1: Balance Sheet as of June 30, 2009 and June 30, 201052
2.2: Computation of Actuarial Value of Assets as of June 30, 2010
2.3: Income Statement For the Years Ending June 30, 2009 and June 30, 201054
2.4: Historical Returns55
Section 3: Actuarial Computations
3.1: Computation of Annual Contribution Rate as of June 30, 2009
3.2: Computation of Annual Contribution Rate as of June 30, 2010
3.3: Computation of Funding Ratios as of June 30, 201060
3.4: Actuarial Analysis of Financial Experience61
3.5: Detailed Calculation of Costs as of June 30, 2010 - By Class and Tier62
3.6: Actuarial Balance Sheet63
Section 4: Disclosure Information65
4.1: Schedules of Funding Status and Employer Contributions Required Under GASB Statement No. 25
Appendix I: Employer Contribution Rates69
Appendix II: Employee Contribution Rates71



## **Analysis of Results**

## **Executive Summary**

This Report presents the results of an actuarial review and analysis of the Stanislaus County Employees' Retirement Association (StanCERA, the Plan) as of June 30, 2010. Employer contribution rates for the Fiscal Year beginning July 1, 2011 have been determined based on demographic and asset information as of June 30, 2010.

Valuation Date **Employer Contribution Estimated Employer Contribution** for Current Members as % of Pay June 30, 2009 19.56% \$48,577,084 **Final Results** June 30, 2010 FY2011 **Prior Assumptions** 19.19% \$48,081,684 **Current Assumptions (Including Pay** \$43,059,346 18.60% Freeze / Reduction)

The employer contribution rates shown in this Report are as follows:

A summary of the current status of the StanCERA Plan as a whole is as follows:

	June 30, 2009	June 30, 2010
Plan Membership		
Active	4,355	4,149
Inactive	865	872
Receiving Benefits	2,751	2,830
Total	7,971	7,851
Average Pay (does not reflect impact of furloughs)	\$56,555	\$59,974
Assets (\$ millions)		
Market Value	\$1,058.1	\$1,190.2
Actuarial Value of Assets	\$1,269.7	\$1,402.1
Valuation Assets	\$ 1,171.8	\$ 1,325.8
Valuation Results (\$ millions)		
Actuarial Accrued Liability (AAL)	\$1,653.7	\$1,737.8
Unfunded AAL (AAL – Valuation Assets)	\$481.9	\$ 412.0
Funded Ratio (Valuation Assets)	70.9%	76.3%
Funded Ratio (Market Value of Assets, excluding Special Reserves of \$68.4 million)	59.0%	64.6%



More detailed information on the contributions by Class and Tier, as well as a description of the reasons for the changes in cost, is shown in both this section and in the detailed cost calculations shown later in the Report.

The main points in this Report are as follows:

- The net impact of the demographic changes during the past year was a moderate increase in the contribution rate.
- Investment gains and other asset changes during the year reduced the cost of the Plan.
- The Board approved the implementation of new demographic and economic assumptions as part of the Experience Study covering the period from July 1, 2006 through June 30, 2009. While the overall impact of the new assumptions was a small increase on total current Plan cost, the employee contribution rates also increased as a result of these changes. The net impact was a small reduction in the employer contribution rate.
- An additional assumption change was applied, reflecting the expectation that no base salary increases will occur over the next two fiscal years. A temporary five percent reduction was applied to the pay for the County employees over the same time period. This change had little impact on the contribution as a percentage of payroll, but it reduced the dollar amount of the actuarial cost and expected contribution and increased the funded ratio of the Plan.



## **Purpose of the Report**

This Report presents the results of an actuarial review and analysis of the Stanislaus County Employees' Retirement Association as of June 30, 2010. The purposes of this Report are:

- To review the experience of the Plan over the past year and discuss reasons for changes in Plan cost;
- To compute the annual contribution required to fund the Plan in accordance with actuarial principles;
- To discuss other issues associated with the determination of Plan and Tier costs; and
- To present those items required for disclosure under Statement No. 25 of the Governmental Accounting Standards Board (GASB).

## **Organization of the Report**

This Report is organized in five sections:

- This Summary presents the conclusions of the Report and discusses the reasons for changes since the last valuation.
- Section 1 below contains an outline of the Plan provisions on which our calculations are based, statistical data concerning Plan participants, and a summary of the actuarial assumptions used to compute liabilities and costs. A glossary of actuarial terms is also included.
- Section 2 presents information concerning Plan assets, including balance sheets and income statements from July 1, 2009 to June 30, 2010. The actuarial value of Plan assets and the amount of the valuation assets are also computed in this Section.
- Section 3 contains the calculation of actuarial liabilities and the employer contribution rate, as well as the actuarial balance sheet and development of gain and loss.
- Section 4 contains pension plan information required under Statement No. 25 of the Governmental Accounting Standards Board.
- The Appendices contain employer and employee contribution rates by Group, Class and Tier.



## Actuarial Valuation as of June 30, 2010

The employer contribution rate declined slightly from 19.56% of payroll as of June 30, 2009 to 18.60% one year later, due primarily to the investment experience. The narrative and table below summarize the impact of actuarial experience and other changes on Plan cost.

	Contribution Rate (% Payroll)	FY 2010-11 Employer Cost (\$ in Millions)
June 30, 2009	19.56%	\$48.6
Demographic Experience	0.92%	3.4
Salary Experience	0.07%	0.3
New Entrants to the Plan	0.19%	0.8
Amortization Payroll	0.41%	0.0
Investment Experience	(1.96%)	(4.9)
New Assumptions / Employee Contribution Rates	(0.39%)	(0.7)
Temporary Pay Freeze / Reduction	0.07%	(3.7)
Rolling Amortization (Retain 25 Year Period)	(0.27%)	(0.6)
Employer Cost as of June 30, 2010	18.60%	\$43.1

The changes affecting the cost from 2009 through 2010 are described below:

• Demographic experience caused an increase in the contribution rate.

Demographic experience includes rates of retirement, disability, termination, and death – as well as other factors, such as transfers, sick leave credit and cost of living assumptions. The demographic experience of the Plan was less positive than was assumed in the actuarial assumptions used in the prior actuarial valuation, producing actuarial losses and an increase in the employer contribution rate of 0.92% of pay.

• Pay increases were close to those expected.

Increases in pay among active members were similar to those anticipated by the actuarial assumptions. The impact of the lower than expected salary increases was a very small actuarial loss, increasing the employer contribution rate by 0.07% of payroll.

• New members entered the Plan.

Although the total number of active members in the Plan decreased by about 200 members from June 30, 2009 to June 30, 2010, there were approximately 25 new hires (or rehires) entering the Plan to replace departing members.



These new hires were not included the prior valuation cost calculations. They increased the employer contribution rate by 0.19% of payroll, and increased the cost of the plan by \$0.8 million in dollar terms due to the added payroll.

• Changes in the valuation assets produced an actuarial gain.

The return on the *market* value of assets was 15.6% (net of expenses) over the fiscal year 2009-2010. The return on the *actuarial* value of assets was 13.0%, while the return on the *valuation* assets (excluding the non-valuation reserves) was 14.7%, a gain of over 6.5% compared to the expected return.

The lower return on the actuarial value of assets compared to market (13.0% versus 15.6%) is a result of the delayed recognition of asset losses experienced in FY 2009. Under the actuarial smoothing policy selected by the Board, only 20% of the gains or losses occurring in a given year are recognized in that year – with the remaining portion recognized over the next four years at 20% per year.

There is also a corridor around the market value of assets that does not allow the smoothed actuarial value of assets to differ from the market value by more than a certain amount (also 20%). Because the losses during FY 2009 were so large, the actuarial value of assets was limited to 120% of the market value by the corridor. Therefore, the amount of smoothing of the prior year loss was limited, as more than 20% was recognized.

Valuation assets are lower than the actuarial value, because special non-valuation reserves are excluded. The higher return on the valuation assets compared to the actuarial value (14.7% versus 13.0%) is a result of transfers made by the Board from non-valuation assets to valuation assets... Some of the assets transferred were used to reestablish the 2% Contingency Reserve.

The higher-than-expected return on the valuation assets produced an actuarial gain that reduced Plan costs by 1.96% of active member payroll, or about \$4.9 million.

• Changes in the payroll used to amortize the unfunded liability increased the cost as a percentage of payroll.

Under the level percentage of payroll amortization method that is currently part of the funding policy, the amortization payment is determined based on an assumption that total payroll will increase each year (by 4.0% under the assumptions in place as of the prior valuation). The amortization payment is recalculated each year, based on the unfunded liability determined as of the valuation date, and then divided by the current year projected payroll to compute the amortization amount as a percentage of pay.

If – as was the case this year – pay does *not* increase by the projected salary growth assumed in the amortization calculation, the amortization payment will be larger as a percentage of pay, though the dollar amount is the same. This increased the employer contribution rate by 0.41% of pay.



The above sources of actuarial gains and losses combined to reduce Plan cost by 0.37% of payroll from 2009 to 2010, as noted above.

In addition to the gains and losses described above, there were several other changes that affected Plan cost:

• The Board approved the implementation of a number of assumption changes as part of the Experience Study covering the period from July 1, 2006 through June 30, 2009.

These changes include modifications to the demographic rates of retirement, termination and disability, reductions in the economic assumptions (assumed rates of inflation, payroll growth, investment return and post-retirement COLA growth), more conservative mortality assumptions for males, and the introduction of service-based merit pay increases and terminal pay loads associated with vacation cash outs.

The impact in the overall actuarial cost of the Plan was an increase of about 0.4% of payroll. However, under the '37 Act, the *basic* employee contribution rates must be recalculated anytime the economic, pay growth or mortality assumptions are changed. In addition, EFI has updated the *COLA* employee contribution rates as well, based on changes to the demographic and economic assumptions and a change to the methodology for determining the rates (as described in a presentation made to the Board on December 8, 2010).

As a result, the average employee contribution rate increased by just over 0.8% of pay. The employee contributions act as a direct offset to the employer contribution rate, so the net impact on the employer contribution rate from the changes to the actuarial assumptions and the employee contribution rates was a small reduction, 0.39% of pay.

In addition to the assumption changes implemented as part of the Experience Study, EFI incorporated a short-term change to the payroll growth assumptions, reflecting an anticipated lack of base salary increases for the next two fiscal years. In addition, we have modeled the impact of a temporary 5% reduction to the pay of the County employees (though not those of the City of Ceres or other employers), reflecting the mandatory furloughs that are scheduled to be applied over the same two year time period.

We did not reduce below current levels the pay used to project the benefit amounts for members assumed to retire during the next two years, because the furloughs will not affect the final average compensation of members declaring intent to retire during this period. The lack of expected wage growth during this time period resulted in a reduction in the projected future benefits and therefore in the actuarial accrued liability of the Plan and an improvement in the funded ratio of approximately 2.4%.

The application of the assumed two year pay freeze and County furloughs did not have a significant impact on the contribution rate as a percentage of payroll; the employer contribution rate actually increased by 0.07%, due to the fact that a smaller payroll base is being used to amortize the



unfunded actuarial accrued liability. However, the change is expected to reduce the dollar amount of the actuarial cost, by approximately \$3.7 million.

• A rolling amortization period was implemented in the prior valuation.

As part of the June 30<sup>th</sup>, 2009 valuation, the Board elected to amortize the unfunded actuarial accrued liability over 25 years as a level percentage of payroll, for all employers. It was stated at the time that the amortization period would stay at this level until the Board elects to make a change to this policy. The impact of the rolling amortization policy on this valuation was to reduce the current cost by 0.27% of pay.

## **Future Cost Trends and Other Issues**

There are a number of factors that can be expected to impact costs in the future:

- There are still investment losses that have been deferred by the actuarial smoothing method and have not been recognized in the valuation assets. The ratio of the actuarial value of Plan assets to the market value is current 118%; this means that 18% of Plan assets actually represent investment losses that have yet to be recognized. If the cost of the plan were determined using the market value of valuation assets (rather than the actuarial value), the cost of the Plan would increase by about 5.6% of pay to 24.2% or pay, or \$56 million.
- The Government Account Standards Board (GASB) is considering changes to the accounting standards governing the financial statements of public pension plans and the employers. Some of the major changes being considered include putting the unfunded liability on the employer's balance sheet, shortening amortization periods (or eliminating amortization for changes in the retiree liabilities) and changes to the allowable actuarial cost methods. Note these changes would not necessarily impact Plan funding, as they are accounting standards only.
- Investments consultants generally seem to be reducing their return expectations for the next ten years. A trend is developing of Boards reducing their return assumptions below 8%. The Board will need to address this issue in the coming years.

## Actuarial Certification

This report presents the results of the annual actuarial review of the StanCERA Retirement Plan (the Plan) as of June 30, 2010. The prior review was conducted as of June 30, 2009.

In this study, financial information and data on active and inactive Members and their beneficiaries as of the valuation date was supplied by the Plan Administrator on electronic media. As is usual in studies of this type, Member data was neither verified nor audited. However, we conducted an examination of all participant data for reasonableness and consistency. The financial information included the Statement of Changes in Plan Net Assets Available for Benefits and Statement of Plan Net Assets Available for Benefits, both of which are included in the Comprehensive Annual Financial Report.



Actuarial funding is based on the Entry Age Normal Cost Method. Under this method, the employer contribution rate provides for current cost (normal cost) plus a level percentage of payroll to amortize the unfunded actuarial accrued liability (UAAL). As of the valuation date, the amortization period is 25 years.

The funding objective of the Plan is to establish contribution rates that, over time, are likely to remain as a level percentage of payroll unless Plan benefit provisions are changed. For actuarial valuation purposes, Plan assets are valued at Actuarial Value. Under this method, the assets used to determine employer contribution rates take into account market value by spreading all investment gains and losses (returns above or below expected returns) over a period of five years.

Our firm has prepared all of the schedules presented in the actuarial report. We reviewed the actuarial assumptions shown in the schedules and found them to be reasonably appropriate for use under the Plan. The assumptions used in this report reflect the results of an Experience Study performed by EFI covering the period from July 1, 2006 through June 30, 2009, and approved by the Board. The assumptions used in the most recent valuation are intended to produce results that, in the aggregate, reasonably approximate the anticipated future experience of the Plan. The next experience analysis is expected to cover the years through 2012.

GASB Statement No. 25 requires preparation of trend data schedules of funding status and employer contributions. To produce the required schedules, we have relied upon information from our files and contained in the reports of other actuaries employed by the sponsor in completing the schedules.

We certify that the valuation was performed in accordance with generally accepted actuarial principles and practices. In particular, the assumptions and methods used for funding purposes meet the parameters of the Governmental Accounting Standards Board Statement No. 25. We are members of the American Academy of Actuaries and meet the Qualification Standards to render the actuarial opinion contained herein.

Respectfully Submitted,

a lor

Robert T. McCrory, FSA (206) 328-8628

Graham A. Schmidt, ASA (415) 439-5313



## Section 1:

Summary of Plan Provisions, Member Statistics, and Actuarial Assumptions



## **1.1: Brief Outline of Plan Provisions**

## Definitions

#### Compensation

Compensation means the cash remuneration for services paid by the employer. It includes base pay and certain differential, incentive, and special pay allowances defined by the Board of Retirement. Overtime is excluded, with the exception of overtime paid under the Fair Labor Standards Act that is regular and recurring.

#### **Credited Service**

In general, Credited Service is earned for the period during which Member Contributions are paid. Since Tier 3 Members participate in a non-contributory Plan, their Credited Service is calculated based on their date of Membership only.

Temporary service for which the Member was not credited, or service for which the Member withdrew his or her Member Contributions, may be purchased by paying or repaying the Member Contributions with interest. The categories of services that credit may be purchased for are listed below:

- Prior Part-time Service: If a Member worked for an employer within the Association on a part-time or 'extra help' basis before his membership in the Retirement Association, the Member may buyback this service.
- Intermittent Part-time Service
- Prior full time Service: Member may buyback full time service that may have been cashed out upon termination.
- Leave of Absence (Including absence with State Disability or Worker's Compensation): No unpaid leave of absence can be bought back except for absence due to medical reasons of up to one year.
- Public Service: Only Tier 1 and 4 Members may buy back this service.
- Military Time: Only Tier 1 and 4 Members may buy back this service.
- Enhance Prior Tier Service: Applies to certain active and deferred Members with Tier 1, 2 or 3 service.
- Military "call up"
- AB 2766: Only Safety Employees can buy back this service.

A percentage of credited sick leave may be credited according to the Member's applicable bargaining unit.



#### **Final Compensation**

For General Members belonging to Tier 2 and Tier 3, Final Compensation means the highest Compensation earned during any thirty six consecutive months of the Member's employment. For all others, it is the highest Compensation earned during any twelve months of employment.

#### **General Member**

Any Member who is not a Safety Member is a General Member.

#### Safety Member

Any sworn Member engaged in law enforcement, probation, or fire suppression is a Safety Member.

#### Membership

#### Eligibility

All full-time, permanent employees of Stanislaus County, City of Ceres, Stanislaus County Superior Court, Salida Sanitary District, East Side Mosquito Abatement, Keyes Community Services, Hills Ferry Cemetery and StanCOG hired on or after October 1, 1988 become Members on their date of appointment. All others hired before October 1, 1988 became Members on the first day of the calendar month following their date of appointment.

Detailed membership eligibility according to Tier and membership date is shown in Table 1.

#### **Service Retirement**

## Eligibility

Tier 3 General Members are eligible to retire at age 55 if they have earned ten years of Credited Service. All other General Members are eligible to retire at age 50 if they have earned five years of Credited Service and have been an Association member for at least ten years. Alternatively, General Members are eligible to retire at any age after having earned 30 years of Credited Service, or upon reaching age 70 with no service requirement.

Safety Members are eligible to retire at age 50 if they have earned five years of Credited Service and have been an Association member for at least ten years. Alternatively, Safety Members are eligible to retire at any age after having earned 20 years of Credited Service, or upon reaching age 70 with no service requirement.

## **Benefit Amount**

The Service Retirement Benefit payable to the Member is equal to the Member's Final Compensation multiplied by credited service, the benefit factor from Table 1 and the age factor from Table 2 corresponding to the Member's code section. The appropriate code sections for each group are listed in Table 1.

For Tier 3 Members with Credited Service up to thirty five years, the percentage of Final Compensation may not exceed 70% and for those with more than thirty five years, it may not



exceed 80%. For all other Members, the percentage of Final Compensation may not exceed 100%. For those members integrated with Social Security (other than Tier 3), Retirement Benefits based on the first \$350 of monthly Final Average Compensation are reduced by one-third.

	Open or			Code		Top Retirement	
Group	Closed	FAP	COLA	Section	Description	Factor Age	Benefit Factor
General Tier 1	Closed	1	3	31676.12	2% at 57	62	2.00%
General Tier 2	Closed	3	3	31676.1	2% at 62	65	1.67%
General Tier 3	Closed	3	0	31499.14	Non- Contributory	65	First 35 Years: 2.0% of FAS less 1/35 <sup>th</sup> of Social Security benefit at age 65. Next 10 Years: 1% of FAS
General Tier 4	Closed	1	3	31676.14	2% at 55	65	1.67%
General Tier 5	Open <sup>1</sup>	1	3	31676.14	2% at 55	65	1.67%
Safety Tier 4	Closed	1	3	31664.1	3% at 50	50	3.00%
Safety Tier 5	Open <sup>2</sup>	1	3	31664.1	3% at 50	50	3.00%

## Table 1: Member Group Descriptions

## **Table 2: Age Factors**

	Safety	General	General	General	General
	3% at Age 50	2% at Age 62	2% at Age 57	2% at Age 55	2% at Age 65
Age	CERL §: 31664.1	CERL §: 31676.1	CERL §: 31676.12	CERL §: 31676.14	CERL §: 31499.14
41.00	0.6258	N/A	N/A	N/A	N/A
42.00	0.6625	N/A	N/A	N/A	N/A
43.00	0.7004	N/A	N/A	N/A	N/A
44.00	0.7397	N/A	N/A	N/A	N/A
45.00	0.7805	N/A	N/A	N/A	N/A
46.00	0.8226	N/A	N/A	N/A	N/A
47.00	0.8678	N/A	N/A	N/A	N/A
48.00	0.9085	N/A	N/A	N/A	N/A
49.00	0.9522	N/A	N/A	N/A	N/A
50.00	1.0000	0.7091	0.6681	0.8850	N/A
51.00	1.0000	0.7457	0.7056	0.9399	N/A
52.00	1.0000	0.7816	0.7454	1.0000	N/A
53.00	1.0000	0.8181	0.7882	1.0447	N/A
54.00	1.0000	0.8556	0.8346	1.1048	N/A
55.00	1.0000	0.8954	0.8850	1.1686	0.3900
56.00	1.0000	0.9382	0.9399	1.2365	0.4300
57.00	1.0000	0.9846	1.0000	1.3093	0.4700
58.00	1.0000	1.0350	1.0447	1.3608	0.5100
59.00	1.0000	1.0899	1.1048	1.4123	0.5600
60.00	1.0000	1.1500	1.1686	1.4638	0.6100
61.00	1.0000	1.1947	1.2365	1.5153	0.6700
62.00	1.0000	1.2548	1.3093	1.5668	0.7400
63.00	1.0000	1.3186	1.3093	1.5668	0.8200
64.00	1.0000	1.3865	1.3093	1.5668	0.9000
65.00	1.0000	1.4593	1.3093	1.5668	1.0000

<sup>&</sup>lt;sup>2</sup> As of January 1, 2001, new County Safety hires will enter a new Tier, with the same provisions as the old Safety Tier 2.



<sup>&</sup>lt;sup>1</sup> As of January 1, 2011, new County General hires will enter a new Tier, with the same provisions as General Tier 2.

#### Form of Benefit

The Service Retirement Benefit will be paid monthly beginning at retirement and for the life of the Member. If the member selects the unmodified benefit form, in the event of the Member's death 60% of the benefit will continue for the life of the Member's spouse or to the age of majority of dependent minor children if there is no spouse. For Tier 3 Members, the benefit payable to beneficiary is limited to 50%. In the event there is no surviving spouse or minor children, any unpaid remainder of the Member's accumulated contributions will be paid to the Member's designated beneficiary.

Actuarially equivalent optional benefit forms are also available.

Annually on April 1, benefits for all retired members other than those in Tier 3 are adjusted to reflect changes in the CPI for the San Francisco Bay Area since the prior year. Benefits may be increased or decreased, but the cumulative changes shall never reduce the benefit below the original monthly allowance. Annual increases may not exceed the COLA figures shown in Table 1, but CPI increases above this figure are "banked" and used for future increases when the CPI increases by less than the figures shown.

In addition, ad hoc cost of living adjustments have been granted in the past and may be granted in the future.

A lump sum benefit of \$5,000 will be payable upon the death of a retired member. No death benefit is payable for Tier 3 retired members.

## Service-Connected Disability

## Eligibility

All non-Tier 3 Members are eligible for Service-Connected Disability Retirement benefits at any age if they are permanently disabled as a result of injuries or illness sustained in the line of duty. Tier 3 Members are not eligible to receive disability benefits.

#### **Benefit Amount**

The Service-Connected Disability Retirement Benefit payable to Members is equal to the greater of 50% of their Final Compensation or – if the Member is eligible at disability for a Service Retirement Benefit – the Service Retirement Benefit accrued on the date of disability.

## Form of Benefit

The Service-Connected Disability Retirement Benefit will be paid monthly beginning at the effective date of disability retirement and for the life of the Member; in the event of the Member's death, 100% of the benefit will continue for the life of the Member's spouse or to the age of majority of dependent minor children if there is no spouse. In the event there is no surviving spouse or minor children, any unpaid remainder of the Member's accumulated contributions will be paid to the Member's designated beneficiary.



Actuarially equivalent optional benefit forms and COLA adjustments (as described for the Service Retirement benefit) are also available. A lump sum benefit of \$5,000 will be payable upon the death of the member.

## Nonservice-Connected Disability

## Eligibility

Tier 3 Members are not eligible to receive disability benefits. All other Members are eligible for Nonservice-Connected Disability Retirement benefits if they are permanently disabled at any age after earning five years of Credited Service.

## **Benefit Amount**

The Nonservice-Connected Disability Retirement Benefit payable to Tier 1 General Members is equal to the greatest of:

- 1.8% of Final Compensation at disability multiplied by years of Credited Service at disability;
- 1.8% of Final Compensation at disability multiplied by years of Credited Service projected to age 62, but not to exceed one-third of Final Compensation; or
- If the Member is eligible at disability for a Service Retirement Benefit, the Service Retirement Benefit accrued on the date of disability.

The Nonservice-Connected Disability Retirement Benefit payable to Tiers 2, 4 and 5 General Members is equal to the greatest of:

- 1.5% of Final Compensation at disability multiplied by years of Credited Service at disability;
- 1.5% of Final Compensation at disability multiplied by years of Credited Service projected to age 65, but not to exceed one-third of Final Compensation; or
- If the Member is eligible at disability for a Service Retirement Benefit, the Service Retirement Benefit accrued on the date of disability.

The Nonservice-Connected Disability Retirement Benefit payable to Safety Members is equal to the greatest of:

- 1.8% of Final Compensation at disability multiplied by years of Credited Service at disability;
- 1.8% of Final Compensation at disability multiplied by years of Credited Service projected to age 55, but not to exceed one-third of Final Compensation; or
- If the Member is eligible at disability for a Service Retirement Benefit, the Service Retirement Benefit accrued on the date of disability.

## Form of Benefit

The Nonservice-Connected Disability Retirement Benefit will be paid monthly beginning at the effective date of disability retirement, and for the life of the Member; in the event of the Member's death, 60% of the benefit will continue for the life of the Member's spouse or to the age of majority of dependent minor children if there is no spouse. In the event there is no surviving spouse or



minor children, any unpaid remainder of the Member's accumulated contributions will be paid to the Member's designated beneficiary.

Actuarially equivalent optional benefit forms and COLA adjustments (as described for the Service Retirement benefit) are also available. A lump sum benefit of \$5,000 will be payable upon the death of the member.

#### **Death Benefit**

#### Eligibility

A Tier 3 Member's survivors are not eligible to receive death benefits. All other Members' survivors are eligible to receive different Death benefits dependent on the Member's cause of death and retirement eligibility.

#### Benefit Amount

In the event the Member's death resulted from injury or illness sustained in connection with the Member's duties, the Death Benefit payable to a surviving spouse, domestic partner or eligible dependent children will be the greater of 50% of the Member's Final Compensation at the time of death or the Service Retirement Benefit.

In the event the Member's death did not result from injury or illness sustained in connection with the Member's duties and at the time of death, the Member was eligible for Service Retirement or Non-Service Connected Disability (i.e. the employee was employed at least five years), the Death Benefit payable to the spouse, partner or children will be 60% of the survivor benefit based on benefit due on Member's date of death.

In all other cases, the designated beneficiary (not necessarily a spouse/partner/child) will receive a refund of the Member's contributions with interest plus one month of Final Compensation for each year of service to a maximum of six years.

## Form of Benefit

Annuity death benefits will be paid monthly beginning at the Member's death and for the life of the surviving spouse/partner or to the age of majority of dependent minor children if there is no spouse/partner. Lump sum benefits will be paid as described above.

COLA adjustments (as described for the annuity benefits) are also available.

## Withdrawal Benefit

## Eligibility

Tier 3 Members are not eligible to receive withdrawal benefits. All other Members are eligible for a Withdrawal Benefit upon termination of employment, if not eligible to receive or electing to waive a monthly benefit.



#### **Benefit Amount**

The Withdrawal Benefit is a refund of the Member's accumulated Contributions with interest. Upon receipt of the Withdrawal Benefit the Member forfeits all Credited Service.

#### Form of Benefit

The Withdrawal Benefit is paid in a lump sum upon election by the Member.

#### **Deferred Vested Benefit**

#### Eligibility

A Member is eligible for a Deferred Vested Benefit upon termination of employment after earning five years of Credited Service, including reciprocity service from another system. For Tier 3 Members, the vesting requirement is ten years of Credited Service.

The Member must leave his or her Member Contributions with interest on deposit with the Plan. This requirement does not apply to Tier 3 Members since they participate in a non-contributory Plan.

#### **Benefit Amount**

The Deferred Vested Benefit is computed in the same manner as the Service Retirement Benefit, but it is based on Credited Service and Final Compensation on the date of termination.

#### Form of Benefit

The Deferred Vested Benefit will be paid monthly beginning at retirement and for the life of the Member; in the event of the Member's death, 60% of the benefit will continue for the life of the Member's spouse or to the age of majority of dependent minor children if there is no spouse. For Tier 3 Members, the benefit payable to beneficiary is limited to 50%. In the event there is no surviving spouse or minor children, any unpaid remainder of the Member's accumulated contributions will be paid to the Member's designated beneficiary.

Actuarially equivalent optional benefit forms and COLA adjustments (as described for the Service Retirement benefit) are also available. A lump sum benefit of \$5,000 will be payable upon the death of the member. No death benefit is payable for Tier 3 retired members.

## **Reciprocal Benefit**

## Eligibility

A Member is eligible for a Reciprocal Benefit upon termination of employment after earning five years of Credited Service and entry, within a specified period of time, into another retirement system recognized as a reciprocal system by the Plan. For Tier 3 Members, the vesting requirement is ten years of Credited Service.



The Member must leave his or her Member Contributions with interest on deposit with the Plan. This requirement does not apply to Tier 3 Members since they participate in a non-contributory Plan.

#### **Benefit Amount**

The Reciprocal Benefit is computed in the same manner as the Service Retirement Benefit, but it is based on Credited Service on the date of termination and Final Compensation on the date of retirement; Final Compensation is based on the highest of the Compensation earned under this Plan or the reciprocal plan.

#### Form of Benefit

The Reciprocal Benefit will be paid monthly beginning at retirement and for the life of the Member; in the event of the Member's death, 60% of the benefit will continue for the life of the Member's spouse or to the age of majority of dependent minor children if there is no spouse. For Tier 3 Members, the benefit payable to beneficiary is limited to 50%. In the event there is no surviving spouse or minor children, any unpaid remainder of the Member's accumulated contributions will be paid to the Member's designated beneficiary.

Actuarially equivalent optional benefit forms and COLA adjustments (as described for the Service Retirement benefit) are also available.

A lump sum benefit of \$5,000 will be payable upon the death of the member. No death benefit is payable for Tier 3 retired members.

## **Optional Benefit Forms**

Prior to retirement, a member may elect to convert his retirement allowance into a benefit of equivalent actuarial value in accordance with one of the optional forms described below.

- 1. A reduced retirement allowance payable during his life with the provision that on his death the excess, if any, of his accumulated deductions at the time of retirement over the annuity payments made to him will be paid to his designated beneficiary or estate; or
- 2. A reduced retirement allowance payable during his life with the provision that after his death the reduced allowance will be continued for life to the beneficiary designated by him at the time of his retirement; or
- 3. A reduced retirement allowance payable during his life with the provision that after his death an allowance of one-half of his reduced allowance will be continued for life to the beneficiary designated by him at the time of his retirement.

In addition, a member participating in Social Security may elect to receive an increased monthly allowance before age 62 (earliest possible receipt of Social Security benefits) and then take a reduced monthly allowance at age 62 and after. This option will not affect any monthly payments payable to a beneficiary. This option is not available to those receiving a disability benefit.



#### **Member Contributions**

All non Tier 3 Members contribute a percentage of Compensation to the Plan through payroll deduction. The percentage contributed depends on the Member's nearest age upon joining the Plan. Members do not contribute after earning 30 years of Credited Service.

City of Ceres members in Tiers 1 and 4 pay the Tier 2 and 5 rates ("Full" rates), rather than the rates for their respective Tiers ("Half" rates).

Interest is credited semiannually to each Member's accumulated contributions. The crediting rate is set by the Board; the current annual rate is 0.00%.

The employee contribution rates are shown in the Appendix II.

#### **Changes in Plan Provisions**

There have been no changes in Plan provisions since the prior review.



# 1.2: Participant Data as of July 1, 2010

	Gen	eral	Sat	fety	То	tal
	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10
Active Participants						
Number	3,619	3,464	736	685	4,355	4,149
Average Age	45.37	46.10	37.35	38.59	44.02	44.86
Average Service	10.28	11.15	8.94	10.17	10.05	10.99
Average Pay (does not reflect	\$55,075	\$58,372	\$63,832	\$68,073	\$56,555	\$59,974
impact of furloughs)						
Service Retired						
Number	1,835	1,904	252	256	2,087	2,160
Average Age	69.06	69.19	63.61	64.22	68.40	68.60
Average Annual Total Benefit	\$23,089	\$24,197	\$48,098	\$50,039	\$26,109	\$27,260
Beneficiaries						
Number	282	288	77	79	359	367
Average Age	73.16	72.97	65.05	66.24	71.42	71.52
Average Annual Total Benefit	\$12,933	\$13,681	\$24,160	\$25,048	\$15,341	\$16,128
Duty Disabled						
Number	113	114	107	108	220	222
Average Age	62.67	63.46	54.23	55.02	58.57	59.36
Average Annual Total Benefit	\$20,358	\$20,824	\$30,937	\$31,811	\$25,503	\$26,169
Ordinary Disabled						
Number	78	74	7	7	85	81
Average Age	62.80	63.82	52.90	53.90	61.98	62.96
Average Annual Total Benefit	\$12,864	\$13,151	\$15,760	\$16,167	\$13,102	\$13,412
Total In Pay						
Number	2,308	2,380	443	450	2,751	2,830
Average Age	69.04	69.20	61.43	62.20	67.81	68.09
Average Annual Total Benefit	\$21,369	\$22,420	\$39,281	\$40,750	\$24,253	\$25,334
Terminated Vested						
Number	574	557	104	105	678	662
Average Age	49.34	49.77	42.17	43.12	48.24	48.71
Average Service	7.68	7.62	6.27	6.27	7.46	7.41
Transfers						
Number	144	146	43	64	187	210
Average Age	46.65	47.40	36.47	35.42	44.31	43.75
Average Service	6.06	5.74	5.67	4.52	5.97	5.37
Total Inactive						
Number	718	703	147	169	865	872
Average Age	48.80	49.28	40.50	40.21	47.39	47.52
Average Service	7.36	7.23	6.09	5.60	7.14	6.91



# County, Ceres and Other Districts Active and Vested Participant Data as of July 1, 2010

			Coι	unty			Ceres and Other Districts						Total Cou and Othe	inty, Ceres r Districts
	Ger	eral	Sat	fety	To	tal	<u>General</u> <u>Safety</u>			ety	<u>Total</u>		0	
	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10
Active														
Participants														
Number	3,494	3,338	656	605	4,150	3,943	125	126	80	80	205	206	4,355	4,149
Average Age	45.39	46.11	37.58	38.91	44.16	45.01	44.93	45.75	35.46	36.12	41.23	42.01	44.02	44.86
Average Service	10.29	11.16	8.98	10.34	10.08	11.03	9.99	10.83	8.62	8.92	9.46	10.09	10.05	10.99
Average Pay*	\$54,981	\$58,316	\$62,033	\$65,986	\$56,096	\$59,493	\$57,724	\$59,857	\$78,583	\$83,858	\$65,864	\$69,178	\$56,555	\$59,974
Terminated														
Vested														
Number	552	539	89	92	641	631	22	18	15	13	37	31	678	662
Average Age	49.31	49.75	42.35	43.36	48.34	48.82	49.96	50.15	41.09	41.44	46.36	46.50	48.24	48.71
Average Service	7.76	7.65	6.30	6.28	7.56	7.45	5.68	6.58	6.12	6.20	5.86	6.42	7.46	7.41
Transfers														
Number	134	137	37	58	171	195	10	9	6	6	16	15	187	210
Average Age	47.31	48.08	36.35	35.13	44.94	44.23	37.76	37.08	37.21	38.21	37.55	37.53	44.31	43.75
Average Service	6.19	5.84	5.60	4.35	6.06	5.40	4.38	4.12	6.15	6.15	5.04	4.94	5.97	5.37
Total Inactive														
Number	686	676	126	150	812	826	32	27	21	19	53	46	865	872
Average Age	48.92	49.41	40.59	40.18	47.62	47.74	46.15	45.79	39.98	40.42	43.70	43.57	47.39	47.52
Average Service	7.45	7.29	6.09	5.53	7.24	6.97	5.27	5.76	6.13	6.18	5.61	5.94	7.14	6.91

\*All payroll figures shown are annual



		General											Safety			
	Tie	r <b>1</b>	Tier 2		Tie	Tier 3		Tier 4		<sup>-</sup> 5	Tier 1/4		Tier 2/5			
	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10		
Active																
Participants																
Number	0	0	0	0	22	22	146	127	3,326	3,189	4	3	652	602		
Average Age	0.00	0	0	0	48.89	49.89	57.12	57.69	44.85	45.62	54.55	55.86	37.48	38.83		
Average Service	0.00	0.00	0.00	0.00	12.59	13.48	28.58	29.76	9.47	10.40	22.86	24.49	8.89	10.27		
Average Pay*	\$0	\$ O	\$0	\$ 0	\$48,257	\$50,234	\$67,894	\$72,549	\$54,458	\$57,805	\$81,525	\$75,709	\$61,913	\$65,938		
Terminated																
Vested																
Number	63	57	205	197	33	31	3	3	248	251	5	6	84	86		
Average Age	57.83	58.63	49.50	50.20	51.68	52.03	57.90	58.46	46.58	47.01	54.43	54.83	41.63	42.56		
Average Service	10.27	9.75	5.09	4.97	11.02	10.51	7.01	12.00	8.91	8.88	8.09	7.98	6.19	6.16		
Transfers																
Number	19	15	22	23	14	13	1	1	78	85	0	0	37	58		
Average Age	57.11	57.84	54.08	54.72	47.78	48.63	49.83	50.83	42.90	44.44	0.00	0	36.35	35.13		
Average Service	6.82	6.13	4.88	4.01	12.38	12.69	3.27	3.23	5.33	5.27	0.00	0.00	5.60	4.35		
Total Inactive																
Number	82	72	227	220	47	44	4	4	326	336	5	6	121	144		
Average Age	57.66	58.46	49.94	50.67	50.52	51.03	55.88	56.55	45.70	46.36	54.43	54.83	40.02	39.57		
Average Service	9.47	8.99	5.07	4.87	11.43	11.15	6.08	9.82	8.05	7.97	8.09	7.98	6.01	5.43		

County Active and Vested Participant Data as of July 1, 2010

\*All payroll figures shown are annual



<b>Ceres and Other Districts</b>	
Active and Vested Participant Data as of July 1, 2010	0

							Safety           Tier 1/4         Tier 2/5           Tier 1/4         Tier 2/5           10         7/1/09         7/1/10         7/1/10           7/1/10         7/1/10         7/1/10           7         7         7           53.66         53.59         34.99         35.90           9         53.66         53.59         34.99         35.90           4         30.39         30.17         8.06         8.65         97         \$134,810         \$130,861         \$77,141         \$83,26           1         0         14         13         2         50.83         0.00         40.33         40.33         41.44         43         7.42         0.00         6.03         6.20         41.44         41.44         41.44         41.44         41.44							
	Tie	1	Tier	2	Tie	r 3	Tie	r <b>4</b>	Tie	r 5	Tier	1/4	Tier	2/5
	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10	7/1/09	7/1/10
Active														
Participants														
Number	1	1	5	5	0	0	5	5	114	115	2	1	78	79
Average Age	71.28	72.28	42.12	43.12	0.00	0.00	57.40	58.40	44.27	45.09	53.66	53.59	34.99	35.90
Average Service	34.43	35.35	5.01	5.90	0.00	0.00	32.09	33.46	9.02	9.84	30.39	30.17	8.06	8.65
Average Pay*	\$51,948	\$51,948	\$40,307	\$40,044	\$0	\$0	\$60,850	\$61,920	\$58,402	\$60,697	\$134,810	\$130,861	\$77,141	\$83,263
Terminated														
Vested														
Number	2	2	11	10	0	0	0	0	9	6	1	0	14	13
Average Age	55.42	56.42	47.89	47.54	0.00	0.00	0.00	0.00	51.27	52.42	50.83	0.00	40.39	41.44
Average Service	7.20	7.20	5.27	5.29	0.00	0.00	0.00	0.00	5.84	8.53	7.42	0.00	6.03	6.20
Transfers														
Number	0	0	3	2	0	0	0	0	7	7	0	0	6	6
Average Age	0.00	0.00	48.49	47.30	0.00	0.00	0.00	0.00	33.16	34.16	0.00	0.00	37.21	38.21
Average Service	0.00	0.00	4.32	3.12	0.00	0.00	0.00	0.00	4.41	4.41	0.00	0.00	6.15	6.15
Total Inactive														
Number	2	2	14	12	0	0	0	0	16	13	1	0	20	19
Average Age	55.42	56.42	48.02	47.50	0.00	0.00	0.00	0.00	43.35	42.59	50.83	0.00	39.44	40.42
Average Service	7.20	7.20	5.07	4.93	0.00	0.00	0.00	0.00	5.21	6.31	7.42	0.00	6.07	6.18

\*All payroll figures shown are annual





Service / Age	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Total
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	5	2	14	10	2	2	0	0	0	0	0	0	35
25-29	8	19	63	52	33	43	0	0	0	0	0	0	218
30-34	3	14	63	63	34	160	42	0	0	0	0	0	379
35-39	0	9	35	47	38	153	98	19	1	0	0	0	400
40-44	1	15	33	45	23	112	141	65	19	1	0	0	455
45-49	2	10	22	25	25	122	135	90	67	11	2	0	511
50-54	2	6	20	34	17	117	124	78	84	40	18	1	541
55-59	5	4	16	17	14	108	100	87	66	25	41	16	499
60-64	0	1	7	5	6	47	68	36	33	22	14	5	244
65-69	0	0	1	1	1	15	14	6	5	3	2	2	50
70+	0	0	0	0	0	1	2	1	0	0	0	2	6
Total	26	80	274	299	193	880	724	382	275	102	77	26	3,338





Service	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Average
/ Age													
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	51,686	36,539	40,134	39,202	37,249	41,036	0	0	0	0	0	0	41,199
25-29	50,357	40,773	42,493	42,961	44,574	48,117	0	0	0	0	0	0	44,168
30-34	49,911	44,991	46,027	46,657	46,707	53,467	54,335	0	0	0	0	0	50,247
35-39	0	42,358	53,574	50,904	55,369	53,198	64,923	55,812	67,971	0	0	0	55,957
40-44	52,146	50,642	51,777	51,037	50,003	57,591	64,428	63,099	66,753	48,315	0	0	59,164
45-49	61,749	53,334	42,690	55,482	58,629	57,014	58,564	65,015	67,842	59,030	64,261	0	59,658
50-54	32,876	51,847	44,425	47,877	70,169	57,179	63,762	67,230	67,919	71,322	59,488	48,835	62,115
55-59	64,856	44,197	37,844	49,425	56,214	59,206	64,663	60,012	67,918	65,094	76,814	63,913	62,319
60-64	0	75,464	72,714	54,880	52,061	65,619	54,943	62,774	74,001	82,360	67,575	93,021	65,231
65-69	0	0	244,889	40,763	40,350	69,693	59,583	49,274	89,594	92,218	75,884	144,273	73,323
70+	0	0	0	0	0	226,108	42,796	40,659	0	0	0	59,925	78,702
Average	52,950	46,440	47,115	48,243	52,777	56,467	61,690	63,022	68,944	71,240	70,734	74,806	58,316





Service / Age	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Total
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	0	5	5	3	0	0	0	0	0	0	0	0	13
25-29	1	3	10	36	18	32	0	0	0	0	0	0	100
30-34	0	0	7	17	4	71	19	0	0	0	0	0	118
35-39	0	1	3	10	8	36	55	13	0	0	0	0	126
40-44	0	0	2	4	1	14	32	31	11	0	0	0	95
45-49	0	0	0	2	2	12	13	23	19	4	0	0	75
50-54	0	0	1	4	0	9	8	9	7	6	2	0	46
55-59	0	0	0	1	0	6	10	1	2	2	1	0	23
60-64	0	0	0	1	0	1	3	1	1	0	0	0	7
65-69	0	0	0	1	0	0	0	1	0	0	0	0	2
70+	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	1	9	28	79	33	181	140	79	40	12	3	0	605





Service	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Average
/ Age													
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	0	40,067	49,059	51,547	0	0	0	0	0	0	0	0	46,175
25-29	37,024	44,463	51,586	55,866	55,565	60,707	0	0	0	0	0	0	56,402
30-34	0	0	47,309	55,802	61,122	62,505	68,602	0	0	0	0	0	61,573
35-39	0	39,516	55,561	60,164	57,793	62,407	68,395	69,525	0	0	0	0	64,940
40-44	0	0	46,224	54,248	48,022	64,287	71,746	74,804	78,335	0	0	0	70,884
45-49	0	0	0	48,950	63,922	73,488	82,368	67,911	83,943	98,760	0	0	76,404
50-54	0	0	109,718	81,385	0	63,029	77,632	74,863	72,724	81,404	74,426	0	74,863
55-59	0	0	0	44,849	0	81,849	70,153	63,887	58,934	72,811	80,384	0	71,532
60-64	0	0	0	138,737	0	69,396	58,736	65,522	60,148	0	0	0	72,859
65-69	0	0	0	102,960	0	0	0	66,999	0	0	0	0	84,980
70+	0	0	0	0	0	0	0	0	0	0	0	0	0
Average	37,024	41,471	52,185	58,773	57,057	63,739	70,933	71,581	78,592	85,757	76,412	0	65,986





Service / Age	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Total
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	0	0	0	0	0	0	0	0	0	0	0	0	0
25-29	1	1	1	2	5	4	0	0	0	0	0	0	14
30-34	2	0	0	1	1	8	1	0	0	0	0	0	13
35-39	0	1	0	3	2	4	2	1	0	0	0	0	13
40-44	0	1	2	1	0	7	5	2	2	0	0	0	20
45-49	0	0	0	1	3	5	2	4	2	0	1	0	18
50-54	1	1	0	1	1	4	4	3	2	2	1	0	20
55-59	0	0	0	1	2	2	3	2	1	2	0	0	13
60-64	1	0	0	1	0	3	1	1	1	2	0	1	11
65-69	1	0	0	0	0	0	0	0	0	0	1	0	2
70+	0	0	0	0	0	0	1	0	0	0	0	1	2
Total	6	4	3	11	14	37	19	13	8	6	3	2	126





Service	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Average
/ Age													
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	0	0	0	0	0	0	0	0	0	0	0	0	0
25-29	34,951	55,461	80,583	45,587	47,865	53,716	0	0	0	0	0	0	51,168
30-34	52,072	0	0	42,121	58,086	59,408	46,022	0	0	0	0	0	55,818
35-39	0	46,403	0	43,348	46,709	62,663	47,960	58,313	0	0	0	0	51,904
40-44	0	70,304	52,568	43,680	0	61,183	59,271	83,076	68,527	0	0	0	62,348
45-49	0	0	0	42,422	45,947	71,818	48,649	55,953	58,110	0	66,783	0	57,970
50-54	58,505	121,237	0	50,208	51,360	56,136	68,483	69,685	54,810	65,819	66,239	0	64,817
55-59	0	0	0	52,195	103,448	56,863	46,296	74,161	70,849	54,180	0	0	64,557
60-64	86,137	0	0	44,827	0	56,763	43,103	62,402	59,327	100,018	0	56,828	65,723
65-69	109,053	0	0	0	0	0	0	0	0	0	62,273	0	85,663
70+	0	0	0	0	0	0	52,963	0	0	0	0	51,948	52,456
Average	65,465	73,351	61,906	45,152	56,209	60,452	54,973	66,774	61,634	73,339	65,098	54,388	59,857





Service / Age	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Total
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	0	1	1	1	1	0	0	0	0	0	0	0	4
25-29	1	0	2	7	3	5	0	0	0	0	0	0	18
30-34	0	0	0	3	2	3	5	0	0	0	0	0	13
35-39	1	0	0	2	2	11	5	2	0	0	0	0	23
40-44	0	0	1	0	0	3	4	2	1	0	0	0	11
45-49	0	0	0	0	0	0	1	3	0	1	0	0	5
50-54	0	0	1	0	0	0	0	0	2	1	1	0	5
55-59	0	0	0	0	0	0	1	0	0	0	0	0	1
60-64	0	0	0	0	0	0	0	0	0	0	0	0	0
65-69	0	0	0	0	0	0	0	0	0	0	0	0	0
70+	0	0	0	0	0	0	0	0	0	0	0	0	0
Total	2	1	5	13	8	22	16	7	3	2	1	0	80





Service / Age	0	1	2	3	4	5-9	10-14	15-19	20-24	25-29	30-34	35+	Average
0-19	0	0	0	0	0	0	0	0	0	0	0	0	0
20-24	0	69,817	71,009	69,967	68,993	0	0	0	0	0	0	0	69,947
25-29	47,373	0	69,340	73,696	71,833	75,447	0	0	0	0	0	0	71,926
30-34	0	0	0	69,914	77,031	82,962	88,478	0	0	0	0	0	81,160
35-39	71,180	0	0	84,050	73,562	82,472	94,819	97,354	0	0	0	0	85,322
40-44	0	0	60,475	0	0	83,989	89,122	101,472	90,761	0	0	0	87,512
45-49	0	0	0	0	0	0	81,599	104,178	0	84,207	0	0	95,668
50-54	0	0	91,690	0	0	0	0	0	102,757	101,143	130,861	0	105,842
55-59	0	0	0	0	0	0	146,543	0	0	0	0	0	146,543
60-64	0	0	0	0	0	0	0	0	0	0	0	0	0
65-69	0	0	0	0	0	0	0	0	0	0	0	0	0
70+	0	0	0	0	0	0	0	0	0	0	0	0	0
Average	59,277	69,817	72,371	74,129	73,210	81,149	93,820	101,455	98,758	92,675	130,861	0	83,858

![](_page_34_Picture_3.jpeg)

			Non Vested Terminations	Vested	Ordinary	Duty			
	Actives	Transfers	due Refunds	Terminations	Disabled	Disabled	Retired	Beneficiaries	Total
July 1, 2009	3,494	134	184	552	78	108	1,806	282	6,638
New Entrants	12	-	-	-	-	-	-	-	12
Rehires	-	-	-	-	-	-	-	-	0
Duty Disabilities	(1)	-	-	-	-	1	-	-	0
Ordinary Disabilities	(1)	-	-	-	1	-	-	-	0
Retirements	(71)	(5)	-	(31)	-	-	107	-	0
Retirements from									
Safety with General									
Service		-	-	-	-	-	2	-	2
Vested Terminations	(28)	(2)	-	30	-	-	-	-	0
Died, With									
Beneficiaries' Benefit									
Payable	(3)	-	-	-	(1)	-	(16)	20	0
Died, Without									
Beneficiary, and Other									
Terminations	(28)	-	25	-	(4)	-	(29)	-	(36)
Transfers	13	12	(6)	(2)					17
Beneficiary Deaths		-	-	-	-	-	-	(16)	(16)
Domestic Relations									
Orders		-	-	-	-	-	-	2	2
Withdrawals Paid	(48)	(2)	(28)	(11)	-	-	-		(89)
Member									
Reclassifications	(1)	-	(1)	1	-	-	2	-	1
July 1, 2010	3,338	137	174	539	74	109	1,872	288	6,531

# Changes in Plan Membership: County General

![](_page_35_Picture_3.jpeg)
	Actives	Transfers	Non Vested Terminations due Refunds	Vested Terminations	Ordinary Disabled	Duty Disabled	Retired	Beneficiaries	Total
July 1, 2009	656	37	29	89	7	101	249	77	1,245
New Entrants	-	-	-	-	-	-	-	-	0
Rehires	2	-	(1)	(1)	-	-	-	-	0
Duty Disabilities	(2)	-	-	-	-	2	-	-	0
Ordinary Disabilities	-	-	-	-	-	-	-	-	0
Retirements	(6)	-	-	(1)	-		7		0
Retirements from									
General with Safety									
Service		-	-	-	-	-	-	-	0
Vested Terminations	(5)	(1)	-	6	-	-	-	-	0
Died, With									
Beneficiaries' Benefit									
Payable	-	-	-	-	-	(1)	(3)	4	0
Died, Without									
Beneficiary, and Other									
Terminations	(12)	-	12	(1)	-	(1)	(1)	(1)	(4)
Transfers	(20)	23	(3)	-	-	-	-	-	0
Beneficiary Deaths		-	-	-	-	-	-	(2)	(2)
Domestic Relations									
Orders	-	-	-	-	-	-	-	1	1
Withdrawals Paid	(8)	(1)	(5)	(1)	-	-	-		(15)
Member									
Reclassifications	-	-	-	1	-	1	(1)	-	1
July 1, 2010	605	58	32	92	7	102	251	79	1,226

## Changes in Plan Membership: County Safety



	Actives	Transfers	Non Vested Terminations due Refunds	Vested Terminations	Ordinary Disabled	Duty Disabled	Retired	Beneficiaries	Total
July 1, 2009	125	10	7	22	0	5	29	0	198
New Entrants	6	-	-	-	-	-	-	-	6
Rehires	1	-	-	(1)	-	-	-	-	0
Duty Disabilities	-	-	-	-	-	-	-	-	0
Ordinary Disabilities	-	-	-	-	-	-	-	-	0
Retirements	(1)	-	-	(2)	-	-	3	-	0
Retirements from									
General with Safety									
Service	-	-	-	-	-	-	-	-	0
Vested Terminations	(1)	-	-	1	-	-	-	-	0
Died, With									
Beneficiaries' Benefit									
Payable	-	-	-	-	-	-	-	-	0
Died, Without									
Beneficiary, and Other									
Terminations	-	(1)	-	(1)	-	-	-	-	(2)
Transfers	-	-		-	-	-	-	-	0
Beneficiary Deaths	-	-	-	-	-	-	-	-	0
Domestic Relations									
Orders	-	-	-	-	-	-	-	-	0
Withdrawals Paid	(4)		(2)	(1)	-	-	-	-	(7)
Member									
Reclassifications	-	-	1	-	-	-	-	_	1
July 1, 2010	126	9	6	18	0	5	32	0	196

## **Changes in Plan Membership: Ceres and Other Districts General**



			Non Vested						
			Terminations	Vested	Ordinary	Duty			
	Actives	Transfers	due Refunds	Terminations	Disabled	Disabled	Retired	Beneficiaries	Total
July 1, 2009	80	6	2	15	0	6	3	0	112
New Entrants	1	-	-	-	-	-	-	-	1
Rehires	2	-	-	(1)	-	-	-	-	1
Duty Disabilities	-	-	-	-	-	-	-	-	0
Ordinary Disabilities	-	-	-	-	-	-	-	-	0
Retirements	(2)	-	-	-	-	-	2	-	0
Retirements from									
General with Safety									
Service	-	-	-	-	-	-	-	-	0
Vested Terminations	-	-	-	-	-	-	-	-	0
Died, With									
Beneficiaries' Benefit									
Payable	-	-	-	-	-	-	-	-	0
Died, Without									
Beneficiary, and Other									
Terminations	-	-	-	-	-	-	-	-	0
Transfers	-	-	-	-	-	-	-	-	0
Beneficiary Deaths	-	-	-	-	-	-	-	-	0
Domestic Relations									
Orders	-	-	-	-	-	-	-	-	0
Withdrawals Paid	(1)	_	-	-	_	-	-	-	(1)
Member									
Reclassifications	-	-	(1)	(1)	-	-	-	-	(2)
July 1, 2010	80	6	1	13	0	6	5	0	111

## Changes in Plan Membership: Ceres and Other Districts Safety



	Actives	Transfers	Non Vested Terminations due Refunds	Vested Terminations	Ordinary Disabled	Duty Disabled	Retired	Beneficiaries	Total
July 1, 2009	4,355	187	222	678	85	220	2,087	359	8,193
New Entrants	19	0	0	0	0	0	0	0	19
Rehires	5	0	(1)	(3)	0	0	0	0	1
Duty Disabilities	(3)	0	0	0	0	3	0	0	0
Ordinary Disabilities	(1)	0	0	0	1	0	0	0	0
Retirements	(80)	(5)	0	(34)	0	0	119	0	0
Retirements from	0	0	0	0	0	0	2	0	2
General with Safety									
Service									
Vested Terminations	(34)	(3)	0	37	0	0	0	0	0
Died, With	(3)	0	0	0	(1)	(1)	(19)	24	0
Beneficiaries' Benefit									
Payable									
Died, Without	(40)	(1)	37	(2)	(4)	(1)	(30)	(1)	(42)
Beneficiary, and Other									
Terminations									
Transfers	(7)	35	(9)	(2)	0	0	0	0	17
Beneficiary Deaths	0	0	0	0	0	0	0	(18)	(18)
Domestic Relations	0	0	0	0	0	0	0	3	3
Orders									
Withdrawals Paid	(61)	(3)	(35)	(13)	0	0	0	0	(112)
Member	(1)	0	(1)	1	0	1	1	0	1
Reclassifications									
July 1, 2010	4,149	210	213	662	81	222	2,160	367	8,064

## Changes in Plan Membership: All Groups



	County					Ceres and Other Districts				Total	
	Gen	eral	<u>Saf</u>	ety	Gen	eral	<u>Sa</u>	fety			
		Annual		Annual		Annual		Annual		Annual	
		Average		Average		Average		Average		Average	
Age	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit	
35-39	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0	
40-44	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0	
45-49	0	\$0	3	\$36,193	0	\$0	0	\$0	3	\$36,193	
50-54	66	\$16,064	27	\$49,096	1	\$4,493	1	\$105,691	95	\$26,274	
55-59	232	\$30,006	54	\$54,474	5	\$20,153	3	\$142,229	294	\$35 <i>,</i> 478	
60-64	437	\$30,356	64	\$56,199	12	\$38,155	1	\$63,164	514	\$33,819	
65-69	384	\$24,917	45	\$45,446	8	\$21,809	0	\$0	437	\$26,974	
70-74	262	\$19,717	29	\$45,549	5	\$38,225	0	\$0	296	\$22 <i>,</i> 560	
75-79	199	\$20,413	11	\$38,703	1	\$7,200	0	\$0	211	\$21,304	
80-84	144	\$18,010	12	\$27,360	0	\$0	0	\$0	156	\$18,729	
85-89	88	\$19,015	6	\$20,306	0	\$0	0	\$0	94	\$19 <i>,</i> 098	
90-94	48	\$13,120	0	\$0	0	\$0	0	\$0	48	\$13,120	
95+	12	\$12,961	0	\$0	0	\$0	0	\$0	12	\$12,961	
All Ages	1,872	\$24,111	251	\$48,663	32	\$29,247	5	\$119,108	2,160	\$27,260	

#### **Service Retired**

#### **Duty Disabled**

	County				Ceres and Other Districts				Total	
	<u>General</u> <u>Safety</u>		ety	Gen	<u>General</u> <u>Safety</u>					
		Annual		Annual		Annual		Annual		Annual
		Average		Average		Average		Average		Average
Age	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit
25-29	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0
30-34	0	\$0	1	\$32,743	0	\$0	0	\$0	1	\$32,743
35-39	1	\$13,005	8	\$28,130	0	\$0	0	\$0	9	\$26,449
40-44	3	\$17,816	7	\$30,360	0	\$0	1	\$25,752	11	\$26,520
45-49	3	\$26,542	16	\$27,293	1	\$25,467	0	\$0	20	\$27,089
50-54	10	\$19,378	18	\$31,425	0	\$0	1	\$30,367	29	\$27,235
55-59	22	\$19,402	22	\$32,818	1	\$19,950	3	\$34,151	48	\$26,484
60-64	28	\$21,145	15	\$36,233	2	\$17,925	1	\$68,958	46	\$26,964
65-69	11	\$20,806	8	\$29,337	1	\$18,844	0	\$0	20	\$24,120
70-74	17	\$23 <i>,</i> 859	3	\$30,837	0	\$0	0	\$0	20	\$24,905
75-79	7	\$18,052	4	\$35,682	0	\$0	0	\$0	11	\$24,463
80-84	6	\$22,935	0	\$0	0	\$0	0	\$0	6	\$22,935
85-89	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0
90-94	1	\$16,681	0	\$0	0	\$0	0	\$0	1	\$16,681
95+	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0
All Ages	109	\$20,861	102	\$31,452	5	\$20,022	6	\$37,922	222	\$ 26,169



	County					Ceres and C	ther Distric	ts	То	tal
	Gen	eral	<u>Saf</u>	ety	Gen	eral	Sa	fety		
		Annual		Annual		Annual		Annual		Annual
		Average		Average		Average		Average		Average
Age	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit
35-39	0	\$0	1	\$19,287	0	\$0	0	\$0	1	\$19,287
40-44	2	\$15,074	0	\$0	0	\$0	0	\$0	2	\$15,074
45-49	3	\$13,737	0	\$0	0	\$0	0	\$0	3	\$13,737
50-54	8	\$13,523	3	\$14,600	0	\$0	0	\$0	11	\$13,817
55-59	9	\$15,143	2	\$16,331	0	\$O	0	\$0	11	\$15,359
60-64	21	\$14,152	0	\$0	0	\$0	0	\$0	21	\$14,152
65-69	12	\$14,728	1	\$17,418	0	\$O	0	\$0	13	\$14,935
70-74	9	\$10,011	0	\$0	0	\$0	0	\$0	9	\$10,011
75-79	4	\$11,108	0	\$0	0	\$0	0	\$0	4	\$11,108
80-84	4	\$9 <i>,</i> 495	0	\$0	0	\$O	0	\$0	4	\$9 <i>,</i> 495
85-89	2	\$5,442	0	\$0	0	\$0	0	\$0	2	\$5,442
90-94	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0
95+	0	\$0	0	\$0	0	\$0	0	\$0	0	\$0
All Ages	74	\$13,151	7	\$16,167	0	\$0	0	\$0	81	\$13,412

#### **Ordinary Disabled**

#### Surviving Beneficiaries (all benefit types)

	County				Ceres and Other Districts				Total	
	Gen	eral	<u>Saf</u>	ety	Gen	eral	<u>Sa</u>	fety		
		Annual		Annual		Annual		Annual		Annual
		Average		Average		Average		Average		Average
Age	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit	Number	Benefit
0-24	1	\$8,166	1	\$9,886	0	\$0	0	1	2	\$9 <i>,</i> 026
25-29	3	\$16,559	0	\$0	0	\$0	0	3	3	\$16,559
30-34	2	\$7,322	0	\$0	0	\$0	0	2	2	\$7,322
35-39	1	\$5,066	1	\$33,575	0	\$0	0	1	2	\$19,321
40-44	5	\$10,264	2	\$18,763	0	\$0	0	5	7	\$12,692
45-49	6	\$10,062	3	\$32,215	0	\$0	0	6	9	\$17,446
50-54	11	\$9,069	10	\$18,909	0	\$0	0	11	21	\$13,755
55-59	18	\$12 <i>,</i> 850	9	\$23,750	0	\$0	0	18	27	\$16,484
60-64	37	\$12,394	11	\$31,246	0	\$0	0	37	48	\$16,714
65-69	28	\$14,645	8	\$23,135	0	\$0	0	28	36	\$16,532
70-74	32	\$21,739	14	\$28,397	0	\$0	0	32	46	\$23,765
75-79	37	\$15,741	8	\$30,342	0	\$0	0	37	45	\$18,337
80-84	40	\$14,835	5	\$21,954	0	\$0	0	40	45	\$15,626
85-89	41	\$10,829	4	\$14,595	0	\$0	0	41	45	\$11,163
90-94	21	\$8,911	3	\$20,357	0	\$0	0	21	24	\$10,341
95+	5	\$9,715	0	\$0	0	\$0	0	5	5	\$9,715
All Ages	288	\$13,681	79	\$25,048	0	\$0	0	\$0	367	\$16,128



### **Benefit Form Elections**

	Cou	inty	Ceres and O	ther Districts	Total
	<u>General</u>	<u>Safety</u>	<u>General</u>	<u>Safety</u>	
Service Retired					
Option #0 (Unmodified 60% to Spouse)	1,595	229	26	5	1,855
Option #1 (Cash Refund)	117	2	1	0	120
Option #2 (100% Continuance)	140	20	5	0	165
Option #3 (50% Continuance)	20	0	0	0	20
Total Service Retired	1,872	251	32	5	2,160
Ordinary Disability					
Option #0 (Unmodified 60% to Spouse)	70	5	0	0	75
Option #1 (Cash Refund)	2	2	0	0	4
Option #2 (100% Continuance)	2	0	0	0	2
Option #3 (50% Continuance)	0	0	0	0	0
Total Ordinary Disability	74	7	0	0	81
Duty Disability					
Option #0 (Unmodified 60% to Spouse)	98	92	5	5	200
Option #1 (Cash Refund)	1	0	0	0	1
Option #2 (100% Continuance)	7	9	0	1	17
Option #3 (50% Continuance)	3	1	0	0	4
Total Duty Disability	109	102	5	6	222
Total	2,055	360	37	11	2,463



### **1.3: Actuarial Methods and Assumptions**

#### **Actuarial Method**

Annual contributions to the Stanislaus County Employees' Retirement Association (the Plan) are computed under the Entry Age Normal Actuarial Cost Method.

Under this Cost Method, the Normal Cost is calculated as the amount necessary to fund Members' benefits as a level percentage of total payroll over their projected working lives. At each valuation date, the Actuarial Accrued Liability is equal to the difference between the liability for the Members' total projected benefit and the present value of future Normal Cost contributions.

The excess of the Actuarial Accrued Liability over Plan assets is the Unfunded Actuarial Accrued Liability, and the liability for each valuation group is amortized as a level percentage of payroll over an open period (25 years).

Amounts may be added to or subtracted from the Unfunded Actuarial Accrued Liability due to Plan amendments or changes in actuarial assumptions.

The total Plan cost is the sum of the Normal Cost and the amortization of the Unfunded Actuarial Accrued Liability.

#### **Actuarial Value of Plan Assets**

The actuarial value of Plan assets is modified market-related value. The market value of assets is adjusted to recognize, over a five-year period, differences between actual investment earnings and the assumed investment return. The actuarial value of assets is limited to no less than 80% and no more than 120% of the market value.

The detailed calculations of the actuarial value of Plan assets are shown in Section 2.

#### **Actuarial Assumptions**

The assumptions shown below are based on an experience studies conducted as of June 30, 2009 for the period covering July 1, 2006 till June 30, 2009, performed by EFI.



#### **Summary of Actuarial Assumptions**

Many assumptions were changed since the prior study, based on an experience study completed in 2010.

Valuation Date	All assets and liabilities are computed as of June 30, 2010.
Rate of Return	The annual rate of return on all Plan assets is assumed to be 8.00%, net of investment and administrative expenses. For the prior valuation, this assumption was 8.16%.
Interest Credited to Employee Accounts	The employee accounts are credited with 0.25% interest annually.
Cost of Living	The cost of living as measured by the Consumer Price Index (CPI) will increase at the rate of 3.50% per year. For the prior valuation, this assumption was 4.00%.



Increases in Pay Current Rate: 3.75% Base salary increases. For the prior valuation, this assumption was 4.00%.

Assumed pay increases for active Members consist of increases due to base salary adjustments (as noted above), plus service-based (prior assumptions were age-based) increases due to longevity and promotion, as shown below.

Service	General	Safety
0	4.00%	8.00%
1	4.00%	7.00%
2	4.00%	6.00%
3	4.00%	5.00%
4	4.00%	4.00%
5-9	2.00%	2.00%
10-19	1.00%	1.00%
20-29	0.50%	1.00%
30+	0.50%	0.50%

#### **Current Assumptions**

#### **Prior Assumptions**

Age	General	Safety
20	4.66%	2.89%
25	3.51%	2.14%
30	2.23%	1.59%
35	0.48%	0.45%
40	0.47%	0.56%
45	0.45%	0.54%
50	0.56%	0.53%
55	0.54%	0.52%
60	0.53%	0.51%
65	0.52%	0.51%
70	0.51%	0.51%



# Active MemberRates of mortality for active Members are specified by the Retired PensionersMortality(RP) 2000 tables published by the Society of Actuaries (projected from 2000 to<br/>2020 using Scale AA). Duty related mortality rates are only applicable for Safety<br/>Active Members.

For the prior valuation rates of mortality among Safety active Members were specified for male and female members combined; separate tables were used for General male and female active Members. Sample rates are as follows:

	Duty Death	Ordinary Death – General and Safety	
Age	Safety All	Female	Male
20	0.0150%	0.0138%	0.0235%
25	0.0189%	0.0156%	0.0308%
30	0.0254%	0.0216%	0.0402%
35	0.0357%	0.0381%	0.0699%
40	0.0564%	0.0522%	0.0919%
45	0.0885%	0.0814%	0.1161%
50	0.0703%	0.1189%	0.1487%
55	0.1055%	0.2314%	0.2469%
60	0.0000%	0.4573%	0.4887%
65	0.0000%	0.8780%	0.9607%
70	0.0000%	1.5145%	1.6413%

#### **Current Representative Rates**

#### **Prior Representative Rates**

	Duty						
	<u>Death</u>	<u> </u>	dinary Dea	<u>th h</u>	Deat	Death While Eligible h	
	<u>Safety</u>	<u>Safety</u>	<u>Gen</u>	<u>eral</u>	<u>Safety</u>	<u>Gen</u>	<u>eral</u>
Age	All	All	Female	Male	All	Female	Male
20	0.0150%	0.0151%	0.0200%	0.0300%	0.0000%	0.0000%	0.0000%
25	0.0189%	0.0190%	0.0300%	0.0300%	0.0130%	0.0075%	0.0100%
30	0.0254%	0.0254%	0.0300%	0.0400%	0.0130%	0.0075%	0.0100%
35	0.0357%	0.0357%	0.0500%	0.0500%	0.0130%	0.0075%	0.0200%
40	0.0564%	0.0564%	0.0600%	0.0600%	0.0260%	0.0150%	0.0300%
45	0.0885%	0.1178%	0.0700%	0.0900%	0.0520%	0.0225%	0.0500%
50	0.0703%	0.0937%	0.0800%	0.1000%	0.1300%	0.0600%	0.1100%
55	0.1055%	0.1406%	0.0900%	0.1200%	0.2990%	0.1275%	0.2000%
60	0.0000%	0.0000%	0.1100%	0.1700%	0.0000%	0.2100%	0.3100%
65	0.0000%	0.0000%	0.1700%	0.2200%	0.0000%	0.3225%	0.4500%
70	0.0000%	0.0000%	0.0000%	0.0000%	0.0000%	0.0000%	0.0000%



## Retired MemberRates of mortality for retired Members and their beneficiaries are specified byMortalitythe Retired Pensioners (RP) 2000 tables published by the Society of Actuaries<br/>(projected from 2000 to 2020 using Scale AA).

In the prior valuation rates of mortality for retired Members and their beneficiaries were given by the 1994 GAM tables with no age adjustment. All Safety members used the Male table, and their beneficiaries were assumed to be Female. Sample rates are shown below.

Age	Female	Male
45	0.081%	0.116%
50	0.119%	0.149%
55	0.231%	0.247%
60	0.457%	0.489%
65	0.868%	0.961%
70	1.514%	1.641%
75	2.393%	2.854%
80	3.987%	5.265%
85	6.866%	9.624%
90	12.400%	16.928%

#### **Current Assumptions**

#### **Prior Assumptions**

Age	Female	Male
45	0.097%	0.158%
50	0.143%	0.258%
55	0.229%	0.443%
60	0.444%	0.798%
65	0.864%	1.454%
70	1.373%	2.373%
75	2.269%	3.721%
80	3.940%	6.203%
85	6.774%	9.724%
90	11.627%	15.293%



## Disabled MemberRates of mortality for disabled Members are specified by the Retired PensionersMortality(RP) 2000 tables published by the Society of Actuaries (projected from 2000 to<br/>2020 using Scale AA) set forward 7 years.

In the prior valuation, rates of mortality among disabled Members were given by the 1981 Disability Mortality Tables for General and Safety Members published by the Society of Actuaries. Sample rates are as follows:

Age	Female	Male
45	0.152%	0.178%
50	0.315%	0.333%
55	0.602%	0.647%
60	1.100%	1.237%
65	1.832%	2.016%
70	2.963%	3.611%
75	4.892%	6.854%
80	8.892%	12.062%
85	14.843%	20.397%
90	21.098%	28.808%

#### **Current Representative Rates**

#### **Prior Representative Rates**

Age	General	Safety
45	2.080%	0.696%
50	2.418%	0.901%
55	2.885%	1.483%
60	3.291%	2.830%
65	3.759%	3.685%
70	4.355%	4.355%
75	5.616%	5.514%
80	8.836%	8.836%



#### Service Retirement

Retirement is assumed to occur among eligible members in accordance with the table below.

	Current Rates			Prior Rates	
				General	General
Age	Safety	General	Safety	Female	Male
40-44	5.00%	0.00%	25.00%	0.00%	0.00%
45-49	5.00%	0.00%	25.00%	0.00%	5.00%
50	5.00%	5.00%	25.00%	5.00%	5.00%
51	5.00%	4.00%	20.00%	4.00%	4.00%
52	5.00%	4.00%	20.00%	4.00%	4.00%
53	5.00%	5.00%	20.00%	5.00%	5.00%
54	5.00%	6.00%	20.00%	6.00%	6.00%
55	15.00%	10.00%	30.00%	10.00%	10.00%
56	15.00%	10.00%	25.00%	10.00%	10.00%
57	15.00%	10.00%	25.00%	10.00%	10.00%
58	15.00%	12.00%	30.00%	12.00%	12.00%
59	15.00%	15.00%	35.00%	15.00%	15.00%
60	100.00%	18.00%	100.00%	18.00%	18.00%
61	100.00%	18.00%	100.00%	18.00%	18.00%
62	100.00%	30.00%	100.00%	30.00%	30.00%
63	100.00%	25.00%	100.00%	25.00%	25.00%
64	100.00%	25.00%	100.00%	25.00%	25.00%
65	100.00%	40.00%	100.00%	40.00%	40.00%
66	100.00%	30.00%	100.00%	30.00%	30.00%
67	100.00%	30.00%	100.00%	30.00%	30.00%
68	100.00%	30.00%	100.00%	30.00%	30.00%
69	100.00%	30.00%	100.00%	30.00%	30.00%
70	100.00%	100.00%	100.00%	100.00%	100.00%



## Service-ConnectedSeparate rates of duty disability are assumed among Safety and GeneralDisabilityMembers; rates for both sexes for Safety Members are combined. Below are<br/>sample rates:

#### **Current Representative Rates**

	<u>Safety</u>	General	
Age	All	Female	Male
20	0.0759%	0.0007%	0.0065%
25	0.1932%	0.0013%	0.0153%
30	0.3457%	0.0025%	0.0316%
35	0.5309%	0.0071%	0.0426%
40	0.7426%	0.0168%	0.0602%
45	1.1297%	0.0303%	0.0920%
50	1.5092%	0.0486%	0.1345%
55	1.7230%	0.0746%	0.1840%
60	0.0000%	0.1048%	0.2456%
65	0.0000%	0.0000%	0.0000%

#### **Prior Representative Rates**

	<u>Safety</u> <u>General</u>		eral
Age	All	Female	Male
20	0.1012%	0.0013%	0.0065%
25	0.2576%	0.0025%	0.0153%
30	0.4609%	0.0050%	0.0316%
35	0.7079%	0.0141%	0.0426%
40	0.9283%	0.0335%	0.0602%
45	1.1297%	0.0606%	0.0920%
50	1.5092%	0.0971%	0.1345%
55	1.7230%	0.1492%	0.1840%
60	0.0000%	0.2096%	0.2456%
65	0.0000%	0.0000%	0.0000%



#### Non Service-Connected Disability

Separate rates of ordinary disability are assumed among Safety and General Members; rates for both sexes for Safety Members are combined. Below are sample rates:

	<u>Safety</u>	General	
Age	All	Female	Male
20	0.0173%	0.0025%	0.0130%
25	0.0409%	0.0050%	0.0307%
30	0.0421%	0.0100%	0.0316%
35	0.0568%	0.0281%	0.0426%
40	0.0802%	0.0446%	0.0602%
45	0.1227%	0.0808%	0.0920%
50	0.1793%	0.1295%	0.1345%
55	0.2453%	0.1990%	0.1840%
60	0.0000%	0.2794%	0.2456%
65	0.0000%	0.0000%	0.0000%

#### Withdrawal

Rates of withdrawal apply to active Members who terminate their employment and withdraw their member contributions, forfeiting entitlement to future Plan benefits. Separate rates of withdrawal are assumed among Safety and General Members. Current Rates are based on age while the proposed rates are based on service. The proposed rates do not overlap with the service retirement rates.

	Current		Pr	ior
Service	Safety	General	Safety	General
0	8.000%	13.500%	12.000%	18.000%
1	6.000%	9.000%	8.000%	12.000%
2	5.000%	6.375%	6.000%	8.500%
3	4.000%	4.875%	4.500%	6.500%
4	3.000%	4.125%	3.500%	5.500%
5	1.238%	2.025%	1.238%	2.025%
10	0.945%	1.470%	0.945%	1.470%
15	0.680%	0.850%	0.680%	0.850%
20	0.000%	0.336%	0.000%	0.336%
25	0.000%	0.072%	0.000%	0.072%
30	0.000%	0.000%	0.000%	0.000%



Vested Termination Rates of vested termination apply to active Members who terminate their employment after five years of service and leave their member contributions on deposit with the Plan. Alternatively, those who terminate their employment with less than five years of service can leave their member contributions with the Plan and transfer to a reciprocal employer, therefore retaining entitlement to future Plan benefits.

Vested terminated Tier 3 General Members are assumed to begin receiving benefits at age 65 while all other General Members are assumed to begin at age 62; terminated Safety Members are assumed to begin receiving benefits at age 55. 50% of vested terminated members are assumed to be reciprocal.

Separate rates of termination are assumed among Safety and General Members. The rates shown are applied after five Years of Service, and do not overlap with the service retirement rates.

	Current		Pi	ior
Service	Safety	General	Safety	General
0	5.000%	5.000%	0.000%	0.000%
1	4.500%	5.000%	0.000%	0.000%
2	4.000%	3.000%	0.000%	0.000%
3	3.500%	3.000%	0.000%	0.000%
4	3.000%	3.000%	0.000%	0.000%
5	2.500%	3.000%	1.513%	2.475%
10	2.500%	2.000%	1.305%	2.030%
15	1.250%	2.000%	1.320%	1.650%
20	0.000%	1.200%	0.000%	1.264%
25	0.000%	1.200%	0.000%	1.128%
30+	0.000%	0.000%	0.000%	1.200%

Family Composition 50% of female members and 90% of male members are assumed to be married at retirement. Male spouses are assumed to be three years older than their wives.

#### **Participant Data**

Data on active and inactive Members and their beneficiaries as of the valuation date was supplied by the Plan Administrator on electronic media. As is usual in studies of this type, Member data was neither verified nor audited.



## 1.4: Glossary of Actuarial Terms

#### Actuarial Accrued Liability

A plan's actuarial accrued liability is the level of assets estimated by the system actuary to be needed as of the valuation date to

- Finance all previously earned benefits for actively employed members of the plan (and their beneficiaries, if applicable) for when they eventually retire, die or terminate with deferred vested benefits, and
- Finance all currently payable benefits of current pensioners and their beneficiaries (if applicable).

It is important to note that the Actuarial Accrued Liability is not a debt; instead, it is an asset target set by the actuarial cost method to produce an orderly accumulation of assets to pay for the plan's obligations.

#### Actuarial Assumptions

The actuarial assumptions are the actuary's anticipated rates of future termination, death, disability and retirement for each member of the plan as well as the actuary's anticipated rate of investment return on underlying assets. To the extent that these assumptions are not in exact accord with actual events (which they never are), actuarial gains and losses will materialize.

#### Actuarial Funding Policy

The plan's actuarial funding policy is the scheduled program of accumulating assets to fund the plan's obligations, typically, but not necessarily, as a level percentage of payroll. The funding policy includes:

- The Normal Cost, and
- Amortization of the Unfunded or Overfunded Actuarial Accrued Liability (whichever is applicable).

#### Actuarial Value of Assets

The actuarial value of assets, used for funding purposes, is computed using an asset smoothing technique in which investment gains and losses are not fully recognized in the year they occur, but are spread out. Use of an actuarial value of assets (rather than market value) helps avoid large fluctuations in recognized value of the underlying assets and, in turn, avoids large fluctuations in required contribution rates.

#### Actuarial Present Value of Benefits

The actuarial present value of benefits is the Actuarial Accrued Liability plus actuarial present value of future Normal Costs. The actuarial present value of benefits is also the actuarial present value of all future benefits expected to be paid to the Plan's current members, whether accrued on the valuation data or after.



#### **Investment Gains and Losses**

When the investment return on assets exceeds the assumed rate of return (the actuarial assumption as to investment return), this difference is identified as an investment gain. Correspondingly, when the returns are less than expected, this difference is identified as an investment loss. These investment gains and losses are either recognized immediately to produce the market value of assets or are spread out to produce the Actuarial Value of Assets.

#### Normal Cost

The Normal Cost is calculated as the amount necessary to fund each Member's benefits from that Member's Plan entry date to the end of his or her projected working life.

#### Unfunded Actuarial Accrued Liabilities

When the actuarial value of assets is below the Actuarial Accrued Liability, there is an Unfunded Actuarial Accrued Liability which must be paid off or amortized on a schedule. When the actuarial value of assets is in excess of the Actuarial Accrued Liability, this can lead to a reduction in future contributions on an amortization schedule.



Stanislaus County Employees' Retirement Association Actuarial Review and Analysis as of June 30, 2010

Section 2:

## **Asset Information**



## 2.1: Balance Sheet as of June 30, 2009 and June 30, 2010

	June 30, 2009	June 30, 2010
Cash and Equivalents	67,167,274	47,033,733
Receivables		
Interest and Dividends	4.847.110	6.632.608
Contributions	2,865,698	1,346,604
Income and Miscellaneous	16,153,885	35,103,659
Total Receivables	23,866,693	43,082,871
Fixed Assets		
Capitalized Software	740,414	850,778
Real Estate Occupied	1,821,759	1,802,782
Real Estate Leased	1,214,747	1,202,093
Other	81,038	68,692
Total Receivables	3,857,958	3,924,345
Investments		
Fixed Income	335,970,593	430,777,936
Equities	659,559,976	725,757,057
Collateral on Loaned Securities	190,693,978	72,148,237
Other	0	0
Total Investments	1,186,224,547	1,228,683,230
Liabilities		
Accounts Payable	(2,558,547)	(2,942,686)
Security Transactions Payable	(20,639,732)	(50,999,227)
Collateral Held for Loaned Securities	(199,389,103)	(78,152,869)
Other	(420,000)	(410,000)
Total Liabilities	(211,067,651)	(132,504,782)
Market Value	\$1,261,244,629	\$1,190,219,397



## 2.2: Computation of Actuarial Value of Assets as of June 30, 2010

		(a)	(b)	(c)	(d)	(e) = (d) – (c)	(f)	(g) = (e) x (f)	
							Percentage		
				Expected	Actual	Additional	Not	Unrecognized	
	-	Contributions	Benefits	Return	Return	Earnings	Recognized	Dollars	
	2007	53,105,351	70,329,625	103,400,687	203,337,761	99,937,074	20%	19,987,415	
	2008	43,244,855	70,227,537	118,197,211	(123,453,409)	(241,650,619)	40%	(96,660,248)	
	2009	44,333,858	74,399,189	105,798,320	(223,111,526)	(328,909,847)	60%	(197,345,908)	
	2010	42,506,605	73,196,706	85,116,258	162,746,408	77,630,150	80%	62,104,120	
(1)	Total I	Unrecognized Do	ollars						(211,914,621)
(2)	Marke	et Value of Asset	s as of June 30	, 2010					1,190,219,397
(3)	Actua	rial Value of Asse	ets as of June 3	0, 2010					1,402,134,018
	[(2) - (	1)]							
(4)	Corrid	or Limits							
	a. 80%	ہ of Net Market	Value						952,175,518
	b. 120	% of Net Market	t Value						1,428,263,276
(5)	Actua	rial Value of Asse	ets after Corrid	or					1,402,134,018
(6)	Ratio	of Actuarial Valu	e to Market Va	alue					117.8%
	[(5)÷	(2)]							
(7)	Specia	al (Non Valuation	) Reserves:						
	\$5 <i>,</i> (	000 Death Benef	its					6,100,000	
	Hea	alth Insurance Re	eserve					33,366,572	
	Spe	cial COL Reserve	2					1,831,267	
	Leg	al Contingency R	Reserve					3,279,934	
	Tier 3 Disability Reserve 11,616								
	Contingency Reserve 23,804,388								
	Total S	Special Reserves	(Market Value	)					68,393,777
(8)	Adju	usted Total Speci	ial Reserves (11	L7.8% of Market	t, Except Continge	ency)			76,332,770
(9)	Pensic	on Reserves at A	ctuarial Value (	Valuation Asset	:s) [(5) - (8)]				1,325,801,248



	June 30, 2009	June 30, 2010
Additions Contributions Employer's Contribution	\$23,410,965	\$21,814,194
Members Contributions	20,922,893	20,746,411
Total Contributions	<u>\$44,333,858</u>	\$42,560,605
Investment Income Net Appreciation/(Depreciation) in Fair Value of Investments Interest and Dividends Commission Recapture Other Investment Income	(250,580,289) 39,095,062 93,523 57 010	132,734,348 33,239,016 10,926 680 579
Total Investment Income Investment Expenses	<u>(\$211,334,694)</u> (3,910,325)	<b>\$166,664,869</b> (4,750,133)
Net Investment Income	<u>(\$215,245,019)</u>	<u>\$161,914,736</u>
Securities Lending Activities Securities Lending Income Depreciation in Securities Lending Collateral Expenses from Securities Lending Activities	2,931,390 (6,678,766) <u>(2,039,002)</u>	368,167 2,856,751 <u>(85,810)</u>
Net Securities Lending Income	<u>(\$5,786,378)</u>	<u>\$3,139,108</u>
Total Net Investment Income	<u>(\$221,031,397)</u>	<u>\$165,053,844</u>
Total Additions	<u>(\$176,697,539)</u>	<u>\$207,614,449</u>
Deductions Repetits	71 861 210	71 464 735
Other Benefits (Ventura)	0	/1,404,/33
Refunds Administrative Costs Other Admin Costs (Ventura)	2,537,978 2,080,130 <u>0</u>	1,731,971 2,307,436 <u>0</u>
Total Deductions	<u>\$76,479,318</u>	<u>\$75,504,142</u>
Net increase (Decrease)	<u>(\$253,176,857)</u>	<u>\$132,110,307</u>
Net Assets Beginning of Year Net Assets End of Year	\$1,311,285,947 \$1,058,109,090	\$1,058,109,090 \$1,190,219,397

## 2.3: Income Statement

## For the Years Ending June 30, 2009 and June 30, 2010



Year Ended June 30	Annualized Rate of Return (Market Value)	Annualized Rate of Return (Actuarial Value)	Annualized Rate of Return (Valuation Assets)	Increase in CPI*
1996				2.8%
1997	20.4%			2.3%
1998	13.4%			1.7%
1999	10.6%			2.0%
2000	6.3%			3.7%
2001	7.0%			3.2%
2002	-4.5%			1.1%
2003	5.2%		4.9%	2.1%
2004	6.1%		6.3%	3.3%
2005	8.2%		5.5%	2.5%
2006	9.9%		10.8%	4.3%
2007	16.0%	10.8%	0.6%	2.7%
2008	-8.5%	8.0%	16.7%	5.0%
2009	-17.2%	-9.6%	-9.4%	-1.4%
2010	15.6%	13.0%	14.7%	1.1%
Compounded 14 Year	5.8%	N / A	N / A	2.4%
Average				
Compounded	2 20/	NI / A	NI / A	2 40/
10 Year	3.3%	N/A	N/A	2.4%
Compounded				
5 Year	2.2%	N / A	6.2%	2.3%

\* Based on All Urban Consumers - U.S. City Average, June indices.



Section 3:

**Actuarial Computations** 



## 3.1: Computation of Annual Contribution Rate as of June 30, 2009

	<b>Final Valuation</b>
Active Fully Projected Liability	1,134,790,195
Active Entry Age Normal Accrued Liability	835,136,149
Inactive Fully Projected Liability	818,579,741
Total Fully Projected Liability	1,953,369,936
Total Actuarial Accrued Liability	1,653,715,890
Valuation Assets	1,171,766,847
Total Unfunded Actuarial Accrued Liability (UAAL)	481,949,043
Ceres / Other District UAAL	26,683,918
County UAAL	455,265,125
Projected Pay (Ceres / Other Districts)	13,596,584
Projected Pay (County)	234,719,840
Projected Pay (Total Current Members)	248,316,424
Total Normal Cost (% of Payroll)	14.57%
Employer Normal Cost	7.38%
Ceres / Other District UAAL Amortization	12.32%
County UAAL Amortization	12.18%
Ceres / Other District Employer Contribution	2,905,590
County Employer Contribution	45,671,494
Total Employer Contribution	48,577,084
Total Employer Cost (% Pay)	19.56%



## 3.2: Computation of Annual Contribution Rate as of June 30, 2010

	Continuing,	Continuing,	All Members,		Assumption,
	Expected Pay,	Actual Pay,	Actual Pay,	All Members,	Rolling
	Expected	Expected	Expected	Actual Pay,	Amortization,
	Assets	Assets	Assets	Actual Assets	and Employee
					Contribution
					Changes
Active Fully Projected Liability	1,194,408,049	1,199,089,286	1,211,753,483	1,211,753,483	1,158,196,720
Active Entry Age Normal AL	907,917,309	911,283,621	917,557,464	917,557,464	866,922,869
Inactive Fully Projected Liability	872,010,115	872,010,115	872,010,115	872,010,115	870,900,944
Total Fully Projected Liability	2,066,418,164	2,071,099,401	2,083,763,598	2,083,763,598	2,029,097,664
Total Actuarial Accrued Liability	1,779,927,424	1,783,293,736	1,789,567,579	1,789,567,579	1,737,823,813
Valuation Assets	1,249,294,135	1,249,294,135	1,249,294,135	1,325,801,248	1,325,801,248
Total UAL	530,633,289	533,999,601	540,273,444	463,766,331	412,022,565
Ceres / Other District UAL	21,802,143	21,802,143	21,802,143	21,802,143	21,802,143
County Unfunded Accrued Liability	508,831,146	512,197,458	518,471,301	441,964,188	390,220,422
Projected Pay (Ceres /Other)	13,699,939	13,705,556	14,384,171	14,384,171	13,946,567
Projected Pay (County)	231,400,323	232,570,836	236,184,058	236,184,058	217,591,631
Projected Pay (Total Current)	245,100,262	246,276,392	250,568,229	250,568,229	231,538,198
Total Normal Cost (% of Pay)	14.40%	14.37%	14.41%	14.41%	14.60%
Employer Normal Cost	7.26%	7.25%	7.28%	7.28%	6.60%
Ceres / Other UAL Amortization	9.92%	9.92%	9.75%	9.75%	9.91%
County UAL Amortization	13.41%	13.50%	14.12%	12.04%	11.37%
Ceres / Other Employer					
Contribution	2,625,418	2,633,038	2,687,910	2,687,910	2,478,506
County Employer Contribution	49,312,250	49,580,073	50,315,170	45,393,774	40,580,840
Total Employer Contribution	51,937,668	52,213,112	53,003,081	48,081,684	43,059,346
Total Employer Cost (% Pay)	20.48%	20.55%	21.15%	19.19%	18.60%



Actuarial Accrued Liabilities For							Portion of Accrued Liabilities Covered by Valuation Assets				
Valuation Date	(1) Active Member Contributions	(2) Retirees and Beneficiaries	(3) Active and Terminated Members	Actuarial Accrued Liabilities	Valuation Assets	(1)	(2)	(3)			
6/30/2003	\$176,622,000	\$455,784,000	\$325,689,000	\$958,095,000	\$928,022,000	100%	100%	91%			
6/30/2004	\$166,806,000	\$518,922,000	\$349,617,000	\$1,035,345,000	\$993,180,000	100%	100%	88%			
6/30/2005	\$205,556,000	\$551,810,000	\$358,994,000	\$1,116,310,000	\$1,049,691,000	100%	100%	81%			
6/30/2006	\$219,907,000	\$619,109,000	\$355,888,000	\$1,194,904,000	\$1,154,048,000	100%	100%	89%			
6/30/2006 <sup>3</sup>	\$219,907,000	\$614,576,000	\$494,892,000	\$1,329,375,000	\$1,154,048,000	100%	100%	65%			
6/30/2008	\$272,657,000	\$739,838,000	\$536,329,000	\$1,548,824,000	\$1,267,167,000	100%	100%	47%			
6/30/2008 <sup>4</sup>	\$272,657,000	\$739,838,000	\$536,329,000	\$1,548,824,000	\$1,317,167,000	100%	100%	57%			
6/30/2009	\$298,342,000	\$781,082,000	\$574,292,000	\$1,653,716,000	\$1,171,767,000	100%	100%	16%			
6/30/2010	\$323,940,000	\$829,323,000	\$584,561,000	\$1,737,824,000	\$1,325,801,000	100%	100%	30%			

## 3.3: Computation of Funding Ratios as of June 30, 2010

<sup>3</sup> Results recalculated, reflecting Level 1 assumption changes (new retirement, termination and withdrawal decrements) & new EFI EAN methodology.

<sup>4</sup> Reflects transfer as of June 30, 2008 of \$50 million from Non-Valuation to Valuation Reserves.



Actuarial (Gains)/Losses (Change in UAAL beyond expected)								
Valuation Date	Asset Sources	Liability Sources	Total	Changes in Plan Provisions	Changes in Assumptions / Methods			
6/30/2003	\$33,037,561	\$9,931,697	\$42,969,258	\$0	(\$2,088,246)			
6/30/2004	\$8,536,049	\$12,492,070	\$21,028,119	\$0	\$0			
6/30/2005	\$26,573,640	\$11,238,430	\$37,812,070	\$0	\$0			
6/30/2006	-\$27,756,878	\$21,366,204	(\$6,390,674)	\$0	(\$14,845,293)			
6/30/2007 <sup>5</sup>	\$86,178,774	\$0	\$86,178,774	\$0	\$134,470,779			
6/30/2008	-\$50,709,169	\$67,324,195	\$16,615,026	\$0	\$0			
6/30/2009	\$228,905,354	\$12,996,828	\$241,902,182	\$0	\$0			
6/30/2010	-\$76,507,113	\$37,492,978	(\$39,014,135)	\$0	(\$51,743,766)			

## 3.4: Actuarial Analysis of Financial Experience



<sup>&</sup>lt;sup>5</sup> Actuarial valuation was not performed for fiscal year ending June 30, 2007

		General Tiers				Safety Tiers				
Tier:	1	2	3	4	5	4	5	General	Safety	Total
Total PVB	202,982,873	2,186,303	2,861,271	289,475,387	962,195,194	160,523,347	358,873,289	1,509,701,028	519,396,636	2,029,097,664
Total AAL	202,982,776	1,970,554	2,691,951	287,109,984	753,696,463	160,477,316	278,894,769	1,298,451,728	439,372,085	1,737,823,813
Assets								995,073,062	330,728,186	1,325,801,248
Total UAL								303,378,666	108,643,899	412,022,565
Ceres/Other UAL								10,500,807	11,301,336	21,802,143
County UAL								292,877,858	97,342,564	390,220,422
PV Payroll	25,119	1,787,088	7,858,610	37,000,975	1,541,397,528	775,779	380,882,085	1,588,069,319	381,657,864	1,969,727,183
PVFNC	97	215,749	169,320	2,365,403	208,498,731	46,031	79,978,520	211,249,300	80,024,551	291,273,851
Total NC	0.39%	12.07%	2.15%	6.39%	13.53%	5.93%	21.00%	13.14%	20.89%	14.60%
Ceres Pay	26,104	196,399	-	267,104	6,824,925	120,107	6,511,928	7,314,532	6,632,035	13,946,567
Ceres PVPay	25,119	1,787,088	-	1,259,101	57,692,616	327,866	59,665,743	60,763,923	59,993,609	120,757,532
Ceres UAL Payment								665,678	716,426	1,382,103
Ceres UAL %								9.10%	10.80%	9.91%
Ceres Total Rate	9.49%	21.17%	9.10%	15.49%	22.63%	16.74%	31.80%	22.28%	31.53%	26.68%
Ceres PVEECont	-	118,144	-	3,989	4,386,516	-	6,500,214	4,508,649	6,500,214	11,008,863
Ceres EECont	0.00%	6.61%	0.00%	0.32%	7.60%	0.00%	10.89%	7.28%	10.70%	8.91%
Ceres ER Cont	9.49%	14.56%	0.00%	15.18%	15.02%	16.74%	20.91%	15.00%	20.83%	17.77%
Ceres ER Cont	2,476	28,600	-	40,538	1,025,384	20,101	1,361,407	1,096,999	1,381,508	2,478,506
County Pay	-	-	1,010,108	8,117,629	171,299,816	187,415	36,976,662	180,427,554	37,164,077	217,591,631
County PVPay	-	-	7,858,610	35,741,874	1,483,704,912	447,913	321,216,342	1,527,305,396	321,664,255	1,848,969,652
County UAL Payment								18,566,406	6,170,837	24,737,243
County UAL %								10.29%	16.60%	11.37%
County Total Rate	10.29%	10.29%	12.56%	17.02%	24.53%	22.85%	38.71%	24.12%	38.63%	26.60%
County PVEECont	-	-	-	430,102	113,791,878	13,169	35,269,404	114,221,980	35,282,573	149,504,553
County EECont	0.00%	0.00%	0.00%	1.20%	7.67%	2.94%	10.98%	7.34%	10.94%	7.95%
County ER Cont	0.00%	0.00%	12.56%	15.82%	16.86%	19.91%	27.73%	16.79%	27.69%	18.65%
County ER Cont	-	-	126,851	1,283,896	28,879,978	37,314	10,252,800	30,290,726	10,290,114	40,580,840
Total ER Contribution	2,476	28,600	126,851	1,324,434	29,905,362	57,416	11,614,207	31,387,724	11,671,622	43,059,346
Total ER Rate	9.49%	14.56%	12.56%	15.80%	16.79%	18.01%	26.45%	16.72%	26.65%	18.60%

## 3.5: Detailed Calculation of Costs as of June 30, 2010 - By Class and Tier



## 3.6: Actuarial Balance Sheet

	Assets	
1.	Actuarial value of assets	\$1,402,134,000
2.	Present value of future contributions by members	160,513,000
3.	Present value of future employer contributions for normal cost	130,761,000
4.	Present value of other future employer contributions (UAAL)	412,023,000
5.	Total actuarial assets	\$2,105,431,000
	Liabilities	
6.	Present value of retirement allowances payable to retired/disabled	\$829,323,000
	members and their survivors	
7.	Present value of service retirement allowances payable to presently	1,020,949,000
	active members and their survivors	
8.	Present value of allowances payable to current and future vested	83,931,000
9.	Present value of disability retirement allowances payable to presently active members and their survivors	65,216,000
10.	Present value of death benefits payable on behalf of presently active members	19,691,000
11	Dresent value of members' contributions to be returned upon	0.088.000
11.	withdrawal	9,988,000
12.	Special Reserves (Actuarial Value)	76,333,000
13.	Total actuarial liabilities	\$2,105,431,000



Section 4:

## **Disclosure Information**



## 4.1: Schedules of Funding Status and Employer Contributions Required Under GASB Statement No. 25

The Governmental Accounting Standards Board (GASB) Statements No. 25 and 27 relate to the disclosure of pension liabilities on a public employer's financial statements. For accounting periods beginning after June 15, 1996, information required under these statements must be prepared for a public employer who seeks compliance with generally accepted accounting principles (GAAP) on behalf of its public employee retirement system.

GASB Statement No. 25 requires preparation of schedules of funding status and employer contributions, as well as the disclosure of plan provisions, actuarial assumptions, and other information. The required schedules are shown below. In each case, we have relied upon information from our files and contained in the reports of other actuaries employed by the employer in completing the schedules. While we have no reason to believe the information in our files or in other actuaries' reports is inaccurate, we strongly recommend that employer personnel verify the schedules below before they are included in Plan or employer financial statements.

Actuarial Valuation Date	Valuation Assets <sup>6</sup>	Actuarial Accrued Liability	Unfunded Actuarial Accrued Liability	Funded Ratio	Covered Payroll	Unfunded Liability as a Percent of Payroll
7/1/2000	679,421	666,114	(13,307)	102.0%	157,010	(8.5%)
7/1/2001	784,114	781,495	(2,619)	100.3%	174,595	(1.5%)
7/1/2002	878,821	870,768	(8,053)	100.9%	196,471	(4.1%)
7/1/2003	937,797	958,095	20,298	97.9%	197,664	10.3%
7/1/2004	993,180	1,035,345	42,165	95.9%	199,963	21.1%
7/1/2005	1,049,691	1,116,310	66,619	94.0%	211,681	31.5%
7/1/2006	1,154,048	1,194,904	40,856	96.6%	219,768	18.6%
7/1/2006 (Rev)	1,154,048	1,329,375 <sup>7</sup>	175,327	86.8%	212,011	82.7%
7/1/2008	1,317,167 <sup>8</sup>	1,548,824	231,657	85.0%	242,009	95.7%
7/1/2009	1,171,767	1,653,716	481,949	70.9%	248,316	194.1%
7/1/2010	1,325,801	1,737,824	412,023	76.3%	231,538	178.0%

<sup>6</sup> Excludes value of non-valuation reserves.

<sup>7</sup> The Accrued Liability as of June 30, 2006 was recomputed to reflect the change in Actuary and in the retirement, termination and refund assumptions.

<sup>8</sup> Includes \$50 million transferred from Non-Valuation to Valuation Reserves as of 6/30/2008.



Schedule of Employer Contributions (Dollar Amounts in Thousands)							
Year Ending	Annual Required Contribution	Actual Contribution	Percentage Contributed				
6/30/2000	5,899	5,899	100%				
6/30/2001	7,509	7,509	100%				
6/30/2002	11,341	11,341	100%				
6/30/2003	16,208	16,208	100%				
6/30/2004	17,114	17,114	100%				
6/30/2005	19,793	19,793	100%				
6/30/2006	22,549	22,549	100%				
6/30/2007	32,563	32,563	100%				
6/30/2008	22,555	22,555	100%				
6/30/2009	23,411	23,411	100%				
6/30/2010	31,814	31,814 <sup>9</sup>	100%				

The table below summarizes certain information about this actuarial report.

Valuation date

Actuarial cost method

Amortization method

Remaining amortization period

Asset valuation method

Actuarial assumptions:

Investment rate of return\*

Projected salary increases\*

\*Includes inflation at

Cost of living adjustments

June 30, 2010 Entry Age Normal Level % of Pay, Open 25 Years

Actuarial value: Excess earnings smoothed over five years, 80%/120% corridor around market

8.00%

3.75%, plus service-based rates

3.50%

100% of CPI up to 3% annually with banking

<sup>&</sup>lt;sup>9</sup> The Actual Contribution was comprised of a \$21,814,194 payment by the employers, plus an additional \$10,000,000 in assets transferred from the non-valuation to valuation reserves.



Stanislaus County Employees' Retirement Association 69 Actuarial Review and Analysis as of June 30, 2010

**Appendix I:** 

**Employer Contribution Rates** 



#### **Employer Contribution Rates for County / Former County Members**

Separate rates for General and Safety members by Tier are shown below.

	General			<u>Safety</u>				
	Tier 1	Tier 2	Tier 3	Tier 4	Tier 5	<b>Tier 2</b> <sup>10</sup>	Tier 4	Tier 5
Employer Normal Cost	N / A	5.46% <sup>11</sup>	2.27%	5.53%	6.57%	7.80%	3.30%	11.12%
UAAL Amortization Cost	N/A	10.29%	10.29%	10.29%	10.29%	16.60%	16.60%	16.60%
Total Cost	N/A	15.75%	12.56%	15.82%	16.86%	24.40%	19.91%	27.73%

**Employer Contribution Rates for Ceres / Other District Members** 

	General			<u>Safety</u>				
	Tier 1	Tier 2	Tier 3	Tier 4	Tier 5	Tier 2	Tier 4	Tier 5
Employer Normal Cost	0.39%	5.46%	N/A	6.08%	5.93%	7.71%	5.94%	10.11%
UAAL Amortization Cost	9.10%	9.10%	N/A	9.10%	9.10%	10.80%	10.80%	10.80%
Total Cost	9.49%	14.56%	N/A	15.18%	15.02%	18.51%	16.74%	20.91%

<sup>&</sup>lt;sup>11</sup> Employer normal cost estimated, based on rate determined for current Ceres Tier 2 General members. Future rates will be determined based on actual demographics of new members hired into this Tier.



<sup>&</sup>lt;sup>10</sup> Employer normal cost for Safety Tier 2 estimated, based on 80% of total normal cost for Tier 5, offset by 90% of average County and Ceres / Other District Safety employee contribution rates. Future rates will be determined based on actual demographics of new members hired into this Tier.
Stanislaus County Employees' Retirement Association71Actuarial Review and Analysis as of June 30, 2010

**Appendix II:** 

**Employee Contribution Rates** 



#### **Employee Contribution Rates**

Employee contribution rates vary by member Group and Tier. The rates were changed following an experience study. A comparison of the current and prior employee contribution rates are shown in the following tables.

The current rates were determined by EFI based on an interest rate of 8.00% per annum, an average salary increase of 3.75% per year, and the Retired Pensioners (RP) 2000 tables published by the Society of Actuaries (projected from 2000 to 2020 using Scale AA)with no age adjustment. The rates are blended a male/female weighting of 25% male / 75% female for General members, and 80% male / 20% female for Safety members.

The prior rates were determined (by Buck Consultants) based on an interest rate of 8.16% per annum, an average salary increase of 5% per year, and the 1994 GAM Male mortality tables - set back three years for General Members, with no age adjustment for Safety Members.



# General Tier 1 Employee Contribution Rates

	Current Rates				Prior Rates				
	Basic	Basic	COL	COL	Basic	Basic	COL*	COL*	
Entry Age	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350	
16	2.04%	3.06%	1.02%	1.53%	1.64%	2.46%	0.63%	0.94%	
17	2.04%	3.06%	1.02%	1.53%	1.65%	2.47%	0.63%	0.95%	
18	2.04%	3.06%	1.02%	1.53%	1.66%	2.49%	0.63%	0.95%	
19	2.04%	3.06%	1.02%	1.53%	1.67%	2.51%	0.64%	0.96%	
20	2.04%	3.06%	1.02%	1.53%	1.69%	2.53%	0.65%	0.97%	
21	2.06%	3.09%	1.03%	1.55%	1.70%	2.55%	0.65%	0.98%	
22	2.08%	3.12%	1.05%	1.57%	1.72%	2.58%	0.66%	0.99%	
23	2.10%	3.15%	1.06%	1.60%	1.74%	2.61%	0.67%	1.00%	
24	2.12%	3.17%	1.08%	1.62%	1.76%	2.64%	0.67%	1.01%	
25	2.13%	3.20%	1.10%	1.64%	1.78%	2.67%	0.68%	1.02%	
26	2.14%	3.22%	1.11%	1.67%	1.81%	2.71%	0.69%	1.04%	
27	2.16%	3.23%	1.13%	1.69%	1.83%	2.74%	0.70%	1.05%	
28	2.17%	3.25%	1.15%	1.72%	1.85%	2.78%	0.71%	1.06%	
29	2.17%	3.26%	1.16%	1.75%	1.89%	2.83%	0.72%	1.08%	
30	2.18%	3.27%	1.18%	1.77%	1.91%	2.87%	0.73%	1.10%	
31	2.23%	3.34%	1.20%	1.80%	1.95%	2.92%	0.75%	1.12%	
32	2.28%	3.41%	1.22%	1.84%	1.98%	2.97%	0.76%	1.14%	
33	2.33%	3.49%	1.25%	1.87%	2.02%	3.03%	0.77%	1.16%	
34	2.38%	3.57%	1.27%	1.91%	2.05%	3.08%	0.79%	1.18%	
35	2.43%	3.65%	1.30%	1.95%	2.10%	3.15%	0.81%	1.21%	
36	2.49%	3.74%	1.33%	1.99%	2.14%	3.21%	0.82%	1.23%	
37	2.55%	3.82%	1.36%	2.04%	2.18%	3.27%	0.83%	1.25%	
38	2.61%	3.91%	1.39%	2.08%	2.22%	3.33%	0.85%	1.27%	
39	2.67%	4.00%	1.42%	2.13%	2.27%	3.40%	0.87%	1.30%	
40	2.72%	4.07%	1.45%	2.18%	2.31%	3.46%	0.88%	1.32%	
41	2.67%	4.01%	1.47%	2.21%	2.35%	3.53%	0.90%	1.35%	
42	2.72%	4.09%	1.49%	2.24%	2.40%	3.60%	0.92%	1.38%	
43	2.78%	4.16%	1.51%	2.27%	2.45%	3.67%	0.93%	1.40%	
44	2.83%	4.24%	1.53%	2.29%	2.49%	3.73%	0.95%	1.43%	
45	2.88%	4.33%	1.55%	2.32%	2.53%	3.80%	0.97%	1.45%	
46	2.94%	4.41%	1.56%	2.34%	2.59%	3.88%	0.99%	1.48%	
47	3.00%	4.50%	1.57%	2.36%	2.63%	3.95%	1.01%	1.51%	
48	3.07%	4.60%	1.58%	2.38%	2.68%	4.02%	1.03%	1.54%	
49	3.13%	4.70%	1.59%	2.39%	2.73%	4.09%	1.04%	1.56%	
50	3.17%	4.76%	1.59%	2.39%	2.78%	4.17%	1.07%	1.60%	
51	3.22%	4.83%	1.58%	2.37%	2.83%	4.25%	1.09%	1.63%	
52	3.26%	4.90%	1.56%	2.34%	2.88%	4.32%	1.10%	1.65%	
53	3.32%	4.97%	1.51%	2.26%	2.93%	4.40%	1.12%	1.68%	
54	3.37%	5.06%	1.47%	2.20%	2.99%	4.48%	1.14%	1.71%	
55	3.37%	5.06%	1.43%	2.15%	3.04%	4.56%	1.16%	1.74%	
56	3.38%	5.06%	1.36%	2.05%	3.09%	4.64%	1.19%	1.78%	
57	3.38%	5.07%	1.32%	1.98%	3.15%	4.72%	1.21%	1.81%	
58	3.38%	5.07%	1.28%	1.92%	3.20%	4.80%	1.23%	1.84%	
59+	3.38%	5.07%	1.25%	1.87%	3.26%	4.89%	1.25%	1.87%	

\*38.26% of basic rates



# **General Tier 2**

### **Employee Contribution Rates**

	Current Rates				Prior Rates			
	Basic	Basic	COL	COL	Basic	Basic	COL*	COL*
Entry Age	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350
16	3.19%	4.79%	0.83%	1.25%	2.61%	3.92%	1.00%	1.50%
17	3.19%	4.79%	0.83%	1.25%	2.63%	3.94%	1.01%	1.51%
18	3.19%	4.79%	0.83%	1.25%	2.65%	3.97%	1.01%	1.52%
19	3.19%	4.79%	0.83%	1.25%	2.67%	4.00%	1.02%	1.53%
20	3.19%	4.79%	0.83%	1.25%	2.69%	4.04%	1.03%	1.55%
21	3.23%	4.84%	0.84%	1.26%	2.72%	4.08%	1.04%	1.56%
22	3.25%	4.88%	0.85%	1.28%	2.75%	4.12%	1.05%	1.58%
23	3.28%	4.92%	0.86%	1.29%	2.77%	4.16%	1.06%	1.59%
24	3.31%	4.96%	0.87%	1.31%	2.81%	4.21%	1.07%	1.61%
25	3.33%	5.00%	0.88%	1.32%	2.84%	4.26%	1.09%	1.63%
26	3.35%	5.03%	0.89%	1.34%	2.88%	4.32%	1.10%	1.65%
27	3.37%	5.05%	0.91%	1.36%	2.92%	4.38%	1.12%	1.68%
28	3.38%	5.08%	0.92%	1.38%	2.96%	4.44%	1.13%	1.70%
29	3.40%	5.09%	0.93%	1.40%	3.01%	4.51%	1.15%	1.73%
30	3.40%	5.11%	0.95%	1.42%	3.05%	4.58%	1.17%	1.75%
31	3.48%	5.22%	0.96%	1.45%	3.11%	4.66%	1.19%	1.78%
32	3.56%	5.34%	0.98%	1.47%	3.16%	4.74%	1.21%	1.81%
33	3.64%	5.46%	1.00%	1.50%	3.22%	4.83%	1.23%	1.85%
34	3.72%	5.58%	1.02%	1.53%	3.28%	4.92%	1.25%	1.88%
35	3.81%	5.71%	1.04%	1.56%	3.35%	5.02%	1.28%	1.92%
36	3.89%	5.84%	1.07%	1.60%	3.41%	5.12%	1.31%	1.96%
37	3.98%	5.97%	1.09%	1.64%	3.48%	5.22%	1.33%	2.00%
38	4.07%	6.10%	1.12%	1.67%	3.55%	5.32%	1.36%	2.04%
39	4.15%	6.22%	1.14%	1.71%	3.61%	5.42%	1.38%	2.07%
40	4.23%	6.34%	1.17%	1.75%	3.68%	5.52%	1.41%	2.11%
41	4.26%	6.38%	1.19%	1.78%	3.75%	5.63%	1.43%	2.15%
42	4.34%	6.50%	1.20%	1.81%	3.83%	5.74%	1.47%	2.20%
43	4.42%	6.63%	1.22%	1.83%	3.90%	5.85%	1.49%	2.24%
44	4.50%	6.76%	1.23%	1.85%	3.97%	5.96%	1.52%	2.28%
45	4.59%	6.89%	1.25%	1.87%	4.05%	6.07%	1.55%	2.32%
46	4.68%	7.02%	1.26%	1.89%	4.12%	6.18%	1.57%	2.36%
47	4.78%	7.17%	1.27%	1.91%	4.20%	6.30%	1.61%	2.41%
48	4.87%	7.30%	1.28%	1.93%	4.27%	6.41%	1.63%	2.45%
49	4.94%	7.41%	1.29%	1.94%	4.35%	6.53%	1.67%	2.50%
50	5.01%	7.51%	1.30%	1.95%	4.43%	6.65%	1.69%	2.54%
51	5.07%	7.61%	1.30%	1.95%	4.51%	6.77%	1.73%	2.59%
52	5.15%	7.72%	1.30%	1.95%	4.60%	6.90%	1.76%	2.64%
53	5.20%	7.79%	1.29%	1.93%	4.68%	7.02%	1.79%	2.69%
54	5.22%	7.83%	1.27%	1.90%	4.77%	7.15%	1.83%	2.74%
55	5.22%	7.83%	1.24%	1.87%	4.85%	7.27%	1.85%	2.78%
56	5.22%	7.84%	1.19%	1.78%	4.93%	7.40%	1.89%	2.83%
57	5.23%	7.84%	1.15%	1.73%	5.02%	7.53%	1.92%	2.88%
58	5.43%	8.14%	1.12%	1.68%	5.11%	7.66%	1.95%	2.93%
59+	5.63%	8.45%	1.09%	1.64%	5.19%	7.79%	1.99%	2.98%

\*38.26% of basic rates



#### **General Tier 4**

#### **Employee Contribution Rates**

	Current Rates				Prior Rates				
	Basic	Basic	COL	COL	Basic	Basic	COL*	COL*	
Entry Age	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350	
16	1.89%	2.84%	1.08%	1.62%	1.63%	2.44%	0.46%	0.69%	
17	1.89%	2.84%	1.08%	1.62%	1.63%	2.45%	0.47%	0.70%	
18	1.89%	2.84%	1.08%	1.62%	1.65%	2.47%	0.47%	0.70%	
19	1.89%	2.84%	1.08%	1.62%	1.66%	2.49%	0.47%	0.71%	
20	1.89%	2.84%	1.08%	1.62%	1.67%	2.51%	0.47%	0.71%	
21	1.90%	2.85%	1.10%	1.64%	1.69%	2.53%	0.48%	0.72%	
22	1.91%	2.87%	1.11%	1.67%	1.70%	2.55%	0.48%	0.72%	
23	1.92%	2.88%	1.13%	1.69%	1.71%	2.57%	0.49%	0.73%	
24	1.93%	2.89%	1.15%	1.72%	1.73%	2.60%	0.49%	0.74%	
25	1.93%	2.90%	1.16%	1.74%	1.75%	2.63%	0.50%	0.75%	
26	1.98%	2.96%	1.18%	1.77%	1.77%	2.66%	0.51%	0.76%	
27	2.02%	3.03%	1.20%	1.79%	1.80%	2.70%	0.51%	0.77%	
28	2.07%	3.10%	1.21%	1.82%	1.82%	2.73%	0.52%	0.78%	
29	2.11%	3.17%	1.23%	1.85%	1.85%	2.77%	0.53%	0.79%	
30	2.16%	3.24%	1.25%	1.88%	1.88%	2.82%	0.53%	0.80%	
31	2.21%	3.31%	1.27%	1.91%	1.91%	2.86%	0.54%	0.81%	
32	2.26%	3.39%	1.29%	1.94%	1.94%	2.91%	0.55%	0.83%	
33	2.31%	3.47%	1.32%	1.98%	1.97%	2.96%	0.56%	0.84%	
34	2.37%	3.55%	1.34%	2.01%	2.01%	3.01%	0.57%	0.86%	
35	2.41%	3.62%	1.37%	2.05%	2.05%	3.07%	0.58%	0.87%	
36	2.37%	3.56%	1.40%	2.10%	2.09%	3.13%	0.59%	0.89%	
37	2.42%	3.63%	1.43%	2.14%	2.13%	3.19%	0.61%	0.91%	
38	2.46%	3.69%	1.46%	2.19%	2.17%	3.25%	0.61%	0.92%	
39	2.51%	3.77%	1.49%	2.24%	2.21%	3.31%	0.63%	0.94%	
40	2.56%	3.84%	1.52%	2.28%	2.25%	3.38%	0.64%	0.96%	
41	2.61%	3.92%	1.54%	2.31%	2.29%	3.44%	0.65%	0.98%	
42	2.66%	4.00%	1.56%	2.34%	2.33%	3.50%	0.66%	0.99%	
43	2.72%	4.08%	1.58%	2.37%	2.38%	3.57%	0.67%	1.01%	
44	2.78%	4.17%	1.59%	2.39%	2.42%	3.63%	0.69%	1.03%	
45	2.82%	4.23%	1.61%	2.41%	2.47%	3.70%	0.70%	1.05%	
46	2.86%	4.28%	1.62%	2.42%	2.51%	3.77%	0.71%	1.07%	
47	2.90%	4.35%	1.62%	2.43%	2.55%	3.83%	0.73%	1.09%	
48	2.94%	4.41%	1.63%	2.44%	2.60%	3.90%	0.74%	1.11%	
49	2.99%	4.49%	1.62%	2.44%	2.65%	3.97%	0.75%	1.13%	
50	2.99%	4.49%	1.62%	2.42%	2.70%	4.05%	0.77%	1.15%	
51	3.00%	4.49%	1.60%	2.39%	2.75%	4.12%	0.78%	1.17%	
52	3.00%	4.50%	1.57%	2.36%	2.79%	4.19%	0.79%	1.19%	
53	3.00%	4.50%	1.52%	2.28%	2.84%	4.26%	0.81%	1.21%	
54+	3.00%	4.50%	1.48%	2.21%	2.89%	4.34%	0.82%	1.23%	

\*28.41% of basic rates



#### **General Tier 5**

#### **Employee Contribution Rates**

	Current Rates				Prior Rates			
	Basic	Basic	COL	COL	Basic	Basic	COL*	COL*
Entry Age	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350	First \$350	Over \$350
16	3.78%	5.67%	1.08%	1.62%	3.25%	4.88%	0.93%	1.39%
17	3.78%	5.67%	1.08%	1.62%	3.27%	4.91%	0.93%	1.39%
18	3.78%	5.67%	1.08%	1.62%	3.29%	4.94%	0.93%	1.40%
19	3.78%	5.67%	1.08%	1.62%	3.31%	4.97%	0.94%	1.41%
20	3.78%	5.67%	1.08%	1.62%	3.34%	5.01%	0.95%	1.42%
21	3.80%	5.71%	1.10%	1.64%	3.37%	5.05%	0.95%	1.43%
22	3.83%	5.74%	1.11%	1.67%	3.40%	5.10%	0.97%	1.45%
23	3.84%	5.76%	1.13%	1.69%	3.43%	5.15%	0.97%	1.46%
24	3.85%	5.78%	1.15%	1.72%	3.47%	5.20%	0.99%	1.48%
25	3.86%	5.80%	1.16%	1.74%	3.51%	5.26%	0.99%	1.49%
26	3.95%	5.93%	1.18%	1.77%	3.55%	5.33%	1.01%	1.51%
27	4.04%	6.06%	1.20%	1.79%	3.60%	5.40%	1.02%	1.53%
28	4.13%	6.20%	1.21%	1.82%	3.65%	5.47%	1.03%	1.55%
29	4.22%	6.34%	1.23%	1.85%	3.70%	5.55%	1.05%	1.58%
30	4.32%	6.48%	1.25%	1.88%	3.75%	5.63%	1.07%	1.60%
31	4.42%	6.63%	1.27%	1.91%	3.81%	5.72%	1.09%	1.63%
32	4.52%	6.78%	1.29%	1.94%	3.88%	5.82%	1.10%	1.65%
33	4.62%	6.94%	1.32%	1.98%	3.95%	5.92%	1.12%	1.68%
34	4.73%	7.10%	1.34%	2.01%	4.02%	6.03%	1.14%	1.71%
35	4.82%	7.23%	1.37%	2.05%	4.10%	6.15%	1.17%	1.75%
36	4.74%	7.12%	1.40%	2.10%	4.17%	6.26%	1.19%	1.78%
37	4.83%	7.25%	1.43%	2.14%	4.25%	6.38%	1.21%	1.81%
38	4.93%	7.39%	1.46%	2.19%	4.33%	6.50%	1.23%	1.85%
39	5.02%	7.53%	1.49%	2.24%	4.42%	6.63%	1.25%	1.88%
40	5.12%	7.68%	1.52%	2.28%	4.50%	6.75%	1.28%	1.92%
41	5.22%	7.83%	1.54%	2.31%	4.59%	6.88%	1.30%	1.95%
42	5.33%	7.99%	1.56%	2.34%	4.67%	7.01%	1.33%	1.99%
43	5.44%	8.16%	1.58%	2.37%	4.76%	7.14%	1.35%	2.03%
44	5.56%	8.34%	1.59%	2.39%	4.85%	7.27%	1.38%	2.07%
45	5.63%	8.45%	1.61%	2.41%	4.93%	7.40%	1.40%	2.10%
46	5.71%	8.57%	1.62%	2.42%	5.02%	7.53%	1.43%	2.14%
47	5.79%	8.69%	1.62%	2.43%	5.11%	7.67%	1.45%	2.18%
48	5.88%	8.83%	1.63%	2.44%	5.21%	7.81%	1.48%	2.22%
49	5.99%	8.98%	1.62%	2.44%	5.30%	7.95%	1.51%	2.26%
50	5.99%	8.98%	1.62%	2.42%	5.39%	8.09%	1.53%	2.30%
51	5.99%	8.99%	1.60%	2.39%	5.49%	8.23%	1.56%	2.34%
52	5.99%	8.99%	1.57%	2.36%	5.59%	8.38%	1.59%	2.38%
53	6.00%	8.99%	1.52%	2.28%	5.69%	8.53%	1.61%	2.42%
54+	6.00%	9.00%	1.48%	2.21%	5.79%	8.68%	1.65%	2.47%

\*28.41% of basic rates



#### Safety Tier 2

# **Employee Contribution Rates (for New Tier)**

	Current Rates								
	Basic	Basic	COL	COL					
Entry Age	First \$350	Over \$350	First \$350	Over \$350					
20	4.69%	7.03%	1.70%	2.55%					
21	4.77%	7.16%	1.73%	2.59%					
22	4.86%	7.29%	1.77%	2.66%					
23	4.95%	7.42%	1.81%	2.71%					
24	5.04%	7.56%	1.83%	2.75%					
25	5.13%	7.70%	1.86%	2.80%					
26	5.23%	7.84%	1.89%	2.84%					
27	5.33%	7.99%	1.92%	2.89%					
28	5.43%	8.14%	1.96%	2.93%					
29	5.53%	8.29%	1.99%	2.98%					
30	5.63%	8.45%	2.02%	3.03%					
31	5.72%	8.58%	2.06%	3.09%					
32	5.83%	8.75%	2.10%	3.15%					
33	5.95%	8.92%	2.14%	3.21%					
34	6.07%	9.10%	2.19%	3.28%					
35	6.19%	9.28%	2.23%	3.35%					
36	6.32%	9.48%	2.28%	3.42%					
37	6.45%	9.68%	2.33%	3.49%					
38	6.58%	9.86%	2.38%	3.56%					
39	6.69%	10.03%	2.43%	3.64%					
40	6.78%	10.18%	2.48%	3.72%					
41	6.89%	10.34%	2.51%	3.77%					
42	7.01%	10.51%	2.55%	3.82%					
43	7.10%	10.65%	2.57%	3.86%					
44	7.14%	10.71%	2.59%	3.88%					
45	7.13%	10.69%	2.59%	3.89%					
46	7.07%	10.60%	2.55%	3.83%					
47	6.96%	10.45%	2.52%	3.78%					
48	7.22%	10.83%	2.49%	3.74%					
49+	7.49%	11.24%	2.47%	3.70%					



## Safety Tier 4

#### **Employee Contribution Rates**

		Curren	t Rates		Prior Rates			
	Basic	Basic	COL	COL	Basic	Basic	COL*	COL*
Entry Age	First \$350	Over \$350						
20	2.47%	3.70%	2.22%	3.32%	2.20%	3.30%	1.15%	1.73%
21	2.51%	3.77%	2.25%	3.38%	2.23%	3.34%	1.17%	1.75%
22	2.56%	3.84%	2.32%	3.48%	2.25%	3.38%	1.18%	1.77%
23	2.61%	3.91%	2.35%	3.53%	2.28%	3.42%	1.19%	1.79%
24	2.66%	3.99%	2.38%	3.58%	2.31%	3.47%	1.21%	1.82%
25	2.71%	4.06%	2.41%	3.62%	2.35%	3.52%	1.23%	1.85%
26	2.76%	4.13%	2.44%	3.66%	2.38%	3.57%	1.25%	1.87%
27	2.81%	4.21%	2.47%	3.70%	2.41%	3.62%	1.27%	1.90%
28	2.86%	4.29%	2.49%	3.73%	2.45%	3.68%	1.29%	1.93%
29	2.91%	4.37%	2.51%	3.77%	2.49%	3.74%	1.31%	1.96%
30	2.97%	4.45%	2.54%	3.81%	2.53%	3.80%	1.33%	1.99%
31	3.00%	4.49%	2.57%	3.85%	2.57%	3.86%	1.35%	2.03%
32	3.05%	4.58%	2.61%	3.92%	2.61%	3.92%	1.37%	2.06%
33	3.11%	4.67%	2.66%	3.99%	2.66%	3.99%	1.39%	2.09%
34	3.18%	4.76%	2.71%	4.07%	2.71%	4.06%	1.42%	2.13%
35	3.24%	4.86%	2.77%	4.15%	2.76%	4.14%	1.45%	2.17%
36	3.31%	4.96%	2.82%	4.23%	2.81%	4.21%	1.47%	2.21%
37	3.38%	5.07%	2.88%	4.31%	2.86%	4.29%	1.50%	2.25%
38	3.45%	5.18%	2.93%	4.40%	2.91%	4.37%	1.53%	2.29%
39	3.53%	5.30%	3.00%	4.49%	2.97%	4.45%	1.56%	2.34%
40	3.59%	5.38%	3.06%	4.59%	3.02%	4.53%	1.59%	2.38%
41	3.64%	5.46%	3.05%	4.57%	3.08%	4.62%	1.61%	2.42%
42	3.70%	5.56%	3.04%	4.56%	3.13%	4.70%	1.65%	2.47%
43	3.77%	5.66%	3.03%	4.55%	3.19%	4.79%	1.67%	2.51%
44	3.86%	5.78%	3.03%	4.55%	3.25%	4.87%	1.71%	2.56%
45	3.88%	5.82%	3.03%	4.54%	3.31%	4.96%	1.73%	2.60%
46	3.88%	5.83%	2.98%	4.47%	3.37%	5.05%	1.77%	2.65%
47	3.86%	5.79%	2.93%	4.40%	3.42%	5.13%	1.79%	2.69%
48	3.82%	5.72%	2.90%	4.35%	3.48%	5.22%	1.83%	2.74%
49+	3.75%	5.62%	2.87%	4.31%	3.54%	5.31%	1.86%	2.79%

\*52.48% of basic rates



# Safety Tier 5

#### **Employee Contribution Rates**

		Curren	t Rates		Prior Rates			
	Basic	Basic	COL	COL	Basic	Basic	COL*	COL*
Entry Age	First \$350	Over \$350						
20	4.94%	7.41%	2.22%	3.32%	4.39%	6.59%	2.31%	3.46%
21	5.03%	7.54%	2.25%	3.38%	4.45%	6.67%	2.33%	3.50%
22	5.12%	7.68%	2.32%	3.48%	4.51%	6.76%	2.37%	3.55%
23	5.22%	7.83%	2.35%	3.53%	4.57%	6.85%	2.39%	3.59%
24	5.31%	7.97%	2.38%	3.58%	4.63%	6.94%	2.43%	3.64%
25	5.41%	8.12%	2.41%	3.62%	4.69%	7.04%	2.46%	3.69%
26	5.51%	8.27%	2.44%	3.66%	4.76%	7.14%	2.50%	3.75%
27	5.62%	8.42%	2.47%	3.70%	4.83%	7.25%	2.53%	3.80%
28	5.72%	8.58%	2.49%	3.73%	4.91%	7.36%	2.57%	3.86%
29	5.83%	8.74%	2.51%	3.77%	4.98%	7.47%	2.61%	3.92%
30	5.94%	8.91%	2.54%	3.81%	5.06%	7.59%	2.65%	3.98%
31	5.99%	8.99%	2.57%	3.85%	5.15%	7.72%	2.70%	4.05%
32	6.11%	9.16%	2.61%	3.92%	5.23%	7.85%	2.75%	4.12%
33	6.23%	9.34%	2.66%	3.99%	5.33%	7.99%	2.79%	4.19%
34	6.35%	9.53%	2.71%	4.07%	5.42%	8.13%	2.85%	4.27%
35	6.48%	9.72%	2.77%	4.15%	5.51%	8.27%	2.89%	4.34%
36	6.61%	9.92%	2.82%	4.23%	5.62%	8.43%	2.95%	4.42%
37	6.76%	10.13%	2.88%	4.31%	5.73%	8.59%	3.01%	4.51%
38	6.91%	10.36%	2.93%	4.40%	5.83%	8.74%	3.06%	4.59%
39	7.07%	10.60%	3.00%	4.49%	5.94%	8.91%	3.12%	4.68%
40	7.17%	10.76%	3.06%	4.59%	6.05%	9.07%	3.17%	4.76%
41	7.28%	10.93%	3.05%	4.57%	6.15%	9.23%	3.23%	4.84%
42	7.41%	11.11%	3.04%	4.56%	6.27%	9.40%	3.29%	4.93%
43	7.55%	11.32%	3.03%	4.55%	6.38%	9.57%	3.35%	5.02%
44	7.71%	11.57%	3.03%	4.55%	6.49%	9.74%	3.41%	5.11%
45	7.77%	11.65%	3.03%	4.54%	6.61%	9.91%	3.47%	5.20%
46	7.77%	11.65%	2.98%	4.47%	6.73%	10.09%	3.53%	5.30%
47	7.72%	11.59%	2.93%	4.40%	6.85%	10.27%	3.59%	5.39%
48	7.63%	11.45%	2.90%	4.35%	6.97%	10.45%	3.65%	5.48%
49+	7.49%	11.24%	2.87%	4.31%	7.09%	10.63%	3.72%	5.58%

\*52.48% of basic rates

