

# COMPREHENSIVE ANNUAL FINANCIAL REPORT

For the Fiscal Year Ended December 31, 2012

# ORANGE COUNTY COUNTY



HISTORICAL WONDERS OF ORANGE COUNTY, CALIFORNIA





# COMPREHENSIVE ANNUAL FINANCIAL REPORT

For the Fiscal Year Ended December 31, 2012

### Prepared by:

The Finance Division of the Orange County Employees Retirement System

### Issued by:

Steve Delaney, Chief Executive Officer

### Orange County Employees Retirement System

2223 East Wellington Avenue, Suite 100 Santa Ana, Ca 92701-3161

714.558.6200

Toll Free: 888.570.6277

www.ocers.org

Images courtesy of: OC Parks

Pamla Eisenberg/Richard Nixon Presidential Library & Museum

Huell Howser Productions Robert Kinsler/OCERS Jake Bowman

Graphic Design: Spencer Lewis Marketing Group



# Table of Contents

Section 1 - Introductory	Schedule of Investment Expenses 81
Letter of Transmittal	Investment Summary
Members of the Board of Retirement	Schedule of Largest Equity Holdings 82
Organization of OCERS 8	Schedule of Largest Fixed Income Holdings 82
Administrative Organization Chart	List of Investment Managers
List of Professional Consultants	
Certificate of Achievement for Excellence in Financial Reporting	Section IV – Actuarial
in i maneiar reporting	Actuary's Certification Letter 87
	History of Unfunded Actuarial Accrued Liability 90
Section II - Financial	History of Employer Contribution Rates 91
Independent Auditor's Report	Summary of Active Membership
Management's Discussion and Analysis	Summary of Retired Membership
	Development of Actuarial and Valuation
Basic Financial Statements	Value of Assets
Statement of Fiduciary Net Position	Short-Term Solvency Test
Statement of Changes in Fiduciary Net Position 31	Actuarial Methods and Assumptions
Notes to the Basic Financial Statements	Summary of Major Plan Provisions
Required Supplementary Information	Experience Analysis
Schedule of Funding Progress -	
Schedule of Funding Progress – Pension Plan	Actuarial Certification
Schedule of Employer Contributions –	
Pension Plan	Section V – Statistical
Schedule of Funding Progress –	Statistical Section Review
OPEB County of Orange 60	Schedule of Changes
Schedule of Employer Contributions –	in Fiduciary Net Position
OPEB County of Orange 60	Schedule and Graph
Schedule of Funding Progress –	of Fiduciary Revenues by Source
OPEB Orange County Fire Authority 61	Schedule and Graph
Schedule of Employer Contributions –	of Expenses by Type
OPEB Orange County Fire Authority	Schedule and Graph
Significant Factors Affecting Trends in Actuarial Information	of Benefit Expenses by Type
	Schedule and Graph
Other Supplemental Information	of Average Monthly Pension Check
Schedule of Administrative Expenses 67	Schedule of Average Pension Benefit Payment by Years of Service
Schedule of Investment Expenses	
Schedule of Payments for	Schedule of Pension Benefit Recipients by Type of Benefit
Professional Services	Schedule of Pension Benefit Recipients
Statement of Changes in Assets and	by Option Selected
Liabilities - OPEB Agency Fund	Schedule and Graph
	of Pension Benefit Recipients
Section III - Investment	Schedule of Average Retirement Age
Investment Consultant's Statement	Schedule of Average Years of Service at Retirement 131
Investment Returns	Schedule of Beneficiaries Receiving a Pension 131
	Schedule of Active and Deferred Members 131
Statement of Investment Objectives and Policies 76	Schedule of Participating Employers -
Asset Diversification	Pension Plan
Growth of System Net Assets at Fair Value	History of Actuarial Assumption Rate
Historical Asset Allocation	
History of Performance	Castian VII Cl
Schedule of Commissions	Section VI – Glossary
Commission Recapture Program 80	Glossary of Terms

# ORANGEUNTY CERS

EMPLOYEES RETUREMENT SYSTEM

# INTRODUCTORY Section I



San Juan Capistrano, California

Mission San Juan Capistrano

# Mission San Juan Capistrano



Mission San Juan Capistrano has been the home to many people for over 230 years of history. Its history consists of memories and stories of its past inhabitants and present visitors. It is a place of historical, cultural, and religious significance, as well as a place of inspiration and education.

The story begins in 1775, when Mission San Juan Capistrano was first founded by Father Lasuen, on October 30th. But just a few weeks after the party of padres and soldiers arrived, they received word of the revolt occurring in San Diego. The founding padres and soldiers decided to leave San Juan Capistrano and go back to San Diego to help there. Once things had settled in San Diego, Father Serra personally led a party to refound Mission San Juan Capistrano on All Saints Day, November 1, 1776.

Mission Viejo

Laguna
Beach
San Juan
Capistrano
Dana
Point
San
Clemente

### Fun Fact

The American Cliff Swallow is a migratory bird that spends its winters in Goya, Argentina but makes the 6,000-mile trek north to the warmer climate of San Juan Capistrano in the springtime.





Serving the Active and Retired Members of:

City of San Juan Capistrano

County of Orange

Orange County Cemetery District

Orange County Children & Families Commision

Orange County Department of Education (closed to new members)

Orange County Employees Retirement System

Orange County Fire Authority

Orange County In-Home Supportive Services Public Authority

Orange County Local Agency Formation Commission

Orange County Public Law Library

Orange County Sanitation District

Orange County Transportation Authority

Superior Court of California, County of Orange

Transportation Corridor Agencies

UCI Medical Center and Campus (closed to new members) June 4, 2013

### **Board of Retirement**

Orange County Employees Retirement System 2223 East Wellington Avenue, Suite 100 Santa Ana, Ca 92701

Dear Board Members,

It is with great pleasure that we submit the Comprehensive Annual Financial Report (CAFR) of the Orange County Employees Retirement System (OCERS or System) as of and for the year ended December 31, 2012, the System's 68th year of operation.

### **OCERS**

OCERS is a public retirement system that provides service retirement, disability, death and survivor benefits, administered in accordance with the County Employees Retirement Law of 1937 (Government Code Section 31450, et seq.), to its members. There are 20 systems in counties across the State of California regulated by the County Employees Retirement Law of 1937. These systems have provided secure retirement income that has supported the state's economy for sixty-eight years.

Pursuant to certain provisions of the County Employees Retirement Law, OCERS is an independent district within the County of Orange, with a separate operating budget and professional staff. The California Constitution gives the Board of Retirement plenary authority over the administration of the system, which includes administering plan benefits and managing the System's assets. The Board of Retirement and OCERS' staff members are committed to act for the exclusive benefit of the plan and its participants, manage the assets of the plan prudently and administer benefits with impartiality. To fulfill this mandate, OCERS employs a skilled professional staff and independent consultants that operate under a robust system of governance, operational and fiduciary policies and procedures.

Currently, OCERS' participating agencies include the County of Orange, one city, ten active special districts, two special districts with active employees that are closed to new members and one special district with deferred members.

We are fortunate to be associated with a county that has so much to offer those that choose to live, work and play here. As such, we have chosen the theme for this year's CAFR to be "Orange County Gold," paying homage to some of the many historical wonders of Orange County. The man who inspired this theme, Huell Howser, was a big fan of Orange County and featured many of our County's treasures in his iconic series, *California Gold*. Sadly, Mr. Howser passed away in 2012 and as a tribute to his passion for finding the hidden treasures of California, we have "hidden" his image in one of the Orange County wonders highlighted in this CAFR.

(Continued)

### Management Responsibility of Financial Reporting

OCERS' management is responsible for the complete and fair presentation of the financial information in accordance with generally accepted accounting principles (GAAP) in the United States. To the best of our knowledge, the enclosed data is accurate in all material respects and is reported in a manner designed to fairly present the financial position and operating results of OCERS.

### **OCERS' Mission Statement and Objectives**

The role of OCERS is to provide secure retirement and disability benefits, quality information concerning those benefits, and prompt, professional and courteous service that meets the highest standards of excellence. In carrying out that role, the Board of Retirement and staff are committed to act for the exclusive benefit of the plan and its participants, manage assets of the plan prudently, and administer benefits with impartiality.

In fulfilling our mission as a retirement system, OCERS' objectives are:

- 1. Excellent customer service, providing
- 2. Timely and accurate benefits, based on
- 3. Secure and reliable data, funded by
- 4. Prudently managed investments, guided by
- 5. Professional plan administration

### Major Initiatives and Significant Events

The following were major initiatives and significant events in the past year:

- Lawmakers in Sacramento passed Assembly Bill 340 (AB 340), known as the California Public Employees' Pension Reform Act (PEPRA), which was signed into law in September 2012, creating three new lower benefit formulas for employees entering OCERS on or after January 1, 2013: 2.5% @ 67 PEPRA General; 2.7% @ 57 PEPRA Safety; and 1.62% @ 65 PEPRA.
- OCERS Legal team performed an extensive analysis of AB 340 and created a detailed summary of the legislative language's impact on OCERS' members and plan sponsors, as well as provided extensive outreach to explain the impact of AB 340.
- In conjunction with the issuance of GASB Statement No. 67, Financial Reporting for Pension Plans, effective for periods beginning after June 15, 2013, OCERS will be adopting an actuarial funding policy and as part of this policy, has begun exploring the possibility of reducing the amortization of its Unfunded Actuarial Accrued Liability (UAAL) for any future assumption or method changes from its current 30 year amortization period to a 25 year amortization period which it will consider adopting at its June 2013 Board meeting.
- After completing a competitive selection process, OCERS appointed Girard Miller as its new Chief Investment Officer, as well as filled several other vacancies on its organizational chart, including a new Director of Finance, Director of Information Technology, Human Resources Manager, two Financial Reporting Managers, Information Technology Administrative Manager, Member Services Division Analyst and an Internal Auditor.
- Continued progress on the multi-year implementation of a new Pension Administration System Solution (PASS), including performing an extensive detailed assessment of the project and successfully transitioning the PASS Project Management to a new team directed by OCERS' Information Technology Director.
- Implemented an agency-wide internal control enhancement program and completed a centralized folder of written policies and procedures, providing a single source for internal control reference and application.
- Hired CEM Benchmarking to begin benchmarking of the Strategic Plan to ensure progress is quantifiable and measurable over a three-year horizon.

(Continued)

- Developed and implemented an electronic Board agenda packet, including the monthly disability agenda, in a format usable with iPads.
- Hired a new investment consultant, Aksia LLC, to provide hedge fund consulting services.
- Provided extensive member outreach, including 34 seminars and five instructional/informational videos for the web site.
- Processed 658 new retirement applications.

### **Accounting Systems and Reports**

OCERS' management is responsible for establishing a system of internal controls to safeguard assets and to guide us in the presentation of the accompanying basic financial statements. Oversight is provided by OCERS' internal auditing staff and OCERS' Audit Committee. Macias Gini & O'Connell, LLP (MGO) audited the accompanying basic financial statements and related disclosures. The financial audit provides reasonable assurance that OCERS' financial statements are presented in conformity with GAAP and are free from material misstatement. Internal controls are reviewed to ensure OCERS' operating policies and procedures are being adhered to and are sufficient to safeguard OCERS' assets. OCERS recognizes even sound internal controls have inherent limitations. OCERS' internal controls are designed to provide reasonable, but not absolute, assurance these objectives are met. The concept of reasonable assurance recognizes that the cost of a control should not exceed the benefits likely to be derived and that the valuation of costs and benefits requires estimates and judgments by management.

The CAFR was prepared in accordance with GAAP and reporting guidelines set forth by the Governmental Accounting Standards Board (GASB) and the County Employees Retirement Law of 1937. GAAP requires that management provide a narrative introduction, overview, and analysis to accompany the basic financial statements in the form of management's discussion and analysis (MD&A). This letter of transmittal is designed to complement the MD&A and should be read in conjunction with it. OCERS' MD&A can be found immediately following the independent auditor's report.

### **Investment Activities**

In accordance with state constitutional mandates, the Board adopts a strategic asset allocation policy designed to ensure diversification among asset classes and achieve OCERS' long-term investment objectives. Although OCERS invests on a long-term horizon, short-term returns are important to keep in mind. At its June 2012 Board Meeting, the Board of Retirement amended OCERS' investment policy to diversify its strategic asset allocation which will increase its holdings in absolute return investments including diversified credit and Global Tactical Asset Allocation (GTAA). In addition, OCERS is in the process of migrating from hedge fund-of-funds investment managers to direct hedge funds. This diversification will better position OCERS' investment portfolio to withstand future potential market fluctuations.

During 2012, the OCERS' investment portfolio returned 12.26%, gross of fees. With the average years of service for a new OCERS' retiree being just over 20, it is good to see that our annualized return over the last 20 years has been 8.22%, well exceeding our assumed earnings rate over the same period.

### Pension Actuarial Funding Status

OCERS maintains a funding goal to establish contributions that fully fund the System's liabilities, and that, as a percentage of payroll, remain as level as possible for each generation of active members. Actuarial valuations are performed annually with actuarial experience investigations conducted triennially in accordance with state statute. The use of realistic assumptions is important in maintaining the necessary funding while paying promised benefits. Each year the actual experience of the System is compared to our assumptions and the differences are studied to determine whether changes in the contribution requirements are necessary. In addition, triennially, the actuarial experience investigation is undertaken to review the actuarial assumptions and compare the actual experience during the preceding three year period with that expected under those assumptions. The last experience

(Continued)

investigation was completed in 2011 for plan years ending in 2008 through 2010, with the exception of the assumed rate of return, which was completed in 2012 for the plan year ending in 2012. OCERS had been using a 7.75% assumed rate of return in its annual actuarial valuations since 2004. In 2011, the Board received a recommendation from the System's actuary to reduce the assumed rate of return to either 7.50% or 7.25%. After a thorough review and lengthy discussions, the Board decided to maintain the existing assumption and revisit the matter in 2012 after they considered the revision to the investment asset allocation policy. Even with the subsequent improved projections for that revised asset allocation then evident, the System's actuary again recommended the System's rate of return be reduced to either 7.50% or 7.25%. The Board adopted 7.25% as the System's assumed rate of return to be effective with the 2012 actuarial valuation. The ensuing cost impact to the employer contribution rate as a result of this assumption change will be phased-in over two years.

At December 31, 2012, OCERS' funding status was 62.52% with a UAAL of \$5.7 billion. Average employer and employee contribution rates for the year ended December 31, 2012, were 31.12% and 10.79%, respectively.

### Budget

The Board of Retirement approves OCERS' annual budget. The 1937 Act limits OCERS' annual administrative expenses, excluding the costs of administration for computer software and hardware and computer technology consulting services (IT costs), to twenty-one hundredths of one percent (0.21%) of OCERS' actuarial accrued liability. OCERS' administrative expense of \$11.3 million, excluding IT costs of \$2.9 million, was .07% of OCERS' actuarial accrued liability.

### Certificate of Achievement

The Government Finance Officers Association of the United States and Canada (GFOA) awarded a Certificate of Achievement for Excellence in Financial Reporting to OCERS for its comprehensive annual financial report for the year ended December 31, 2011. In order to be awarded a Certificate of Achievement, a government must publish an easily readable and efficiently organized comprehensive annual financial report. This report must satisfy both generally accepted accounting principles and applicable legal requirements.

A Certificate of Achievement is valid for a period of one year only. We believe that our current comprehensive annual financial report continues to meet the Certificate of Achievement Program's requirements and we are submitting it to the GFOA to determine its eligibility for another certificate.

### Acknowledgements

I would like to take this opportunity to thank the members of the System for their continued confidence in OCERS during the past year. Also, I would like to express my thanks to the Board of Retirement for its dedicated effort in supporting the System throughout this past year. Finally, I would like to thank the staff and consultants for their commitment to OCERS and their diligent work to assure the System's continued success.

Respectfully submitted,

Steve Delaney

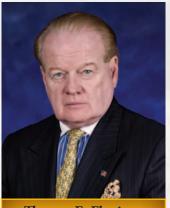
Chief Executive Officer

### Members of the Board of Retirement

As of December 31, 2012



**Russell Baldwin** Chair Elected by General Members



Thomas E. Flanigan Vice Chair Appointed by the Board of Supervisors



Frank E. Eley Elected by General Members



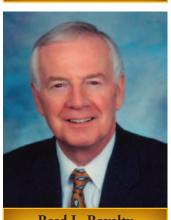
**Robert Griffith** Elected by Retired Members



Appointed by the Board of Supervisors



Wayne Lindholm Appointed by the Board of Supervisors



Reed L. Royalty Appointed by the Board of Supervisors



Shari L. Freidenrich **Ex-Officio Member** Treasurer-Tax Collector County of Orange



Elected by Safety Members



Ray Geagan Alternate elected by Safety Members

# Organization of OCERS

### **Board of Retirement**

The Board of Retirement is responsible for establishing policies governing the administration of the retirement plan, disability determinations, assuring benefit payments, establishing investment policy for the System and monitoring execution of its policies. The Board of Retirement consists of nine members and one alternate. Four members of the Board of Retirement are appointed by the Board of Supervisors of the County; four members are elected by active members of the System of which one is the alternate member; one member is elected by the retirees; and the Treasurer of the County is an ex-officio member.

### Executive

This department consists of the Chief Executive Officer (CEO) who implements and executes policies promulgated by the Board of Retirement. Two Assistant CEOs (one of whom is also General Counsel), an Internal Auditor, and the Chief Investment Officer assist the CEO in the daily operations of the system.

### **Investment Department**

This department is responsible for the administration and management of the investment program, in accordance with policies, regulations, and guidelines set forth by the Board of Retirement. It is responsible for the interface with investment managers, including monitoring investment performance objectives, adherence to investment guidelines, conducting due diligence visits to investment managers' sites, and interviewing prospective investment managers. This department is also responsible for the interface with outside investment consultants in reviewing and evaluating all investment managers' performance and quarterly investment manager fees.

### **External Operations Department**

This department is comprised of the following divisions: Member Services and Communications.

The Member Services Division is responsible for providing all benefit services to the members of the System. This includes benefit calculations, preparation of data to support applications for retirement, preparation of the retiree payroll, processing transmittals, membership counseling, and retirement seminars. The Disability section of Member Services is responsible for reviewing claims and medical records; interviewing applicants and witnesses; preparing written reports of findings and recommendations; and making presentations to the Board of Retirement regarding the disposition of cases.

The Communications Division is responsible for developing and coordinating information for members and plan sponsors through publications, newsletters and producing content for the web site.

### **Internal Operations Department**

This department is comprised of the following divisions: Finance, Information Technology, and Administrative Services.

The Finance Division is responsible for all the financial records and reports of OCERS. This includes the preparation of the Comprehensive Annual Financial Report, monthly and quarterly financial statements and the annual operating budget. The Finance Division also maintains OCERS' system of internal control; processes and accounts for retirement payroll and refunds of contributions and interest to members; collects and accounts for members' contributions; reconciles investment portfolios; and pays costs incurred for goods received and services rendered.

# Organization of OCERS

(Continued)

The Information Technology Division is responsible for OCERS' network systems, personal computers and web site, while providing programming and technical support to our Benefits Administration System. In addition, this division is responsible for the production of retiree payroll disbursements and administering all audio/visual services.

The Administrative Services Division is responsible for providing the contract administration, purchasing, administration of the headquarters building, human resources and labor relations functions of OCERS.

### Legal Department

This department provides legal advice and representation to the Board of Retirement and OCERS on a wide variety of issues. Among other things, this includes issues involving disability retirements, investments, legislation, vendor contracts, and family law.

# Administrative Organization Chart As of December 31, 2012 Board of Retirement Chief Executive Officer Steve Delaney **Internal Auditor David James** Assistant CEO / External and Legal Operations Assistant CEO / Internal Operations Chief Investment Officer Julie Wyne Brenda Shott **Girard Miller** Administrative **Investments** Communications Services Legal Finance Information Member Services **Technology**

### List of Professional Consultants

As of December 31, 2012

### Actuary

The Segal Company

### **Investment Consultants**

Aksia, LLC

New England Pension Consulting (NEPC), LLC

### **Real Estate Consultants**

R.V. Kuhns & Associates, Inc.

### **Independent Auditor**

Macias Gini & O'Connell, LLP

### **Investment Counsel**

Foley and Lardner, LLP

### **Fiduciary Counsel**

Reed Smith, LLP

### **Tax Counsel**

Hanson Bridgett, LLP

### Custodian

State Street Bank

Note: List of Investment Managers is located on page 83 of the Investment Section of this report.

# Certificate of Achievement for Excellence in Financial Reporting



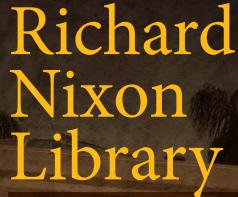
FINANCIAL

Section | II



Yorba Linda, California

Richard Nixon Library



Placentia
Yorba Linda
Fullerton

Buena Park

Anaheim

Orange

Seal
Beach

Huntington
Beach

Irvine

Nixon Presidential Library & Museum is a scenic nine acre site that includes a number of educational exhibitions as well as President Richard Nixon's birthplace, a small home built by his father on a citrus ranch in 1912. Born on January 9, 1913, Richard Nixon and his family lived in the house until 1922 when they moved to nearby Whittier. President Nixon was involved in the planning of the library, and was joined by Former Presidents Gerald Ford and Ronald Reagan as well as then-President George H.W. Bush at its grand opening on July 19, 1990. A crowd of approximately 50,000 gathered for the ceremony. President Nixon was buried beside his wife Pat on the grounds of the Nixon Library on April 27, 1994.

ake Forest

Mission Viej

Laguna
Beach
San Juan
Capistrano

Dana
Point
San
Clemente

### Fun Fact

Army One, the helicopter used by President Nixon that is on permanent display at the library, had also been used by Presidents Kennedy and Johnson before Nixon's administration, and was subsequently used by President Ford too.



RICHARD NIXON
1913 - 1994
III GREATEST HONOR HISTORY CAN HESTO

15 THE TITLE OF PEACEMAKER

# Independent Auditor's Report



Sacramento 3000 S Street, Suite 300 Sacramento, CA 95816 916.928.4600

Walnut Creek

Oakland

LA/Century City

Newport Beach

San Diego

Seatt

ALST AND MUSEUM

### INDEPENDENT AUDITOR'S REPORT

To the Board of Retirement of the Orange County Employees' Retirement System Santa Ana, California

#### Report on the Financial Statements

We have audited the accompanying financial statements of the Orange County Employees Retirement System (the System), California, as of and for the fiscal year ended December 31, 2012, and the related notes to the financial statements as listed in the table of contents. The prior year summarized comparative information has been derived from the System's 2011 financial statements and in our report dated August 1, 2012, we expressed an unqualified opinion on the basic financial statements.

### Management's Responsibility for the Financial Statements

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

#### Auditor's Responsibility

Our responsibility is to express an opinion on these financial statements based on our audit. We conducted our audit in accordance with auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards*, issued by the Comptroller General of the United States. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

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

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

1

MGG

**Proud To Be Boring Accountants:** 

www.mgocpa.com

### Independent Auditor's Report

(Continued)

### Opinion

In our opinion, the financial statements referred to above present fairly, in all material respects, the fiduciary net position of the Orange County Employees Retirement System, California, as of December 31, 2012, and the changes in fiduciary net position for the year then ended in conformity with accounting principles generally accepted in the United States of America.

### **Change in Accounting Principle**

As described in Note 2, the System adopted the provisions of Governmental Accounting Standard Board Statement (GASBS) No. 63, *Financial Reporting of Deferred Outflows of Resources, Deferred Inflows of Resources, and Net Position.* Our opinion is not modified with respect to this matter.

### **Emphasis of Matters**

As described in Note 11, based on the most recent actuarial valuation of the pension plan as of December 31, 2012, the System's independent actuary determined that the value of the System's actuarial accrued liability exceeded the actuarial value of its assets by \$5.7 billion. The most recent actuarial value of assets as of December 31, 2012 does not reflect the remaining deferred investment gains that will be recognized in the future. Our opinion is not modified with respect to this matter.

As described in Note 12, the actuarial value of assets for the County of Orange and Orange County Fire Authority healthcare plans include certain assets held outside of the related health care trusts administered by the System. Our opinion is not modified with respect to this matter.

### Other Matters

### Required Supplementary Information

Accounting principles generally accepted in the United States of America require that the management's discussion and analysis, the Schedules of Funding Progress and the Schedules of Employer Contributions, as listed in the table of contents, be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the Governmental Accounting Standards Board who considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audit of the basic financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

#### Other Information

Our audit was conducted for the purpose of forming opinion on the financial statements. The other supplemental information, introductory, investment, actuarial and statistical sections are presented for purposes of additional analysis and are not a required part of the basic financial statements.

# Independent Auditor's Report

(Continued)

The other supplemental information is the responsibility of management and was derived from and relates directly to the underlying accounting and other records used to prepare the basic financial statements. Such information has been subjected to the auditing procedures applied in the audit of the basic financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the basic financial statements or to the basic financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the other supplemental information is fairly stated, in all material respects, in relation to the basic financial statements as a whole.

The introductory, investment, actuarial and statistical sections have not been subjected to the auditing procedures applied in the audit of the basic financial statements, and accordingly, we do not express an opinion or provide any assurance on those sections.

### Other Reporting Required by Government Auditing Standards

In accordance with Government Auditing Standards, we have also issued our report dated June 4, 2013 on our consideration of the System's internal control over financial reporting and on our tests of its compliance with certain provisions of laws, regulations, contracts, and grant agreements and other matters. The purpose of that report is to describe the scope of our testing of internal control over financial reporting and compliance and the results of that testing, and not to provide an opinion on internal control over financial reporting or on compliance. That report is an integral part of an audit performed in accordance with Government Auditing Standards in considering the System's internal control over financial reporting and compliance.

Macciae Mini & Olombell LLP

Sacramento, California

June 4, 2013

AND MUSEUM

This section presents Management's Discussion and Analysis (MD&A) of Orange County Employees Retirement System's (OCERS or System) financial performance and a summary of OCERS' financial position and activities as of and for the year ended December 31, 2012. It is a narrative overview and analysis that is presented in conjunction with the Chief Executive Officer's Letter of Transmittal, included in Section I – Introductory to this Comprehensive Annual Financial Report. The MD&A should also be read in conjunction with OCERS' basic financial statements as presented in this report. Amounts in this section have been grouped together to facilitate readability.

OCERS is primarily responsible for administering retirement benefits as well as acting as a trustee and custodian for retirement health benefit plan funds that are sponsored by participating employers. OCERS' financial information is comprised of four fiduciary funds: a defined benefit pension trust fund, two other postemployment benefit (OPEB) trust funds for retiree medical plans and an agency fund.

### Financial Highlights

- The net position restricted for pension and other postemployment benefits as of December 31, 2012 and 2011 are \$9.8 billion and \$8.7 billion, respectively.
- The restricted fiduciary net position representing assets available to pay current and future member pension and health care benefits increased \$1.1 billion or 12.2%. The increase in fiduciary net position during 2012 is primarily attributable to a significant growth in the OCERS' investment portfolio and net positive cash flows from contributions and disbursements.
- Total additions to fiduciary net position increased 147.6% in 2012 from \$664.6 million to \$1.6 billion.
  - Net investment and securities lending income increased 1,940.7% from \$49.8 million in 2011 to \$1.0 billion in 2012. The net year-to-date rate of return on investments on a fair value basis was approximately 12.26% in 2012, up from 0.74% return earned in 2011.
  - Contributions received from employers and employees totaled \$629.0 million in 2012, an increase of 2.3% compared to 2011 contributions received of \$614.8 million.
- Total deductions from fiduciary net position increased \$49.8 million from \$535.5 million in 2011 to \$585.3 million in 2012.
  - Member pension benefit payments increased by \$46.3 million or 9.6% in 2012.
  - The number of retired members and beneficiaries receiving a benefit payment increased 5% from 13,289 payees at the end of 2011 to 13,947 as of December 31, 2012
  - The average annual benefit paid to retired members and beneficiaries during 2012 was \$38,020 an increase of 4.4% over the average annual benefit payment of \$36,422 in 2011.
- Based upon the most recent actuarial valuation as of December 31, 2012, prepared by the System's independent actuary, OCERS' funding status for the pension plan, as measured by the ratio of the actuarial value of assets (which smooths market gains and losses over five years) to the actuarial value of liabilities, decreased from 67.03% at December 31, 2011 to 62.52% at December 31, 2012 due primarily to the impact of decreasing the investment assumed rate of return from 7.75% to 7.25%. OCERS' funding status when measured using market value of assets was 63.17% at the end of 2012 compared to 62.60% at the end of 2011.

(Continued)

### Overview of the Financial Statements

This MD&A serves as an introduction and overview of the OCERS' Basic Financial Statements. The Basic Financial Statements and required disclosures are prepared in accordance with accounting principles and reporting guidelines as set forth by the Governmental Accounting Standards Board (GASB). These pronouncements require OCERS to make certain disclosures and to report using the full accrual method of accounting. OCERS' Basic Financial Statements are comprised of the following:

Statement of Fiduciary Net Position - The Statement of Fiduciary Net Position presents the major categories of assets and liabilities and their related value as of December 31; OCERS' fiscal year end. The difference between assets and liabilities, "Net Position Restricted for Pension and Other Postemployment Benefits," represents funds available to pay benefits. The Statement of Fiduciary Net Position includes prior year-end balances for comparative purposes. Increases and decreases in Net Position Restricted for Pension and Other Postemployment Benefits, when analyzed over time, may serve as an indicator of whether OCERS' financial position is improving or deteriorating.

**Statement of Changes in Fiduciary Net Position -** The Statement of Changes in Fiduciary Net Position provides information about the financial activities during the reporting period that increased and decreased Net Position Restricted for Pension and Other Postemployment Benefits. For comparative purposes, prior year-end balances are also provided.

Notes to the Basic Financial Statements - The Notes to the Basic Financial Statements are an integral part of the basic financial statements and provide additional information that is essential to acquire a full understanding of the information provided in the two statements discussed above. The notes include further discussion and details regarding OCERS' key policies, programs, investments and activities that occurred during the year.

Required Supplementary Information - The Required Supplementary Information contains two supporting schedules of historical trend information related to each of the plans reported in the Basic Financial Statements: pension plan, County of Orange's retiree medical plan and Orange County Fire Authority's retiree medical plan. The two schedules presented for each plan are: Schedule of Funding Progress and Schedule of Employer Contributions. The information contained in these schedules is based on actuarial valuations prepared for each benefit plan. The valuation reports include additional actuarial information that contributes to the understanding of the changes in the actuarial funding progress of these defined benefit pension and other postemployment benefit plans over the past six years as presented in the schedules. The actuarial information is based upon assumptions made regarding future events at the time the valuations were performed. Therefore, the amounts presented in the schedules are management's estimates. A summary of factors that affected the trends of the actuarial information is included in this section as well.

Other Supplemental Information - The Other Supplemental Information includes schedules pertaining to OCERS' administrative expenses, investment expenses, professional services and a statement of changes for the agency fund.

NINE AND MUSEUM

(Continued)

### **Financial Analysis**

Table #1 and #2 compare and summarize OCERS' financial activity for the current and prior fiscal years.

# Table #1 Fiduciary Net Position

As of December 31, 2012 and 2011 (Dollars in Thousands)

	12/31/2012	12/31/2011	Increase / (Decrease)	Percentage Change
Assets				
Cash and Cash Equivalents	\$418,141	\$419,392	\$(1,251)	(0.3%)
Securities Lending Collateral	305,096	413,795	(108,699)	(26.3%)
Receivables	388,499	319,637	68,862	21.5%
Investments	9,501,481	8,624,233	877,248	10.2%
Capital Assets	12,781	6,862	5,919	86.3%
Total Assets	10,625,998	9,783,919	842,079	8.6%
Liabilities				
Obligations Under Securities Lending Program	305,096	413,795	(108,699)	(26.3%)
Securities Purchased	308,635	438,367	(129,732)	(29.6%)
Other	261,278	238,756	22,522	9.4%
Total Liabilities	875,009	1,090,918	(215,909)	(19.8%)
Net Position Restricted for Pension and Other Postemployment Benefits	\$9,750,989	\$8,693,001	\$1,075,988	12.2%

As of December 31, 2012, OCERS held net position of \$9.8 billion restricted for pension and other postemployment benefits. Total assets increased \$842.1 million or 8.6% from 2011. The increase in assets is attributed to appreciation in fair value of investments, which due to a global wave of stimulative policy, including monetary easing by central banks in the United States and Europe, resulted in higher investment portfolio performance compared to 2011. The increase in receivables from the prior year is primarily attributed to the timing of investments relating to unsettled trades that occurred close to year end. Additionally, contributions receivable added to the overall increase in receivables by \$2.6 million due to an increase in contribution rates that went into effect July 1, 2012, as well as the timing of the year-end payroll which had an additional day accrued in 2012 compared to 2011. These increases in receivables are slightly offset by a decrease of \$4.7 million in foreign currency forward contracts (net) attributed to fair market value fluctuations based on changes in the foreign currency exchange rates. Capital assets increased \$5.9 million due to continued progress in implementing the new Pension Administration System (V3) and the reclassification of \$2.3 million, net of accumulated depreciation, for the portion of the OCERS' headquarters building used for plan administration from real estate investments to capital assets in accordance with the predominant use philosophy underlying GASB Statement No. 25, Financial Reporting for Defined Benefit Plans and Note Disclosures for Defined Contribution Plans.

(Continued)

The decrease in total liabilities is primarily a result of a reduction in securities purchased due to unsettled fixed income security purchases that occurred in the prior year, as well as obligations under the securities lending program which also has a corresponding decrease in securities lending collateral. The decrease in the securities lending program is attributed to the fiscal crisis in Europe which put a ban on short-selling across some of the local markets including Greece, Italy, Portugal and Spain, in an attempt to avert a market collapse. This restricted the ability to lend OCERS' securities and subsequently receive and invest the off-setting collateral. Other liabilities include unearned contributions which increased from the prior year due to the early receipt of prepaid contributions at year-end related to fiscal year 2013. The overall increase in other liabilities is also attributed to an increase in retiree payroll payable due to an increase in the total number of OCERS' retired members receiving a pension and an increase in the average benefits received.

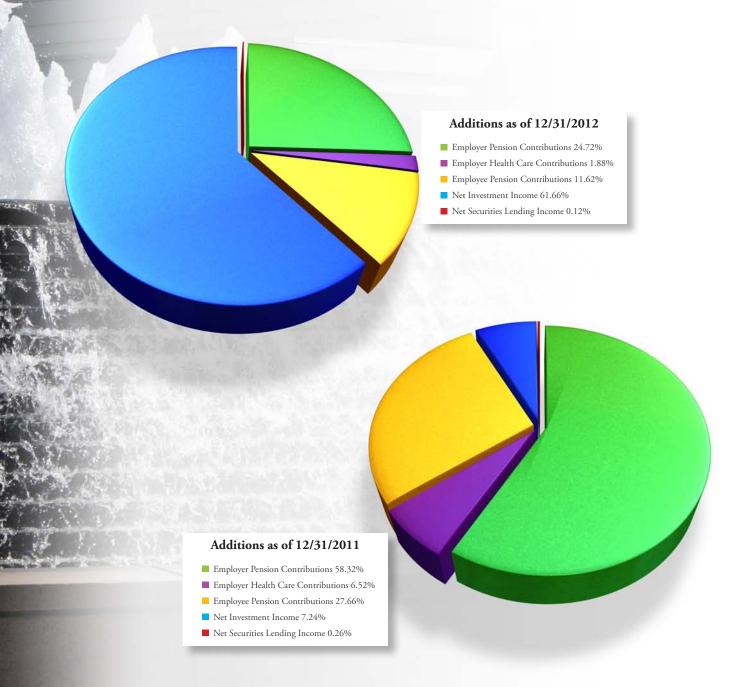
### Table #2 Changes in Fiduciary Net Position

For the Years Ended December 31, 2012 and 2011 (Dollars in Thousands)

	12/31/2012	12/31/2011	Increase / (Decrease)	Percentage Change
Additions				-
Employer Pension Contributions	\$406,805	\$387,585	\$19,220	5.0%
Employer Health Care Contributions	30,985	43,354	(12,369)	(28.5%)
Employee Pension Contributions	191,215	183,820	7,395	4.0%
Net Investment Income	1,014,807	48,105	966,702	2,009.6%
Net Securities Lending Income	2,031	1,724	307	17.8%
Total Additions	1,645,843	664,588	981,255	147.6%
Deductions				
Participant Benefits – Pension	530,269	484,012	46,257	9.6%
Participant Benefits – Health Care	29,893	28,899	994	3.4%
Death Benefits	788	863	(75)	(8.7%)
Member Withdrawals and Refunds	10,097	8,874	1,223	13.8%
Administrative Expenses – Pension	14,209	12,828	1,381	10.8%
Administrative Expenses – Health Care	28	27	1	3.7%
Total Deductions	585,284	535,503	49,781	9.3%
Increase in Net Position Restricted for Pension and Other Postemployment Benefits	1,060,559	129,085	931,474	721.6%
Net Position Restricted for Pension and Other Postemployment Benefits				TEN CONTRACTOR
Beginning of the Year, as Previously Reported	8,693,001	8,563,916		
Restatement of Net Position	(2,571)			
Beginning of the Year, as Restated	8,690,430	8,563,916		
End of Year	\$9,750,989	\$8,693,001		

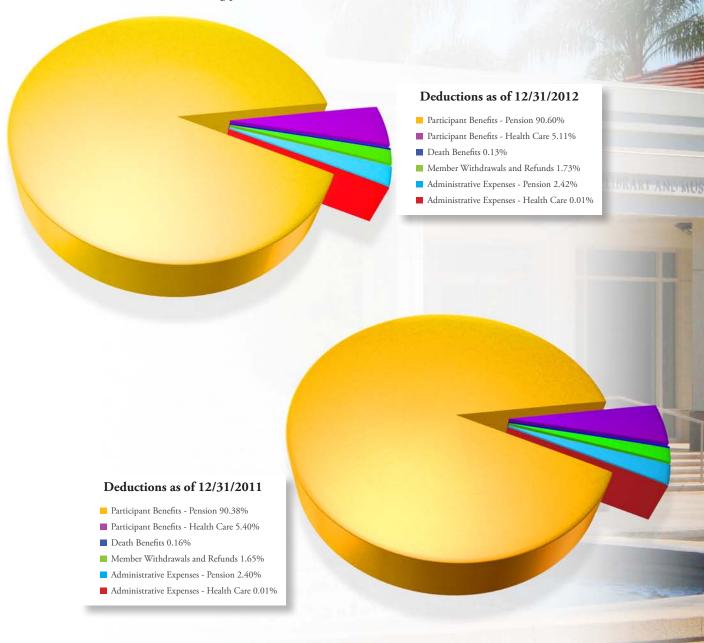
(Continued)

Additions to Fiduciary Net Position - Additions to fiduciary net position increased 147.6% in 2012. Total additions for the year ended December 31, 2012 were \$1.6 billion compared to \$664.6 million for the same period in 2011. The primary reason for the increase was due to significantly higher net investment income due to a strong performance in the investment portfolio in 2012. Stimulative policies in the United States and Europe, as well as valuation normalization following the portfolio's poor performance in 2011 resulted in OCERS' investment portfolio returning 12.26% in 2012, compared to just 0.74% in 2011. Total employer and employee pension contributions also increased by 5.0% and 4.0%, respectively, as a direct result of increases in the average employer and employee contribution rates. The decrease in employer health care contributions of \$12.4 million is due to the County of Orange making a smaller contribution to the retiree health care plan in the current year.



(Continued)

**Deductions from Fiduciary Net Position** - Deductions from fiduciary net position increased 9.3% compared to the prior year due to the continued and anticipated growth in member pension benefit payments, both in the total number of OCERS' retired members receiving a pension benefit and an increase in the average benefit received. Administrative expenses for the year ended December 31, 2012 increased 10.8% due to an increase in salaries as a result of filling positions in 2012 that were vacant in 2011.



Beginning net position restricted for pension and other postemployment benefits has been restated by \$2.6 million related to the recognition of prior years' accumulated depreciation as a result of reclassifying the OCERS' headquarters building used for plan administration from real estate investment to capital assets as previously discussed under Table #1: Fiduciary Net Position. See Note 7 to the Basic Financial Statements for further discussion.

(Continued)

### **OCERS** Membership

The table below provides comparative OCERS' membership data for the last two fiscal years:

### Table #3 Membership Data

As of December 31, 2012 and 2011

	12/31/2012	12/31/2011	Increase / (Decrease)	Percentage Change
Active Members	21,289	21.421	(132)	(0.6%)
Retired Members	13,947	13,289	658	5.0%
Deferred Members	_4,382	_4,406	(24)	(0.5%)
Total Membership	39,618	39,116	502	1.3%

Total OCERS' membership increased during 2012 with a net increase of 502 members. The number of active members declined by 132 or 0.6%, while the number of retirees increased by 658 or 5.0% suggesting that as members have chosen to retire from their careers, employers have not replaced all of them with new employees. During the tough economic times, employers are faced with strained budgets and have held back on filling open positions.

### **Actuarial Valuations**

In order to determine whether Net Position Restricted for Pension Benefits will be sufficient to meet future obligations, a calculation of the actuarial funded status is required. An actuarial valuation includes an appraisal of both the assets available to pay future benefits and the liabilities of the system, which represent the actuarial present value of all future benefits expected to be paid for each member. The purpose of the valuation is to determine the amount of future contributions by the employees (members) and employers (plan sponsors) needed to pay all expected future benefits. OCERS utilizes an independent actuarial firm, The Segal Company (Segal), to prepare an annual valuation.

In order to prepare the valuation, the actuary must use several assumptions with regards to OCERS' members such as their life expectancy, projected salary increases over time, and the age in which members will retire. The actuary must also utilize assumptions with regards to how the assets will perform over time. A key assumption in this regard is the expected rate of return. OCERS has used an assumed rate of return of 7.75% in its annual actuarial valuations since 2004, but at the recommendation of Segal, the Board of Retirement decreased the assumed rate of return to 7.25% as of the December 31, 2012 actuarial valuation. The cost impact reflected in the employer contribution rate as a result of this assumption change will be phased-in over two years. All assumptions used by the actuary are reviewed and adjusted, as required, on a triennial basis by the Board of Retirement.

In the actuarial valuation for the pension plan as of December 31, 2012, the ratio of the valuation value of assets to actuarial accrued liabilities decreased from 67.03% to 62.52%, primarily as a result of reducing the investment assumed rate of return. Another significant contribution factor to the lower funding status was the final year of smoothing in the investment losses incurred in 2008. The calculation of funding status takes into account OCERS' policy to smooth the impact of market volatility by spreading each year's gains or losses over five years. Using the market value of assets as of the valuation date the funded status of OCERS' pension plan increased from 62.60% in 2011 to 63.17% in 2012.

(Continued)

During 2012, the Public Employees Pension Reform Act (PEPRA) was signed into law, resulting in the creation of three new benefit formulas for employees entering OCERS on or after January 1, 2013: 2.5% @ 67 PEPRA - General; 2.7% @ 57 PEPRA - Safety; and 1.62% @ 65 PEPRA. New plan provisions include a limit on pensionable income, three year final average salary, and new cost sharing by members. Actual PEPRA members will not be reported until the next valuation as of December 31, 2013.

On June 25, 2012, GASB approved Statement No. 67, *Financial Reporting for Pension Plans*, and is effective for financial statements for periods beginning after June 15, 2013. As a result of this pronouncement, OCERS will be required to adopt an actuarial funding policy. With guidance from Segal, the Board of Retirement is exploring reducing the amortization of its Unfunded Actuarial Accrued Liability (UAAL) for any future assumption or method changes from its current 30 year amortization period to a 25 year amortization period. The Board will be making a decision whether to adopt this change at its June 2013 Board meeting.

### **Investment and Economic Summary**

During 2012, the U.S. economy and global markets continued their gradual recovery from the lows realized in 2008 and 2009. While overall Gross Domestic Product (GDP) growth was modest and considerable political and economic uncertainties remain, including unemployment which continued to hover around 8.0%, the investment markets experienced strong returns, particularly in equities and credit. Real estate also continued to improve, primarily due to historically low interest rates.

At its June 2012 Board Meeting, OCERS' Board of Retirement amended its investment policy to diversify its strategic asset allocation, including decreasing its holdings in international equity securities, domestic and international fixed income, and real return investments and increasing its holdings in the areas of diversified credit and Global Tactical Asset Allocation (GTAA). In addition, OCERS is migrating from hedge fund-of-funds investment managers to approximately 15 hedge funds which it will invest directly. This diversification will better position OCERS' investment portfolio to withstand future potential market fluctuations.

OCERS' investment return for 2012 was 12.26%, primarily due to the performance of its international equity and fixed income asset classes. The rate of return on OCERS' investment portfolio is an integral component of the annual additions to the pension plan as total investment income is typically the largest contribution to the plan's annual additions to retirement plan assets. Net investment income added over \$1 billion to plan assets in 2012.

### Request for Financial Information

This Comprehensive Annual Financial Report is designed to provide the Board of Retirement, plan members, taxpayers and investment managers with a general overview of OCERS' finances and to demonstrate OCERS' accountability for the funds under its stewardship.

Please address any questions about this report or requests for additional information to:

Orange County Employees Retirement System 2223 East Wellington Avenue, Suite 100 Santa Ana, CA 92701

26

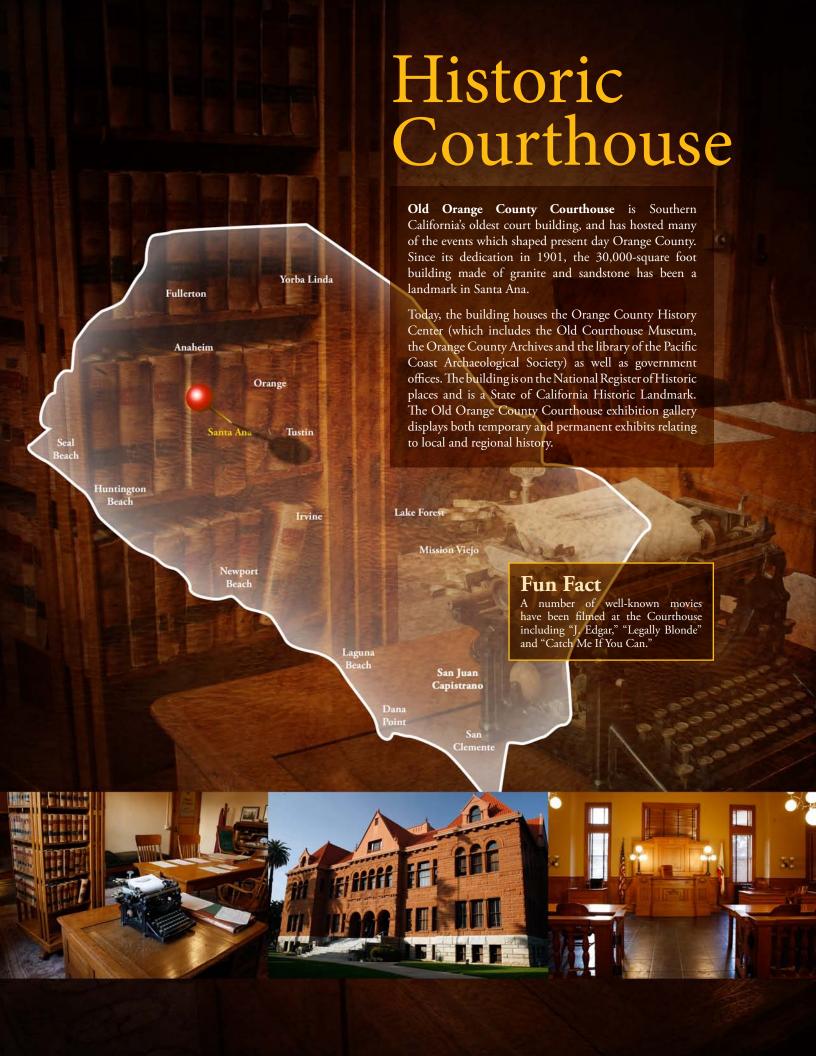
# FINANCIAL STATEMENTS

Section |



Santa Ana, California

Historic Courthouse



ORANGECOUN

EMPLOYEES RETIREMENT SYST

# Statement of Fiduciary Net Position

As of December 31, 2012 (with summarized comparative amounts for December 31, 2011) (Dollars in Thousands)

	Pension	Health Care	Health Care	OPEB 115		Comparative Totals
	Trust Fund	Fund - County	Fund - OCFA	Agency Fund	Total Fund	2011
Assets						
Cash and Short-Term Investments						
Cash and Cash Equivalents	\$412,926	\$4,433	\$747	\$35	\$418,141	\$419,392
Securities Lending Collateral	301,316	3,235	545		305,096	413,795
Total Cash and Short-Term Investments	714,242	7,668	1,292	35	723,237	833,187
Receivables						
Investment Income	21,951	236	40	-	22,227	23,754
Securities Sales	130,600	1,402	236	-	132,238	269,907
Contributions	13,340	-	-	-	13,340	10,692
Foreign Currency Forward Contracts (Net)	9,207	99	17	-	9,323	13,997
Other Receivables	208,752	2,241	378		211,371	1,287
Total Receivables	383,850	3,978	671	-	388,499	319,637
Investments at Fair Value						
Domestic Equity Securities	1,609,022	17,272	2,911	10,038	1,639,243	1,457,585
International Equity Securities	2,021,844	21,704	3,658	4,715	2,051,921	1,649,571
Global Equity Securities	429,678	4,612	777	-	435,067	349,446
Domestic Bonds	2,372,586	25,469	4,293	10,086	2,412,434	2,441,246
Foreign Bonds	654,300	7,024	1,184	-	662,508	659,028
Real Estate	955,378	10,256	1,728	-	967,362	835,844
Alternative Investments	_1,316,432	14,131	2,383		1,332,946	<u>1,231,513</u>
Total Investments at Fair Value	9,359,240	100,468	16,934	24,839	9,501,481	8,624,233
Capital Assets, Net	12,781			=	12,781	6,862
Total Assets	10,470,113	112,114	18,897	24,874	10,625,998	9,783,919
Liabilities						
Obligations Under Securities Lending Program	301,316	3,235	545	-	305,096	413,795
Securities Purchased	304,812	3,272	551	-	308,635	438,367
Unearned Contributions	177,347	-	-	-	177,347	162,873
Retiree Payroll Payable	45,305	2,323	221	-	47,849	43,711
Other	11,069	119	20	-	11,208	9,847
Due to Employers				<u>24,874</u>	<u>24,874</u>	<u>22,325</u>
Total Liabilities	839,849	_8,949	_1,337	<u>24,874</u>	875,009	1,090,918
Net Position Restricted for Pension and Other Postemployment Benefits	\$9,630,264	\$103,165	\$17,560	\$-	\$9,750,989	\$8,693,001

The accompanying notes are an integral part of these financial statements.

# Statement of Changes in Fiduciary Net Position

For the Year Ended December 31, 2012 (with summarized comparative amounts for December 31, 2011)

(Dollars in Thousands)

	Pension Trust Fund	Health Care Fund-County	Health Care Fund-OCFA	Total Fund	Comparative Totals 2011
Additions					
Contributions Employer Employee	\$406,805 _191,215	\$27,395	\$3,590 	\$437,790 _191,215	\$430,939 _183,820
Total Contributions	598,020	27,395	3,590	629,005	614,759
Investment Income Net Appreciation/(Depreciation)					
in Fair Value of Investments Interest on:	841,508	8,577	1,443	851,528	(167,086)
Domestic and Foreign Bonds Cash with County Treasurer	75,852 5	814	138	76,804 5	82,293 18
Domestic Dividends	12,740	137	23	12,900	13,692
International Dividends	46,479	499	85	47,063	84,274
Real Estate Income	51,898	557	95	52,550	61,348
Alternative Investments	14,522	156	26	14,704	11,078
Less: Investment Management Fees	(31,578)	(339)	(58)	(31,975)	(29,956)
Foreign Income Tax Expense/Other	(9,776)	(105)	(18)	(9,899)	(9,667)
Securities Lending Revenue	2,837	30	5	2,872	2,456
Less: Securities Lending Fees	(830)	(9)	(2)	(841)	(732)
Net Securities Lending Revenue	2,007	21	3	2,031	1,724
Commission Recapture-Net/Other	1,113	12	2	1,127	2,111
Net Investment Income	1,004,770	_10,329	_1,739	1,016,838	49,829
Total Additions	1,602,790	37,724	5,329	1,645,843	664,588
Deductions					
Participant Benefits	530,269	27,089	2,804	560,162	512,911
Death Benefits	788	-	-	788	863
Member Withdrawals and Refunds Administrative Expenses	10,097 14,209	19	9	10,097 14,237	8,874 12,855
Total Deductions	555,363	27,108	2,813	585,284	535,503
Net Increase	1,047,427	_10,616	<u>2,516</u>	1,060,559	_129,085
Net Position Restricted For Pension and Other Postemployment Benefits, Beginning of Year, as Previously Reported	8,585,408	92,549	15,044	8,693,001	8,563,916
· · · · · · · · · · · · · · · · · · ·		92,949	1),044		0,705,910
Restatement of Net Position	(2,571)			(2,571)	
Net Position Restricted For Pension and Other Postemployment Benefits, Beginning of Year, as Restated	8,582,837	92,549	<u>15,044</u>	8,690,430	<u>8,563,916</u>
Ending Net Position	\$9,630,264	\$103,165	\$17,560	\$9,750,989	\$8,693,001

The accompanying notes are an integral part of these financial statements.

### Note 1 – Plan Description

The Orange County Employees Retirement System (OCERS or System) was established in 1945 under the provisions of the County Employees Retirement Law of 1937 (CERL). OCERS is governed by a ten-member Board of Retirement, nine voting members and one alternate member. Board membership consists of four members appointed by the County of Orange Board of Supervisors, five members elected by the members of the System, including an alternate, two by the general members, one by the safety members, and one by the retired members. Safety members also elect the alternate member. The County of Orange Treasurer Tax-Collector, elected by the voters registered in the county, serves as an Ex-Officio member.

OCERS operates as a cost sharing multi-employer defined benefit pension plan for the County of Orange, City of San Juan Capistrano, and thirteen special districts: Orange County Cemetery District, Orange County Children and Families Commission, Orange County Department of Education, Orange County Employees Retirement System, Orange County Fire Authority, Orange County In-Home Supportive Services Public Authority, Orange County Local Agency Formation Commission, Orange County Public Law Library, Orange County Sanitation District, Orange County Superior Court, Orange County Transportation Authority, Transportation Corridor Agencies and the University of California, Irvine Medical Center and Campus. The Orange County Department of Education and the University of California, Irvine Medical Center and Campus are closed to new member participation. OCERS is legally and fiscally independent of the County of Orange.

### Pension Plan Membership

OCERS provides retirement, disability and death benefits to general and safety members. Safety membership includes those members serving in active law enforcement, fire suppression and as probation officers. General membership applies to all other occupations. Plan retirement benefits are tiered based upon date of OCERS membership. Those who became members prior to September 21, 1979 are Tier I members. All other members are Tier II. Within a tier there are various benefit formulas in which members participate. All regular employees scheduled to work 20 hours or more per week become members of the plan upon commencing employment with one of OCERS' plan sponsors, except for certain elected officials who have to elect to participate in OCERS. Active members are categorized as vested in the chart below upon accumulating five years of accredited service or attaining the age of 70. Further information regarding benefit eligibility is described under Deferred Members Benefits.

Additional information regarding the pension plan's benefit structure is included in the Summary Plan Description that is available on the web at www.ocers.org/member\_active/spd.htm.

### **OCERS Membership**

As of December 31, 2012

Active Members	
Vested	18,042
Non-Vested	3,247
Total Active Members	21,289
Retired Members & Beneficiaries	13,947
Deferred Members	4,382
Total Membership	39,618

### Note 1 – Plan Descriptions (Continued)

#### Member Retirement Benefits

Members with ten or more years of service credit are entitled to receive a retirement allowance beginning at age 50, at any age with thirty years of service credit (twenty years service credit for safety members), or if a part-time employee at age 55 or older with five or more years of service credit and at least ten years of active employment with a sponsoring agency covered by OCERS. Members attaining age 70 are eligible to retire regardless of credited service. Benefits received are determined by member rate group or benefit classification. Member rate groups and benefit plans as of December 31, 2012 are as follows:

Rate Group	Plan Type	Benefit Formula per Year of Service	Sponsoring Agencies Include
#1	General	2.0%@57 & 1.67%@57.5	County of Orange
#2	General	2.7%@55 & 1.62%@65	County of Orange OC Superior Court
#3	General	2.5% @55 & 1.64%@57	OC Sanitation District OC Law Library
#5	General	2.0%@57 & 1.67%@57.5	OC Transportation Authority
#6	Safety	3.0%@50	County of Orange (Probation)
#7	Safety	3.0%@50 & 3.0%@55	County of Orange (Law Enforcement)
#8	Safety	3.0%@50 & 3.0%@55	OC Fire Authority
#9	General	2.0%@55	Transportation Corridor Agency
#10	General	2.0% @ 55 & 2.7%@55	OC Fire Authority
#11	General	2.0%@55	OC Cemetery

### Public Employees Pension Reform Act (PEPRA)

During 2012, the Public Employees Pension Reform Act (PEPRA) was signed into law, resulting in the creation of three new benefit formulas for employees entering OCERS on or after January 1, 2013: 2.5% @ 67 PEPRA - General; 2.7% @ 57 PEPRA - Safety; and 1.62% @ 65 PEPRA. New plan provisions include a limit on pensionable compensation, three year final average salary, and new cost sharing by members. Actual PEPRA members will not be reported until the next valuation as of December 31, 2013.

#### **Deferred Member Benefits**

If a member terminates, the member is entitled to withdraw the employee contributions made, together with accumulated interest, unless the member enters a reciprocal retirement system within 180 days and elects to leave their accumulated contributions on deposit with OCERS and receive a deferred retirement allowance when eligible. There are different deferred retirement eligibility requirements for members with less than five years of service when terminating and leaving funds on deposit. It is possible for these members to earn a deferred retirement allowance upon attaining the age of 70, or upon accumulating reciprocal service. Members who terminate and defer with five or more years of service may become eligible for a service retirement allowance when they would have accrued ten years of service and attain the age of 50 or greater.

### Note 1 – Plan Descriptions (Continued)

### **Disability Benefits**

Members found by the Board of Retirement to be permanently incapacitated from the performance of their job are eligible for disability retirement benefits. A disability retirement benefit may either be service-connected or nonservice-connected. Members applying for nonservice-connected disability must have five or more years of eligible service credit. There are no service credit requirements for members applying for service-connected disability benefits, but the disabling condition must be a result of injury or disease arising out of or in the course of the member's employment.

#### **Death Benefits**

Death benefits are payable to eligible beneficiaries of OCERS members. Eligible beneficiaries of retired members may receive a percentage of a deceased member's retirement allowance based upon the retirement option selected by the member at the time of retirement. The beneficiary of a retired member will also receive a \$1,000 burial allowance.

Survivor benefits for members who die prior to retirement are dependent upon a number of factors including whether or not the member was eligible for a service retirement or disability retirement at the time of death, and whether the death was job related. The eligible beneficiary of a member who is not eligible for service retirement or disability retirement is eligible to receive the member's accumulated contributions plus one month's salary for each year of creditable service, subject to a maximum of six month's salary. The eligible beneficiary of a member who is entitled to receive a service retirement or disability retirement, in lieu of the benefit described above, may elect to receive a monthly retirement allowance equal to 60% of the monthly allowance the member would have received for a non-service connected disability as of the date of death, or a monthly allowance equal to 50% of the member's monthly compensation if the death was found to be service-connected.

### Cost-of-Living Adjustments

Retired member monthly allowances will be adjusted annually in accordance with changes in the cost-of-living, as determined by the average annual change in the Consumer Price Index (CPI) for the prior calendar year. The cost-of-living adjustment is limited to a maximum increase or decrease of three percent per year as established by the Board of Retirement. The 2012 cost-of-living adjustment ranged from 2% to 3% based on the date benefit recipients began receiving benefits.

#### STAR COLA

Retired members and eligible beneficiaries who have lost more than 20% of their original retirement benefit's purchasing power due to inflation are eligible to receive the STAR COLA (Supplemental Targeted Adjustment for Retirees Cost of Living Adjustment). STAR COLA benefits are reviewed annually by the Board of Retirement and currently only those members that retired on or before April 1, 1981 are eligible to receive the STAR COLA benefit.

### Postemployment Health Care Plans

OCERS serves as trustee for the County of Orange and Orange County Fire Authority (OCFA) postemployment health care plan trusts established under Internal Revenue Code section 401(h) which are reported as other postemployment benefit trust funds in OCERS' annual financial statements. Health care assets for the 401(h) plans are commingled with pension trust assets for investment purposes and are used exclusively to pay health allowances to eligible retired members of the County of Orange and the OCFA.

In order to be eligible for the County of Orange's Health Care Plan, retired County of Orange members must have completed at least 10 years of continuous County service, be enrolled in a County sponsored health care plan and/or Medicare and be eligible to receive a monthly retirement benefit from OCERS. In 2012, retired

### Note 1 – Plan Descriptions (Continued)

County of Orange members received \$19.33 per year of County service, with the maximum monthly benefit equaling \$483.25 for 25 or more years of credited service. Retired County of Orange members represented by the AFSCME (American Federation of State, County and Municipal Employees) received \$21.28 per year of County service, with the maximum monthly benefit equaling \$532.00 for 25 or more years of credited service.

### Postemployment Health Care Plan Membership County of Orange

June 30,2011

#### **Active Participants**

#### **Retired Participants**

General Members	
AFSCME	119
Non-AFSCME	6,140
Safety Members	
Probation	283
AOCDS	733
LEM	121
Total Retired Participants	7,396
Total Plan Participants*	25,324

<sup>\*</sup>Membership count based upon latest actuarial valuation.

### Note 1 – Plan Descriptions (Continued)

All retirees and full-time employees hired prior to January 1, 2007, are eligible to participate in the OCFA Health Care Plan. Eligible employees who are credited with at least one year of service are eligible to receive Plan benefits upon retirement. Participants must be covered under a qualified health plan, Medicare or a recognized health insurance plan. In 2012, retired OCFA members received \$21.02 per year of creditable service, with a maximum monthly benefit of \$525.50 based upon 25 or more year of creditable service.

# Postemployment Health Care Plan Membership OCFA

July 1, 2012

Active Participants 804
Retired Participants and Surviving Spouses 471
Terminated Participants 9

Total Plan Participants\*

1,284

Assets are allocated on the Statement of Fiduciary Net Position between the Pension Plan and the two 401(h) Health Care Plans based upon pro-rata shares after balances and transactions specific to the respective plans are assigned. Contributions and benefit payment information for the Pension Plan and individual Health Care Plans are readily identified; however, investment income must be allocated and is based upon the individual Health Care Plan's pro-rata share of total fund assets.

In addition to serving as Trustee for the two 401(h) health care plans, OCERS also provides investment advisory services to the Orange County Transportation Authority (OCTA) and the OCFA Health Care Plans pursuant to agreements established in accordance with Internal Revenue Code section 115 (115 Plans). The OCTA 115 plan provides postemployment health care benefits to retired members with at least 10 years of OCTA service. The OCFA 115 plan was established, in part, to provide OCFA with an option to add contributions to its employer health care plan in excess of the contribution subordination limit described in section 401(h). Investments for the two section 115 plans are not commingled with those of the pension plan and 401(h) plan trusts, but rather are invested in separately managed index funds.

An Agency Fund is used to account for Health Care Plan assets held by OCERS in an investment capacity with the assets reported being offset by a liability for the resources held on behalf of the OCFA and OCTA. Additional information regarding the OCTA and OCFA Health Care Plans is available by contacting the respective agencies.

<sup>\*</sup>Membership count based upon latest actuarial valuation.

### Note 2 – Summary of Significant Accounting Policies

### **Basis of Accounting**

The accompanying financial statements have been prepared on the accrual basis and in accordance with accounting principles generally accepted in the United States. Member and employer contributions are recognized in the period in which contributions are due, and benefits and refunds are recognized when due and payable in accordance with plan terms. Unearned contributions represent pre-paid employer contributions that will be recognized as an addition to plan net position in future periods. Investment income is recognized as revenue when earned. The net appreciation/(depreciation) in the fair value of investments is recorded as an increase/(decrease) to investment income based upon investment valuations, which includes both realized and unrealized gains and losses on investments.

#### **Investment Valuation**

State Street Bank and Trust (State Street) maintains custody of the majority of OCERS' investments held as of December 31, 2012. Investments are authorized by state statute and OCERS' investment policy and consist of domestic and international fixed income, domestic, international, global (includes both domestic and international investments) and emerging market equities, private equity, real return strategies, absolute return strategies, opportunistic strategies and real estate. Investments are reported at fair value and the overall valuation process and information sources by major asset classification are as follows:

Cash and Short-Term Investments - Cash and short-term investments represent funds held in operating accounts with State Street, Wells Fargo Bank and include deposits held in a pooled account with the County of Orange Treasurer. Short-term investments are expected to be utilized within 30-90 days and are reported at fair value. Deposits held in the Orange County Investment Pool (OCIP) are invested in the Orange County Money Market Fund and the Extended Fund. The OCIP is an external investment pool and is not registered with the Securities and Exchange Commission (SEC). At December 31, 2012 the OCIP had a weighted average maturity of 250 days. The Orange County Money Market Fund is rated AAAm by Standard & Poor's. The Extended Fund is not rated. The deposits in the OCIP are reported at amortized cost which approximates fair value. For further information regarding the OCIP, refer to the County of Orange Comprehensive Annual Financial Report.

**Equities** - The majority of OCERS' domestic, international and global securities, including those traded in emerging markets, are actively traded on major security exchanges, or over-the-counter. Fair value for exchange traded securities is determined as of the close of the trading date in the primary market or agreed upon exchange. The last known price is used for listed securities that did not trade on a particular date. Fair value is obtained from third party pricing sources for securities traded over-the-counter.

**Debt Securities** - Actively traded debt instruments such as those securities issued by the U.S. Treasury, Federal Agencies and corporate issuers are reported at fair value as of the close of the trading date. Fair values of irregularly traded debt securities are obtained from pricing vendors who employ modeling techniques in determining security values. Inputs typically employed by pricing vendors include cash flows, maturity and credit rating.

**Real Estate** - OCERS holds real estate assets directly and in commingled real estate funds. Real estate investments owned directly are appraised annually by independent third party appraisers in accordance with the Uniform Standards of Professional Appraisal Practice. Properties held in commingled pools are subject to regular internal appraisals by investment management firms/general partners with independent third party appraisals accomplished at regular intervals. Primary determinants of fair value include market and property type specific information which typically involve a degree of expert judgment.

OCERS engages real estate management firms to assist in the day to day operations of the real estate portfolio. At December 31, 2012, the estimated fair value of OCERS' real estate portfolio was \$967.3 million net of outstanding debt of \$42.9 million. The chart below details the repayment of real estate debt obligations.

### Note 2 – Summary of Significant Accounting Policies (Continued)

### **Real Estate Debt Obligations**

As of December 31, 2012 (Dollars in Thousands)

Property	Original Loan Balance	Loan Balance	Interest Rate	Debt Structure	Maturity Date
#1	\$26,375	\$26,375	5.22%	Fixed interest only through 2/2013. Amortizing 30 years until 2/2015	2/1/2015
#2	16,500	16,500	4.79%	Interest only	4/1/2013

OCERS' Investment Committee has approved a maximum fifty percent (50%) leverage limit for the total real estate portfolio at the time of financing. Additionally, leverage targets are established for each investment style based on the risk/return profile of the underlying investment. Established leverage limits by investment style are as follows:

- Core Real Estate: limited to 50% of the individual asset market value at the time of financing with leverage limits at the portfolio level of 40%.
- Non-Core Real Estate: accessed through commingled funds that have pre-specified leverage limits in
  offering documents but will be limited to 75% of the market value of the commingled funds, at the time
  of financing.

**Alternative Investments** - OCERS invests in a variety of alternative strategies including private equity, real return, absolute return and opportunistic strategies. The fair value of OCERS' alternative investments depends upon the nature of the investment and the underlying business. Typically, alternative investments are illiquid and subject to redemption restrictions. Fair value is determined either quarterly or semi-annually with valuations conducted by general partners, management and valuation specialists. Valuation techniques vary by investment type and involve expert judgment.

Included in the real return strategy are dedicated allocations to inflation linked debt, commodities and timber resources. Fair value for inflation linked debt securities and commodities are determined by quoted market prices. Fair value for timberland is determined in a manner similar to other alternative investments and involves a degree of expert judgment.

### **Capital Assets**

Capital assets consist of furniture, equipment, intangible assets, including computer software, and building and improvements. Capital assets are defined by OCERS as assets with an initial, individual cost of more than \$25,000 and an estimated useful life in excess of one year. Such assets are recorded at cost. Capital assets are depreciated using the straight-line depreciation method over their estimated useful lives, ranging from five to fifteen years for furniture, equipment and building improvements, three years for computer software, and sixty years for building.

### Note 2 – Summary of Significant Accounting Policies (Continued)

### **Capital Assets**

As of December 31, 2012 (Dollars in Thousands)

Furniture & Equipment	\$1,341
Computer Software	15,175
Building & Improvements	4,977
Total Capital Assets (at cost)	21,493
Less: Accumulated Depreciation	_(8,712)
Total Capital Assets, Net of Depreciation	\$12,781

GASB Statement No. 51, Accounting and Financial Reporting for Intangible Assets, requires OCERS to identify and capitalize costs incurred for the development of internally generated software. According to GASB Statement 51, there are three stages in the development and installation of internally generated software: (1) Preliminary Project Stage, (2) Application and Development Stage, and (3) Post-Implementation/Operation Stage. All outlays related to the Application and Development Stage must be capitalized.

OCERS began implementing and developing a new Pension Administration System (V-3) in 2010 and \$4.0 million in expenses related to V-3 were capitalized in the current fiscal year. Intangible assets are included as Capital Assets in the Statement of Fiduciary Net Position.

In accordance with the predominant use philosophy underlying GASB Statement No. 25, *Financial Reporting for Defined Benefit Plans and Note Disclosures for Defined Contribution Plans*, \$2.3 million, net of accumulated depreciation, for the portion of the OCERS' headquarters building used for plan administration was reclassified from real estate investments to capital assets.

#### Use of Estimates

The preparation of financial statements in conformity with accounting principles generally accepted in the United States of America requires management to make estimates and assumptions that affect reported amounts of net position. Actual results could differ from those estimates.

### **Comparative Totals**

The basic financial statements include certain prior-year summarized comparative information in total but not at the level of detail required for a presentation in conformity with generally accepted accounting principles. Accordingly, such information should be read in conjunction with OCERS' financial statements for the year ended December 31, 2011, from which the summarized information was derived.

# Effect of New Governmental Accounting Standards Board (GASB) Pronouncements

In June 2011, GASB issued Statement No. 63, Financial Reporting of Deferred Outflows of Resources, Deferred Inflows of Resources, and Net Position. This statement provides financial reporting guidance for deferred outflows of resources and deferred inflows of resources and the resulting net position. This statement is effective for periods beginning after December 15, 2011. OCERS implemented this statement in the accompanying financial statements as of December 31, 2012.

#### Note 3 - Investments

OCERS may invest, in accordance with state statutes, in any form or type of investment deemed prudent by the Board of Retirement. Pension and 401(h) Health Care Plan assets are restricted for the exclusive purposes of providing benefits to plan participants and defraying reasonable expenses of administering the plans. The Board of Retirement may invest, or delegate the authority to invest, the assets of the funds through the purchase, holding, or sale of any form or type of investment, financial instrument, or financial transaction. Agency fund assets, held pursuant to section 115 of the Internal Revenue Code, are separately invested in domestic equity, international equity and domestic bond index funds in accordance with the respective OCFA and OCTA Third-Party Administrative and Investment Management Agreements.

In accordance with GASB Statement No. 40, *Deposit and Investment Risk Disclosures*, OCERS discloses investments that are subject to custodial credit risk, credit risk, interest rate risk, foreign currency risk and concentration of credit risk.

#### **Custodial Credit Risk**

Custodial credit risk for deposits is the risk that in the event of a financial institution's failure, OCERS would not be able to recover its deposits. Deposits are exposed to custodial risk if they are not insured or not collateralized. As of December 31, 2012, OCERS' deposits with a financial institution are fully insured by FDIC insurance. Deposits held by OCERS' custodial bank are not exposed to custodial credit risk as they are held in a qualified pool trust, separate from the custodial bank assets.

For an investment, custodial credit risk is the risk that, in the event of a counterparty failure, OCERS will not be able to recover the value of its investments or collateral securities that are in the possession of counterparties. Investment securities are exposed to custodial credit risk if the securities are uninsured, are not registered in OCERS' name or by other qualified third party administrator trust accounts.

OCERS' investments and collateral received through securities lending are not exposed to custodial credit risk because all securities are held by OCERS' custodial bank in OCERS' name or by other qualified third party administrator trust accounts. OCERS does not maintain any general policies regarding custodial credit risk.

Credit Risk - By definition, credit risk measures the risk that an issuer or counterparty will not fulfill its obligations. OCERS' investment guidelines require, in managing credit risk, that individual fixed income portfolios maintain an overall credit rating of AA. Standard & Poor's defines investment grade as those fixed income securities with ratings between AAA and BBB. OCERS' investment policy permits, on an opportunistic basis, the investment in fixed income securities rated below investment grade. A rating of NR represents those securities that are not rated and NA represents those securities that are not subject to the GASB Statement No. 40 disclosure requirements. The credit ratings for individual OCERS' fixed income portfolios are monitored regularly.

At December 31, 2012, the credit ratings of the OCERS' fixed income portfolio were as follows:

#### Note 3 - Investments (Continued)

### **Credit Ratings**

As of December 31, 2012 (Dollars in Thousands)

Category	AAA	AA	A	BBB	BB	В	CCC	D	NR	NA	Total
Pooled	\$ -	\$ -	\$ -	\$ —	\$ -	\$ -	\$ -	\$ -	\$1,067,939	\$ -	\$1,067,939
International	101,081	54,360	68,738	51,392	944	_	_	_	385,993	_	662,508
Treasuries	_	_	_	_	_	_	_	_	_	497,606	497,606
Corporates	943	13,700	65,443	117,339	87,870	77,505	24,302	869	30,302	_	418,273
Agency	_	32,078	_	_	_	_	_	_	187,139	1,463	220,680
Mortgages	15,580	9,664	3,324	5,735	-	4,653	4,936	-	63,223	-	107,115
Municipal	_	10,164	3,168	_	-	-	-	-	29,867	-	43,199
Asset-backed	6,620	9,053	-	251	-	-	503	-	15,245	-	31,672
Swaps	_	_	_	_	_	_	_	_	1,492	_	1,492
Options	_	_	-	-	-	-	-	-	(581)	-	(581)
Total	\$124,224	\$129,019	\$140,673	\$174,717	\$88,814	\$82,158	\$29,741	\$869	\$1,780,619	\$499,069	\$3,049,903*

<sup>\*</sup> This schedule reflects credit ratings for OCERS' fixed income portfolio and therefore excludes approximately \$25 million of non-fixed income securities that are included in the domestic bond category on the Statement of Fiduciary Net Position.

#### **Interest Rate Risk**

Interest rate risk is the risk that changes in interest rates will adversely affect the fair value of an investment. Duration is a measure of the price sensitivity of a fixed-income portfolio to changes in interest rates. It is calculated as the weighted average time to receive a bond's coupon and principal payments. The longer the duration of a portfolio, the greater its price sensitivity to changes in interest rates.

Interest rate risk is managed through OCERS' investment policies requiring that investment managers investing on behalf of OCERS have applicable investment guidelines and that the effective durations of fixed income portfolios remain within a defined range of the benchmark's effective duration. The primary benchmarks for domestic and foreign bonds are the Barclays Capital Index and Citigroup Non US World Government Bond Index, respectively. As of December 31, 2012, the duration was 5.0 years for the Barclays Universe Index and 7.3 years for Citigroup Non US World Government Bond Index and all investment managers were in compliance within their defined range.

OCERS invests in a variety of fixed income instruments including asset backed securities, corporate obligations and commercial mortgage backed securities. The value, liquidity and income of these securities are sensitive to changes in overall economic conditions and the fair value of these securities may be affected by changes in interest rates, default rates and the value of the underlying securities.

The interest rate risk schedule presents the duration of fixed income securities by investment category as of December 31, 2012:

#### Note 3 - Investments (Continued)

### Interest Rate Risk Schedule

As of December 31, 2012 (Dollars in Thousands)

Category	Amount	Duration (in Years)	Percent
Pooled	\$1,067,933	5.16	35%
International	631,050	5.62	21%
Treasuries	497,606	6.41	16%
Corporates	375,928	5.84	12%
Agency	206,768	3.22	7%
Swaps	96,408	3.74	3%
Mortgages	91,532	2.54	3%
Municipal	38,059	9.92	1%
Asset-Backed	25,099	1.93	1%
No Effective Duration:			
Corporates	42,345	NA	1%
International	31,458	NA	1%
Mortgages	15,583	NA	1%
Agency	13,913	NA	1%
Asset-Backed	6,572	NA	0%
Municipal	5,140	NA	0%
Pooled	6	NA	0%
Other	(581)	NA	0%
Swaps	(94,916)	NA	(3%)
Total	\$3,049,903*	5.29	100%

<sup>\*</sup> This schedule reflects interest rate risk for OCERS' fixed income portfolio and therefore excludes approximately \$25 million of non-fixed income securities that are included in the domestic bond category on the Statement of Fiduciary Net Position.

### Foreign Currency Risk

The value of deposits or investments denominated in foreign currency may be adversely affected by changes in currency exchange rates. OCERS' investment policy permits investment in international securities that includes investments in international equity securities, global equity securities, emerging market equity securities, public real estate securities and foreign bonds. Investment managers monitor currency exposures daily.

The following schedule represents OCERS' net exposure to foreign currency risk in U.S. dollars as of December 31, 2012:

#### Note 3 - Investments (Continued)

### Foreign Currency Risk Schedule

As of December 31, 2012 (Dollars in Thousands)

Currency			Fixed			
(in US Dollar)	Cash	Equities	Income	Forwards	Swaps	Total
Australian Dollar	\$120	\$41,577	\$19,216	\$10	\$-	\$60,923
Brazilian Real	-	3,076	4,260	23	123	7,482
Canadian Dollar	228	39,851	46,788	199	-	87,066
Danish Krone	6	15,552	-	(15)	-	15,543
Euro Currency	32,099	324,983	161,330	(2,686)	99	515,825
Hong Kong Dollar	285	87,198	-	-	-	87,483
Indonesian Rupiah	-	2,379	4,320	-	-	6,699
Iceland Krona	99	-	1,600	-	-	1,699
Israeli Shekel	-	284	-	21	-	305
Japanese Yen	161	187,402	232,314	12,770	-	432,647
Mexican Peso	492	-	16,162	(24)	111	16,741
New Zealand Dollar	3	-	55,063	(125)	-	54,941
Norwegian Krone	35	7,734	3,106	282	-	11,157
Polish Zloty	-	-	-	(636)	-	(636)
Pound Sterling	503	204,944	40,090	(339)	-	245,198
Singapore Dollar	28	24,488	4,126	1	-	28,643
South African Rand	225	-	6,410	(41)	-	6,594
South Korean Won	-	31,969	-	-	-	31,969
Swedish Krona	68	23,666	12,860	(70)	-	36,524
Swiss Franc	27	104,603	-	(45)	-	104,585
Thailand Baht	-	6,383	-	-	-	6,383
Yuan Renminbi	-	-		(2)	-	(2)
Amount Exposed to Foreign Currency Risk	\$34,379	\$1,106,089	\$607,645	\$9,323	\$333	\$1,757,769

The foreign currency amounts above are included within the cash and cash equivalents, international equity, global equity, and foreign bond allocations on the Statement of Fiduciary Net Position as of December 31, 2012. Swaps are included in the international equity, global equity, foreign bond, and alternative investment allocations.

#### Concentration of Credit Risk

Concentration of credit risk is the risk of loss attributed to the magnitude of a government's investment in a single issuer. By policy, OCERS did not hold investments in any one issuer that represented five percent (5%) or more of plan net position and net investments. Investments issued or explicitly guaranteed by the U.S. Government and any pooled investments are excluded from this policy requirement.

#### Note 3 - Investments (Continued)

#### **Derivative Instruments**

As of December 31, 2012, all derivative instruments held by OCERS are considered investments and not hedges for accounting purposes. Any reference to the term hedging in these financial statements references an economic activity and not an accounting method. All gains and losses associated with these activities are recognized as incurred in the Statement of Changes in Fiduciary Net Position.

The table that follows presents the related net appreciation/(depreciation) in fair value, the fair value amounts and the notional amounts of derivative instruments outstanding at December 31, 2012.

#### **Derivative Instruments**

As of December 31, 2012 (Dollars in Thousands)

	Changes in Fair Value (4)		Fair Value at December 31, 2012		
Investment Derivatives	Classification	Amount <sup>(1)</sup>	Classification	Amount <sup>(2)</sup>	Notional <sup>(3)</sup>
Commodity Futures Long	Net Appreciation/(Depreciation) in Fair Value of Investments	\$ (260)	Domestic Bonds/Alternative Investments	\$ -	3,668
Commodity Futures Short	Net Appreciation/(Depreciation) in Fair Value of Investments	399	Domestic Bonds/Alternative Investments	-	(932)
Credit Default Swaps Bought	Net Appreciation/(Depreciation) in Fair Value of Investments	(4,720)	Domestic Bonds/Alternative Investments	(469)	\$111,770
Credit Default Swaps Written	Net Appreciation/(Depreciation) in Fair Value of Investments	3,924	Domestic Bonds/Alternative Investments	666	\$69,044
Equity Swaps	Net Appreciation/(Depreciation) in Fair Value of Investments	6	Domestic Bonds/Alternative Investments	6	\$1
Fixed Income Futures Long	Net Appreciation/(Depreciation) in Fair Value of Investments	3,173	Domestic Bonds/Alternative Investments	-	674,950
Fixed Income Futures Short	Net Appreciation/(Depreciation) in Fair Value of Investments	(263)	Domestic Bonds/Alternative Investments	-	-
Fixed Income Options Bought	Net Appreciation/(Depreciation) in Fair Value of Investments	(162)	Domestic Bonds/Alternative Investments	97	4,158
Fixed Income Options Written	Net Appreciation/(Depreciation) in Fair Value of Investments	2,090	Domestic Bonds/Alternative Investments	(820)	(205,858)
Foreign Currency Futures Long	Net Appreciation/(Depreciation) in Fair Value of Investments	(204)	Domestic Bonds/Alternative Investments	-	2,226
Futures Options Bought	Net Appreciation/(Depreciation) in Fair Value of Investments	(21)	Domestic Bonds/Alternative Investments	10	5
Futures Options Written	Net Appreciation/(Depreciation) in Fair Value of Investments	90	Domestic Bonds/Alternative Investments	(18)	(25)
FX Forwards	Net Appreciation/(Depreciation) in Fair Value of Investments	ation) in Fair Value of Investments  11,249  Foreign Currency Forward Contracts (Net) Receivable		9,323	\$621,999
Index Futures Long	Net Appreciation/(Depreciation) in Fair Value of Investments	35,740	Domestic Bonds/Alternative Investments	-	496
Index Futures Short	Net Appreciation/(Depreciation) in Fair Value of Investments	(2,292)	Domestic Bonds/Alternative Investments	-	(31)
Pay Fixed Interest Rate Swaps	Net Appreciation/(Depreciation) in Fair Value of Investments	(262)	Domestic Bonds/Alternative Investments	420	\$64,900
Receive Fixed Interest Rate Swaps	Net Appreciation/(Depreciation) in Fair Value of Investments	2,054	Domestic Bonds/Alternative Investments	897	\$332,900
Rights	Net Appreciation/(Depreciation) in Fair Value of Investments	157	Domestic Bonds/Alternative Investments	97	\$641
Total Return Swaps Bond	Net Appreciation/(Depreciation) in Fair Value of Investments	2,065	Domestic Bonds/Alternative Investments	46	\$1,846
Total Return Swaps Equity	Net Appreciation/(Depreciation) in Fair Value of Investments	(2,616)	Domestic Bonds/Alternative Investments	(518)	\$(61,154)
Warrants	Net Appreciation/(Depreciation) in Fair Value of Investments	(2)	Domestic Bonds	-	\$2
Grand Totals		\$50,145		\$9,737	

<sup>(1)</sup> Negative values (in brackets) refer to losses

<sup>(2)</sup> Negative values refer to liabilities

<sup>(6)</sup> Notional may be a dollar amount or number of shares underlying futures and options; negative values refer to short positions

<sup>(4)</sup> Excludes futures margin payments

#### Note 3 - Investments (Continued)

#### Valuation of Derivative Instruments

Non-exchange traded instruments, such as swaps, are valued using similar methods as those described for debt securities.

Futures contracts are traded on exchanges and typically derive their value from underlying indices and are marked to market daily. All gains and losses associated with changes in the value of futures contracts also settle on a daily basis and result in the contracts themselves having no fair value at the end of any trading day, including December 31, 2012. Future variation margin accounts also settle daily and are recognized in the financial statements under net appreciation/(depreciation) in the fair value of the investment as incurred.

In general, option values are dependent upon a number of different factors, including the current market price of the underlying security, the strike price of the option, costs associated with holding a position in the underlying security including interest and dividends, the length of time until the option expires and an estimate of the future price volatility of the underlying security relative to the time period of the option.

Foreign currency forward contracts are agreements to buy or sell a currency at a specified exchange rate on a specified date. The fair value of a foreign currency forward is determined by the difference between the specified exchange rate and the closing exchange rate at December 31, 2012.

#### **Custodial Credit Risk: Derivative Instruments**

As of December 31, 2012, all investments in derivative instruments are held in OCERS' name and are not exposed to custodial credit risk as described in the previous discussion of custodial credit risk.

### Counterparty Credit Risk: Derivative Instruments

A summary of counterparty credit ratings relating to non-exchange traded derivatives in asset positions as of December 31, 2012 is as follows:

#### Note 3 - Investments (Continued)

### Counterparty Credit Risk Schedule for Derivative Investments

As of December 31, 2012

(Dollars in Thousands)

(Dollars in Thousands)								
Counterparty Name	S&P Rating	Foreign Currency Forward Contracts	Swaps	Total Fair Value				
Bank of America N.A.	A	\$98	\$32	\$130				
Barclays Bank PLC	A+	-	3	3				
Barclays Bank PLC Wholesale	A+	5	-	5				
Barclays Capital	A+	3	201	204				
BNP Paribas S.A.	A+	1	178	179				
Citibank N.A.	A	41	68	109				
Credit Suisse International	A+	1,036	2	1,038				
Deutsche Bank AG London	A+	198	32	230				
Deutsche Bank Securities Inc	A+	-	1	1				
Goldman Sachs & Co.	A-	-	16	16				
Goldman Sachs International	A-	2	33	35				
HSBC Bank PLC	AA-	47	-	47				
HSBC Bank USA	AA-	33	1	34				
HSBC Bank USA, N.A., Singapore Branch	AA-	-	135	135				
J.P. Morgan Securities Inc.	A	-	41	41				
J.P. Morgan Chase Bank	A+	-	44	44				
J.P. Morgan Chase Bank N.A.	A+	2	-	2				
Mellon Bank N.A.	A+	72	-	72				
Morgan Stanley & Co. Inc.	A-	3	-	3				
Morgan Stanley & Co. International PLC	A-	31	-	31				
Morgan Stanley Capital Services Inc.	A-	-	114	114				
Morgan Stanley CME	A-	-	319	319				
Morgan Stanley & Co. Incorporated	A-	7	1	8				
Royal Bank of Canada	AA-	161	-	161				
Royal Bank of Canada (UK)	AA-	39	-	39				
Royal Bank of Scotland PLC	A	1,068	6	1,074				
Societe Generale	A	1	2	3				
State Street Bank London	A+	11,025	-	11,025				
UBS AG	A	355	-	355				
UBS CME	A	-	608	608				
Westpac Banking Corporation	AA-	60		60				
Total Derivatives in Asset Position		\$14,288	\$1,837	\$16,125				

#### Interest Rate Risk - Derivatives

At December 31, 2012, OCERS is exposed to interest rate risk on its investments in various swap arrangements based on daily interest rates for LIBOR (London Interbank Offered Rate), FRCPX (France Consumer Price Index: excluding tobacco), Brazilian reference rates, federal funds rate and Mexican swap rates. The following table illustrates the maturity periods of these investments.

### Note 3 - Investments (Continued)

### **Interest Rate Risk Schedules for Derivative Instruments**

As of December 31, 2012

(Dollars in Thousands)

		Investment Maturities (in years)			
Investment Type	Fair Value	Less Than 1	1-5	6 - 10	More than 10
Credit Default Swaps Bought	\$ (469)	\$ -	\$ (469)	\$ -	\$ -
Credit Default Swaps Written	666	7	955	(182)	(114)
Pay Fixed Interest Rate Swaps	420	_	30	121	269
Receive Fixed Interest Rate Swaps	897	_	911	(14)	-
Total Return Swaps Bond	46	45	1	_	-
Total Return Swaps Equity	(518)	(518)	_	_	-
Total	\$1,042	\$(466)	\$1,428	\$(75)	\$155

## Derivative Instruments Highly Sensitive to Interest Rate Changes:

Investment Type	Receive Rate	Payable Rate	Fair Value	Notional
Pay Fixed Interest Rate Swaps	Receive variable 3-month LIBOR	Pay Fixed 2.50%-2.75%	\$269	\$12,200
Pay Fixed Interest Rate Swaps	Receive variable 12-month US CPI	Pay Fixed 2.25%-2.50%	176	33,800
Pay Fixed Interest Rate Swaps	Receive variable 3-month LIBOR	Pay Fixed 1.40%-1.50%	(25)	18,900
Receive Fixed Interest Swaps	Receive Fixed 8.20%-8.32%	Pay Variable 0-month CETIP	_	600
Receive Fixed Interest Swaps	Receive Fixed 8.15%-8.30%	Pay variable 0-month BRCDI	(12)	28,800
Receive Fixed Interest Swaps	Receive Fixed 8.825%	Pay variable 0-month BZDIO	135	11,400
Receive Fixed Interest Swaps	Receive Fixed 1.00%	Pay variable 1-month FEDL	_	200
Receive Fixed Interest Swaps	Receive Fixed 2.00%	Pay variable 12-month FRCPX	17	1,900
Receive Fixed Interest Swaps	Receive Fixed 1.90%-1.95%	Pay variable 12-month FRCPX	39	17,700
Receive Fixed Interest Swaps	Receive Fixed 1.50%	Pay variable 3-month LIBOR	608	79,600
Receive Fixed Interest Swaps	Receive Fixed 1.00%	Pay variable 12-month LIBOR	_	3,200
Receive Fixed Interest Swaps	Receive Fixed 5.50%-6.35%	Pay variable 1-month TIIE	109	187,500
Receive Fixed Interest Swaps	Receive Fixed 5.50%	Pay variable 9-month TIIE	1	2,000
Total Interest Rate Swaps			\$1,317	

#### Note 3 - Investments (Continued)

### Foreign Currency Risk: Derivatives

At December 31, 2012, OCERS is exposed to foreign currency risk on investments in swaps and forward currency contracts denominated in foreign currencies that may be adversely affected by changes in the currency exchange rates.

### Foreign Currency Risk Schedule for Derivative Instruments

As of December 31, 2012 (Dollars in Thousands)

	Currency Forwa	ard Contracts		
Currency Name	Net Receivables	Net Payables	Swaps	Total Exposure
Australian Dollar	\$ 23	\$ (13)	\$ -	\$ 10
Brazilian Real	29	(6)	123	146
Canadian Dollar	(12)	211	-	199
Danish Krone	-	(15)	-	(15)
Euro Currency	(181)	(2,505)	99	(2,587)
Israeli Shekel	22	(1)	-	21
Japanese Yen	(120)	12,890	-	12,770
Mexican Peso	(8)	(16)	111	87
New Zealand Dollar	5	(130)	-	(125)
Norwegian Krone	367	(85)	-	282
Polish Zloty	-	(636)	-	(636)
Pound Sterling	118	(457)	-	(339)
Singapore Dollar	1	-	-	1
South African Rand	-	(41)	-	(41)
Swedish Krona	189	(259)	-	(70)
Swiss Fanc	39	(84)	-	(45)
Yuan Renminbi	2	(4)		(2)
Total	\$474	\$8,849	\$333	\$9,656

### Securities Lending

OCERS is authorized by investment policy and state law to lend its investment securities including domestic and international equities and bonds to broker/dealers in exchange for collateral in the form of either cash or securities. Lent domestic and international securities are collateralized with an initial market value of not less than 102% and 105%, respectively, of fair value of the loaned securities. The lending agent receives cash and non-cash collateral for the securities on loan. There are no restrictions on the amount of securities that can be lent at one time. State Street Bank serves, in accordance with a Securities Lending Authorization Agreement, as OCERS' agent to loan domestic and international securities. State Street Bank does not have the ability to pledge or sell collateral securities delivered absent a borrow default.

Cash collateral received on loaned securities is invested together with the cash collateral of other qualified taxexempt investors in a collective investment fund managed by State Street. The collective investment fund is not rated. In December 2010 the collective investment fund was divided into separate investment pools: 1) a liquidity pool and 2) a duration pool. As of December 31, 2012, the liquidity pool had an average duration of 33 days and an average weighted maturity of 71 days. The duration pool had an average duration of 41 days and an average weighted maturity of 1,924 days. Because loans are terminable at will, the duration of the loans did not generally

#### Note 3 - Investments (Continued)

match the duration of the investments made with the cash collateral. The Securities Lending Agreement requires State Street to indemnify OCERS if the broker/dealer fails to return any borrowed securities. During 2012, there were no failures to return loaned securities or to pay distributions by the borrowers. Furthermore, there were no losses due to borrower defaults. The fair market value of securities on loan and the total cash and non-cash collateral held as of December 31, 2012 was \$298.5 million and \$306.8 million, respectively. The following table shows fair values of securities on loan and cash collateral received by asset class:

#### Securities on Loan

As of December 31, 2012 (Dollars in Thousands)

Security Lent for Cash Collateral	Fair Value of OCERS' Security Lent	Cash Collateral Received	Non-Cash Collateral Received	Total Collateral Received
Domestic Corporate Bonds and Equity	\$97,236	\$98,827	\$1,170	\$99,997
U.S. Government Bonds	137,146	140,034	209	140,243
International Equity	58,014	60,370	_	60,370
Foreign Bonds	6,062	5,865	324	6,189
Total	\$298,458	\$305,096	\$1,703	\$306,799

### Note 4 - Funding Policy - Pension Plan

Employer and employee/member pension plan contribution requirements are determined as a percentage of plan sponsor payrolls. In determining contributions, assumptions are made about future events that affect the amount and timing of benefits to be paid and assets to be accumulated. The projected total pensionable compensation for all OCERS' plan sponsors for the year ending December 31, 2012 was \$1.61 billion. Employer contribution rates are determined using the entry age normal actuarial cost method based upon a level percentage of payroll. The employer contributions provide for both normal cost and an amount to amortize any unfunded or overfunded actuarial accrued liabilities. By definition, the normal cost is the annual contribution rate that, if paid annually from a member's first year of membership through the year of retirement, would accumulate to the amount necessary to fully fund the member's retirement benefit if all underlying assumptions are met. The actuarial report as of December 2009 established the contribution rates for fiscal year 2011-2012, and the actuarial valuation report as of December 2010 established the contribution rates for fiscal year 2012-2013. For the year ending December 31, 2012, employer contribution rates ranged from 16.85% of payroll to 47.45% depending upon the benefit plan type. Employer contributions were \$406.8 million for the year ended December 31, 2012 of which approximately \$307.1 million and \$60.4 million were made by the County of Orange and the Orange County Fire Authority, respectively. Participating employers are required by Government Code sections 31453.5 and 31454 to contribute a percentage of covered salary to the Plan. The contribution requirements of participating active members and employers are established and may be amended by the OCERS' Board of Retirement. Participating employers may pay a portion of the participating active employees' contributions through negotiations and bargaining agreements.

Employee contributions are established by the OCERS' Board of Retirement and guided by state statute (Government Code sections 31621, 31621.5, 31621.8, 31639.25 and 31639.5) and vary based upon employee age at the time of entering OCERS membership. OCERS received \$191.2 million in employee contributions for the year ended December 31, 2012. Average employee contribution rates for the year ended December 31, 2012 ranged between 7.39% and 12.94%.

### Note 5 - Funding Policy - Health Care Plans

County of Orange Plan: Employer contributions are determined by actuarial valuations. Contribution rates range from 0.6% of pay to 5.3% based upon individual employee labor group and totaled \$27.4 million for the year ending December 31, 2012. The County's annual contributions are calculated based on the annual required contribution to the Retiree Medical Plan and are projected to cover the normal cost each year and amortize any unfunded actuarial liability over a period not to exceed 30 years.

In determining the annual required contribution, plan actuaries also include, within the actuarial value of assets, funds held in the County of Orange's Internal Revenue Code Section 115 Trust. These assets are separate and distinct from the plan assets reported by OCERS in the County of Orange Health Care fund. The County of Orange is trustee for the 115 Trust.

Orange County Fire Authority Plan: Current, active employees received pay increases pursuant to collective bargaining agreements in order to contribute 4% of pay to the OCFA for post employment (retirement) coverage. OCERS classifies plan contributions as being employer made due to the collective bargaining arrangement. The OCFA periodically remits plan contributions to the OCERS administered trust in amounts authorized by the OCFA Board of Directors. Contributions totaled \$3.6 million for the year ending December 31, 2012.

Similar to the County of Orange, OCFA's plan actuaries include, within the actuarial value of assets, funds held in a separate Internal Revenue Code Section 115 Trust in determining the plan's annual required contribution. OCFA is trustee for the 115 Trust.

#### Note 6 – Plan Reserves

Employer and employee contributions are deposited into various legally-required reserve accounts established on a book value basis. Set forth below are the descriptions of OCERS' various reserve accounts:

- **Pension Reserve** Pension reserve represents funding set aside for retirement payments derived from employer contributions. Additions include transfers from the employer contribution reserve and interest credited. Deductions include benefit payments made to retired members.
- Employee Contribution Reserve Employee contribution reserve represents the balance of member contributions. Additions include member contributions and interest credited. Deductions include member refunds and transfers to fund retirement benefits.
- Employer Contribution Reserve Employer contribution reserve represents the balance of employer contributions for future active member retirement benefits. Additions include employer contributions. Deductions include transfers to retiree reserves in order to fund retirement benefits, disability benefits and death benefits.
- Annuity Reserve Annuity reserve represents funding set aside for retirement payments derived from contributions made by members. Additions include transfers from the member contribution reserve and interest credited. Deductions include benefit payments made to retired members.
- **Health Care Plan Reserves** Health care plan reserves represent assets held to pay medical benefits for eligible retirees of the 401(h) health care plans. Additions include employer contributions and investment earnings. Deductions include medical payments.
- County Investment Account (POB Proceeds) Reserve County investment account (POB Proceeds) reserve represents the remaining proceeds from the County of Orange's 1994 Pension Obligation Bond issuance. The remaining proceeds are utilized, in accordance with a long standing agreement between OCERS and the County of Orange, to offset a portion of the annual actuarially-determined contribution rate for the County of Orange. In 2012, \$5.5 million of the remaining proceeds were utilized to offset the actuarially determined contributions for the County of Orange.

#### Note 6 – Plan Reserves (Continued)

- Unclaimed Fund Reserve Unclaimed fund reserve represents contributions from terminated non-vested members who left employment prior to December 31, 2002 and whose funds remain on deposit with OCERS.
- **EPA** (**Employee Paid Annuity**) **Reserve** EPA reserve represents additional employee contributions made by members pursuant to Government Code section 31627 for the purpose of providing additional benefits.
- Contra Account Represents the amount of interest credited to the reserve accounts that has not been
  paid for out of current or excess earnings. A balance in this account is the result of applying the full interest
  crediting policy of the Board and will be replenished in subsequent periods as sufficient earnings allow.

#### **Total Fund Reserves**

As of December 31, 2012 (Dollars in Thousands)

Pension Reserve	\$5,859,498
Employee Contribution Reserve	2,109,609
Employer Contribution Reserve	1,569,821
Annuity Reserve	769,197
Health Care Plan Reserve	120,725
County Investment Account (POB Proceeds) Reserve	103,260
Unclaimed Fund Reserve	123
Employee Paid Annuity (EPA) Reserve	16
Contra Account	(781,260)
Net Position - Total Fund	\$9,750,989

#### Note 7 – Net Position Restatement

In accordance with the predominant use philosophy underlying GASB Statement No. 25, *Financial Reporting for Defined Benefit Plans and Note Disclosures for Defined Contribution Plans*, beginning net position restricted for pension and other postemployment benefits for the Pension Trust Fund has been restated by \$2.6 million, to properly record the portion of the OCERS' headquarters building used for plan administration as a capital asset. The entire building was previously being recorded as a real estate investment. The effect on net position restricted for pension and other postemployment benefits is detailed below:

Pension Trust Fund	(Dollars in Thousands)
Net Position Restricted for Pension and Other Postemployment Benefits, Beginning of Year, as	
Previously Reported	\$8,585,408
To properly record accumulated depreciation relating to previous years that was not recorded	(2,571)
Net Position Restricted for Pension and Other  Postemployment Benefits, Beginning of Year as Restated	\$8,582,837

### Note 8 – Administrative Expenses - Pension

As permitted by Government Code (Code) Section 31580.2, the Board of Retirement adopts an annual budget, financed from the System's assets, covering the entire expenses for the administration of OCERS. The Code provides that administrative expenses incurred in any year are to be charged against the earnings of the pension trust fund and are not to exceed twenty-one hundredths of one percent (0.21%) of OCERS' actuarial accrued liabilities, excluding investment related costs and expenditures for computer software, hardware and related technology consulting services. Administrative expenses incurred in calendar year 2012 were within the limits established by the Code. The administrative budget for the year ending December 31, 2012 is as follows:

### 2012 Administrative Expense Compared to Actuarial Accrued Liability

(Dollars in Thousands)

Actuarial Accrued Liability (AAL) as of 12/31/12	\$15,144,888
Maximum Allowed for Administrative Expense (AAL * 0.21%)	31,804
Actual Administrative Expense <sup>1</sup>	11,263
Excess of Allowed Over Actual Expense	\$20,541
Actual Administrative Expense as a Percentage of Actuarial Accrued Liability	0.07%
<sup>1</sup> Administrative Expense Reconciliation	
Administrative expense per Statement of Changes in Net Position	\$14,209
Less: Administrative Expense Not Considered per CERL Section 31596.1	2,946
Administrative Expense Allowable under CERL Section 31580.2	\$11,263

#### Note 9 - Commitments

At December 31, 2012, OCERS had outstanding commitments of \$765.9 million to various limited partnerships and real estate investment portfolios. The following table details, by asset class, the unfunded commitments.

### **Unfunded Commitments**

As of December 31, 2012 (Dollars in Thousands)

\$658,023
_107,924
\$765,947

### Note 10 – Contingencies

At December 31, 2012, OCERS was involved in various litigation matters. In management's opinion, and after consultation with legal counsel, the outcome of these matters is not expected to have a material adverse effect on OCERS' financial position.

#### Note 11 – Pension Disclosures

The Schedule of Funding Progress immediately following the Notes to the Basic Financial Statements presents trend information regarding the pension plan's actuarial value of assets, liabilities and funding status on a multi-year basis.

(Dollars in Thousands)

Actuarial Valuation Date December 31	Valuation Value of Assets*	Actuarial Accrued Liability (AAL)	Unfunded AAL (UAAL)	Funded Ratio	Covered Payroll	UAAL as a Percentage of Covered Payroll
2012	\$9,469,208	\$15,144,888	\$5,675,680	62.52%	\$1,609,600	352.55%

<sup>\*</sup> The valuation value of assets is the actuarial valuation of assets reduced by the value of non-valuation reserves in the amount of \$215,000.

The following summarizes the actuarial assumptions and methods used in the most recent actuarial valuation of December 31, 2012, and the December 31, 2010 and 2009 valuations, which were used to determine 2012 contributions.

Actuarial Information:	2012	2010	2009
Valuation Date	December 31, 2012	December 31, 2010	December 31, 2009
Actuarial Cost Method	Entry Age Normal	Entry Age Normal	Entry Age Normal
Amortization Method	Level Percent of Payroll	Level Percent of Payroll	Level Percent of Payroll
Remaining Amortization Period	22 years closed (declining)	24 years closed (declining)	25 years closed (declining)
Asset Valuation Method	Market Value of Assets less unrecognized returns in each of last five years	Market Value of Assets less unrecognized returns in each of last five years	Market Value of Assets less unrecognized returns in each of last five years

Actuarial Assumptions:	2012	2010	2009
Investment Rate of Return	7.25%	7.75%	7.75%
Inflation Rate	3.25%	3.50%	3.50%
Projected Salary Increases	4.75% to 13.75% for General members; 4.75% to 17.75% for Safety members based upon service	4.50% to 11.50% for General members; 4.50% to 13.50% for Safety members based upon service	4.50% to 11.50% for General members; 4.50% to 13.50% for Safety members based upon service
Cost-of-living Adjustments	3.00%	3.00%	3.00%

Highlights of the December 31, 2012 valuation include:

- The ratio of pension plan valuation assets to actuarial accrued liabilities decreased from 67.03% to 62.52%.
- The UAAL increased from \$4.5 billion to \$5.7 billion at December 31, 2012 primarily due to changes in actuarial assumptions.
- Aggregate employer contributions for the period July 1, 2014 to June 30, 2015 will increase from 34.71% of payroll to 41.64% of payroll before the two-year phase-in due to lower than expected earnings (after smoothing) and lower than expected growth in individual salary increases and growth in total payroll and other experience losses. The Board adopted a two-year phase-in of the impact of the change in economic assumptions for the employer contribution rates. After reflecting the two-year phase-in, the aggregate employer contribution is 39.32% of payroll.
- The aggregate employee's contribution rate will increase from 11.47% to 12.87% due to changes in actuarial assumptions and changes in member demographics.
- At the recommendation of the OCERS' actuary, the investment rate of return was decreased from 7.75% to 7.25% and the inflation rate was decreased from 3.50% to 3.25%.
- As of December 31, 2012, the total net unrecognized investment gains to be recognized in future valuation periods totaled \$97 million compared to a net unrecognized loss of \$599 million as of December 31, 2011. This deferred investment gain will offset any investment losses that may occur after December 31, 2012. The deferred gains of \$97 million represent 1% of the market value of assets. If these deferred investment gains were recognized immediately in the actuarial value of assets, the funded percentage would increase from 62.50% to 63.20% and the aggregate employer rate would decrease from 41.64% to about 41.10% of payroll.

#### Note 12 - Health Care Plan Disclosures

The Schedules of Funding Progress immediately following the Notes to the Basic Financial Statements present trend information regarding the County of Orange and OCFA Health Care plans' actuarial value of assets, liabilities and funding status on a multi-year basis.

Actuarial valuations involve estimates of the value of reported amounts and assumptions about the probability of events far into the future. Actuarially determined amounts are subject to continual revision as results are compared to past expectations and new estimates are made about the future. Calculations are based on the benefits provided under the terms of the substantive plan in effect at the time of each valuation on the pattern of sharing of costs between the employer and plan members to that point. Actuarial calculations reflect a long-term perspective.

## County of Orange Health Care Plan

(Dollars in Thousands)

Actuarial Valuation Date June 30	Actuarial Value of Assets*	Actuarial Accrued Liability (AAL)	Unfunded AAL (UAAL)	Funded Ratio	Covered Payroll	UAAL as a Percentage of Covered Payroll
2011	\$116,804	\$528,639	\$411,835	22.10%	\$1,227,601	33.55%

<sup>\*</sup> Includes assets held in separate 115 Trust that are not reported as part of the 401(h) OPEB plan in the OCERS' financial statements.

Actuarial Information:	2011
Valuation Date	June 30, 2011
Actuarial Cost Method	Entry Age Normal
Amortization Method	Level Percent of Payroll
Remaining Amortization Period	26 years closed (declining)
Asset Valuation Method	Market Value

Actuarial Assumptions:	2011
Investment Rate of Return	7.25%
Inflation Rate	3.50%
Projected Salary Increases	4.75% to 13.75% for General Members; 4.75% to 17.75% for Safety Members based upon service
Medical Cost Trend Rate	Actual premium increases in first year, then 9.0% (9.4% for Medicare premiums, trending down to 5.0% over the subsequent 8 years)

Highlights of the June 30, 2011 valuation include:

- The June 30, 2011 valuation determined the annual required contribution for 2011/2012 fiscal year to be \$41.2 million.
- The discount rate was lowered from 7.75% to 7.25%

### Note 12 - Health Care Plan Disclosures (Continued)

## Orange County Fire Authority Health Care Plan

(Dollars in Thousands)

Actuarial		Actuarial				UAAL as a
Valuation Date	Actuarial Value	Accrued	Unfunded AAL			Percentage of
July 1	of Assets*	Liability (AAL)	(UAAL)	Funded Ratio	Covered Payroll	Covered Payroll
2012	\$28,910	\$156,623	\$127,713	18.46%	\$75,432	169.31%

<sup>\*</sup> Includes assets held in separate 115 Trust that are not reported as part of the 401(h) OPEB plan in the OCERS' financial statements.

Actuarial Information:	2012
Valuation Date	July 1, 2012
Actuarial Cost Method	Entry Age Normal
Amortization Method	Level-Dollar Basis
Remaining Amortization Period	24 years closed (declining)
Asset Valuation Method	Market Value

Actuarial Assumptions:	2012		
Investment Rate of Return	5.50%		
Inflation Rate	3.50%		
Projected Salary Increases	N/A, amortization method is based on level-dollar payment		
Medical Cost Trend Rate	7.25% trending down to 5% over 5 years		

#### Highlights of the July 1, 2012 valuation include:

- The 5.50% discount rate reflects a blended discount rate as OCFA is currently partially funding the annual required contribution. The blended rate reflects a short-term rate of approximately 4% and a long-term expected rate of return of invested assets of 7.75%.
- The valuation reflects several assumption changes, including an update to the mortality and turnover tables, as well as changes to the spouse participation assumption to reflect actual experience.
- The inflation rate is 3.50% based on recommendations from the actuary.

# Note 13 – Future Implementation of Governmental Accounting Standards Board (GASB) Pronouncements

On June 25, 2012, GASB approved Statement No. 67, Financial Reporting for Pension Plans, and Statement No. 68, Accounting and Financial Reporting for Pensions. Statement No. 67 addresses reporting by pension plans that administer benefits for governments, and is effective for financial statements for periods beginning after June 15, 2013. Statement No. 68, which primarily relates to reporting by governments that provide pensions to their employees, is effective for fiscal years beginning after June 15, 2014.

#### Key changes include:

- Incorporating ad hoc cost-of-living adjustments and other ad hoc postemployment benefit changes into projections of benefit payments, if an employer's past practice and future expectations of granting them indicate they are essentially automatic.
- Using a discount rate that applies (a) the expected long-term rate of return on pension plan investments for which plan assets are expected to be available to make projected benefit payments, and (b) the interest rate on a tax-exempt 20-year AA- or higher rated municipal bond index to projected benefit payments for which plan assets are not expected to be available for long-term investment in a qualified trust.
- Adopting a single actuarial cost allocation method entry age normal rather than the current choice among six actuarial cost methods.
- Requiring more extensive note disclosures and required supplementary information.

The System will be subject to the provisions of Statement No. 67 beginning with the fiscal year ending December 31, 2014. GASB Statement No. 67 replaces the requirements of GASB Statement No. 25, Financial Reporting for Defined Benefit Pension Plans and Note Disclosures for Defined Contribution Plans, and GASB Statement No. 50, Pension Disclosures, as they relate to pension plans that are administered through trusts or similar arrangements meeting certain criteria. GASB Statement No. 67 builds upon the existing framework for financial reports of defined benefit pension plans and enhances note disclosures and required supplementary information for both defined benefit and defined contribution pension plans. In addition, it requires the presentation of new information about annual money-weighted rates of return in the notes to the financial statements and in 10-year required supplementary information schedules.

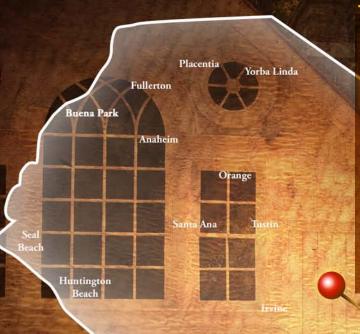
# FINANCIAL Section II REQUIRED SUPPLEMENTARY INFORMATION



Lake Forest, California

Helena Modjeska House

# Helena Modjeska House



Arden: Helena Modjeska Historic House and Gardens is tucked away amidst a live oak grove on the banks of Santiago Creek in Orange County's beautiful Modjeska Canyon.

The home of world renowned 19th century stage actress Madame Helena Modjeska, Arden was named for the grounds' resemblance to the Forest of Arden in the William Shakespeare play "As You Like It." The only surviving home of the famed Shakespearean actress, the Modjeska House was built in 1888 and is located on a 14.4 acre site located in a residential setting and is not open on a daily basis. Administered by the County of Orange's OC Parks department, docentled tours are available by calling 949-923-2230. Visit www.ocparks.com/modjeskahouse for more details.

Mission

### **Fun Fact**

The National Park Service honored Helena Modjeska's beloved former home by naming it a National Historic Landmark on December 14, 1990.

San Juan Capistrano

ina

San

# Schedule of Funding Progress – Pension Plan

(Dollars in Thousands)

Actuarial Valuation Date December 31	Valuation Value of Assets*	Actuarial Accrued Liability (AAL)	Unfunded AAL (UAAL)	Funded Ratio	Covered Payroll	UAAL as a Percentage of Covered Payroll
2007	\$7,288,900	\$9,838,686	\$2,549,786	74.08%	\$1,457,159	174.98%
2008	7,748,380	10,860,715	3,112,335	71.34%	1,569,764	198.27%
2009	8,154,687	11,858,578	3,703,891	68.77%	1,618,491	228.85%
2010	8,672,592	12,425,873	3,753,281	69.79%	1,579,239	237.66%
2011	9,064,355	13,522,978	4,458,623	67.03%	1,619,474	275.31%
2012	9,469,208	15,144,888	5,675,680	62.52%	1,609,600	352.55%

<sup>\*</sup> The valuation value of assets is the actual valuation of assets reduced by the value of non valuation reserves.

# Schedule of Employer Contributions – Pension Plan

(Dollars in Thousands)

Plan Year Ended December 31	Annual Required Contributions	Percentage Contributed
2007	\$ 326,736	100.00%
2008	359,673	100.20%**
2009	337,496	100.30%**
2010	372,437	100.00%
2011	387,585	100.00%
2012	406,521***	100.00%

<sup>\*\*</sup> The OCFA made additional contributions towards reducing their UAAL.

<sup>\*\*\*</sup> Actuarial contributions based on preliminary estimates and differ slightly from amounts reported in Statement of Changes in Fiduciary Net Position.

# Schedule of Funding Progress – OPEB County of Orange

(Dollars in Thousands)

	Actuarial Valuation	Actuarial	Actuarial Accrued	*** 6 1 1			UAAL as a Percentage
	Date	Value of	Liability	Unfunded		Covered	of Covered
Ŀ	June 30	Assets	(AAL)	AAL (UAAL)	Funded Ratio	Payroll	Payroll
	2007	\$ —	\$408,322	\$408,322	0.00%	\$1,157,642	35.27%
Š	2009	94,110	456,005	361,895	20.64%	1,267,427	28.55%
	2011	116,804	528,639	411,835	22.10%	1,227,601	33.55%

# Schedule of Employer Contributions – OPEB County of Orange

(Dollars in Thousands)

Plan Year Ended June 30	Annual Required Contributions	Percentage Contributed
2007	\$24,235	43.69%
2009	25,900	139.20%
2011	36,378	93.10%

# Schedule of Funding Progress – OPEB Orange County Fire Authority

(Dollars in Thousands)

Actuarial Valuation Date July 1	Actuarial Value of Assets	Actuarial Accrued Liability (AAL)	Unfunded AAL (UAAL)	Funded Ratio	Covered Payroll	UAAL as a Percentage of Covered Payroll
2008	\$21,525	\$94,125	\$72,600	22.87%	\$80,624	90.05%
2010	21,550	147,710	126,160	14.59%	81,391	155.00%
2012	28,910	156,623	127,713	18.46%	75,432	169.31%

# Schedule of Employer Contributions – OPEB Orange County Fire Authority

(Dollars in Thousands)

Plan Year Ended June 30	Annual Required Contributions	Percentage Contributed
2008	\$6,530	54.00%
2010	8,878	50.42%
2012	13,520	33.71%

# Significant Factors Affecting Trends in Actuarial Information

# 2012 Changes in Pension and OPEB Plan Provisions and Actuarial Assumptions

- Changes in investment return, inflation, and across the board salary increase assumptions in the December 31, 2012 review of economic assumptions report increased the pension plan UAAL by \$935 million.
- Members with membership date on or after January 1, 2013 will be placed in CalPEPRA tiers (1.62% of final average salary at age 65, 2.50% of final average salary at age 67 and 2.70% of final average salary at age 57).
  - The July 1, 2012 OPEB: OCFA highlights include the following:
    - The 5.50% discount rate reflects a blended discount rate as OCFA is currently partially funding the annual required contribution. The blended rate reflects a short-term rate of approximately 4% and a long-term expected rate of return of invested assets of 7.75%.
    - The inflation rate is 3.50% based on recommendations from the actuary.
    - The valuation reflects several assumption changes including an update to the mortality and turnover tables, as well as changes to the spouse participation assumption to reflect actual experience.

# 2011 Changes in Pension and OPEB Plan Provisions and Actuarial Assumptions

- Changes in mortality, disability, termination, retirement, salary scale, and annual pay-off assumptions in the December 31, 2010 triennial experience study increased the pension plan UAAL by \$364 million.
- Effective April 20, 2012, certain employees previously employed at the City of Santa Ana became employees of OCFA General and OCFA Safety and are eligible for benefits under Plan N (2% at 55) and Plan F (3% at 50), respectively.
- Effective July 1, 2012, new General employees hired by the City of San Juan Capistrano will be covered under General Plan S (2% at 57).
- The June 30, 2011 OPEB: County of Orange valuation determined the annual required contribution for 2011/2012 fiscal year to be \$41.2 million.
- Effective July 1, 2012, the OPEB: County of Orange discount rate was lowered from 7.75% to 7.25%.

# 2010 Changes in Pension and OPEB Plan Provisions and Actuarial Assumptions

- LAFCO adopted an optional 1.62% of final average salary at age 65 for members hired on or after July 1, 2010.
- County Managers unit adopted an optional 1.62% of final average salary at age 65 for members hired on or after August 17, 2010.
- Sanitation District adopted a 1.64% of final average salary at age 57 for members within Supervisors and Professional unit hired on or after October 1, 2010.

HELEN

# Significant Factors Affecting Trends in Actuarial Information

(Continued)

- OCFA adopted a 3.00% of final average salary at age 55 for Safety members within the Executive Management unit hired on or after July 1, 2011 and for all Safety members hired on or after July 1, 2012.
- OCFA adopted a 2.00% of final average salary at age 55 for General members hired on or after July 1, 2011.
- In the prior OPEB: Orange County Fire Authority valuation, 100% of the ARC was funded and the discount rate was set equal to the long-term investment return expected to be earned by the plan assets.
- In 2009 and 2010, OPEB: Orange County Fire Authority contributions represented 48% and 50% of the ARC (calculated at 7.75% discount rate), respectively. For this valuation, the discount rate is based on a partially funded plan. The discount rate is a blended rate that reflects the proportionate amounts of plan and employer assets expected to be used.
- The OPEB: Orange County Fire Authority discount rate was lowered from 7.75% to 5.50% to reflect the fact that the plan is partially funded. The change in the discount rate increased the UAAL by \$44 million.

### 2009 Changes in Pension Plan Provisions and Actuarial Assumptions

- Adjustments to correct the under-reporting of certain premium pay items in prior years' pensionable salary data resulted in a \$228 million increase in UAAL.
- County and the Courts adopted optional 1.62% at 65 formula for General Member Employees entering OCERS after May 7, 2010.
- County Law Enforcement Members adopted 3% at 55 formula for Safety Members entering OCERS after April 9, 2010.

### 2008 Changes in Pension Plan Provisions and Actuarial Assumptions

- Individual salary increase assumptions are changed from age based to service based.
- Annual leave payoff assumptions were increased for General Members.
- Changes in service retirement rates for General members with improved benefit formulas increased the UAAL by \$116 million.

### 2007 Changes in Pension Plan Provisions and Actuarial Assumptions

- Vector Control District discontinued its participation in OCERS effective January 4, 2007.
- The benefit formula for Orange County Cemetery District members was changed to 2% at 55 effective December 7, 2007.
- Demographic assumptions changed based on triennial experience study.
- Changes in mortality, disability, termination, retirement, salary scale, and annual payoff assumptions in the December 31, 2007 triennial experience study increased the UAAL by \$237 million.



HELENA MODJESKA HOME

# Section II FINANCIAL Section OTHER SUPPLEMENTAL INFORMATION





Placentia, California

George Key Ranch



# Schedule of Administrative Expenses

For the Year Ended December 31,2012 (Dollars in Thousands)

### Pension Trust Fund Administrative Expenses

rension Trust rund Administrative Expenses	
Expenses Subject to the Statutory Limit	
Personnel Services	
Employee Salaries and Benefits	\$6,720
Board Members' Allowance	14
Total Personnel Services	6,734
Office Operating Expenses	
Professional Services	2,189
Operating Expenses	1,071
Rent/Leased Real Property	687
Depreciation/Amortization	582
Total Office Operating Expenses	4,529
Total Expenses Subject to the Statutory Limit	_11,263
Expenses Not Subject to the Statutory Limit	
Investment Department Expenses	1,652
Consulting/Research Fees	684
Actuarial Fees	342
Legal Costs	267
Commingled Interest	1
Total Expenses Not Subject to the Statutory Limit	2,946
Total Pension Trust Fund Administrative Expenses	14,209
Health Care Funds Administrative Expenses	28
Total Administrative Expenses	\$14,237

# Schedule of Investment Expenses

For the Year Ended December 31,2012 (Dollars in Thousands)

### **Investment Management Fees**

	Alternative Investments	\$8,870
Let	Afternative investments	\$0,0/0
	International Equity	8,080
	Domestic Bonds	5,050
	Real Estate	4,092
7/1	Real Return	4,044
	Foreign Bonds	1,089
	Global Equity Securities	750
	Total Investment Management Fees	<u>31,975</u>
Fo	reign Income Tax Expense/Other	9,899

# Security Lending Activity

Security Lending Fees	497
Rebate Fees	344
Total Security Lending Activity	841
Total Investment Expenses	\$42,715

# Schedule of Payments for Professional Services

For the Year Ended December 31, 2012 (Dollars in Thousands)

### Type of Services\*

Professional I	Expenses S	Subject to	the Statuto	ry Limit
----------------	------------	------------	-------------	----------

Professional Services	\$936
Legal Services	689
Temporary Personnel	564
Total Professional Expenses Subject to the Statutory Limit	2,189

### Professional Expenses Not Subject to the Statutory Limit

essional Expenses Not Subject to the Statutory Limit	
Consulting/Research Services	684
Actuarial Services	342
Custodian Services	300
Legal Services	267
Commingled Interest Cost	1
Total Professional Expenses Not Subject to the Statutory Limit	1,594
Total Payments for Professional Expenses	\$3,783

<sup>\*</sup>Detail for fees paid to investment professionals is presented in the Investment Section

# Statement of Changes in Assets and Liabilities - OPEB Agency Fund

As of December 31, 2012 (Dollars in Thousands)

A	Beginning Balance December 31, 2011	Additions	Deductions	Ending Balance December 31, 2012
Assets	-			
Cash and Cash Equivalents	\$ 80	\$ 833	\$ 878	\$ 35
Domestic Equity Securities	8,598	2,259	819	10,038
International Equity Securities	4,002	1,316	603	4,715
Domestic Bonds	9,645	508	67	10,086
Total Assets	\$ 22,325	\$ 4,916	\$ 2,367	\$ 24,874
Liabilities				
Due to Employers	\$ 22,325	\$ 4,916	\$ 2,367	\$ 24,874
Total Liabilities	\$ 22,325	\$ 4,916	\$ 2,367	\$ 24,874

# INVESTMENT





San Juan Capistrano, California

Ronald W. Caspers Wilderness Park

# Ronald W. Caspers Wilderness Park



Ronald W. Caspers Wilderness Park provides 8,000 acres of protected wilderness among the river terraces and sandstone canyons of the western coastal region of the Santa Ana Mountains.

The park's fertile valleys are overtly complemented by specimen groves of native Coastal Live Oak and magnificent stands of California Sycamore. In addition to seasonal wildflower displays and running streams, park visitors are able to view wildlife from the park's many trails. Caspers Wilderness Park is the largest park in the OC Parks system and the park's many amenities include equestrian and RV camping, bike and hiking trails, a family picnic area and a nature center.

Fun Fact
Caspers Wilderne

Caspers Wilderness Park's Bell Canyon name comes from a local legend that said Native Americans would strike a certain large boulder with a rock, causing the large boulder to ring like a bell throughout the canyon.



### Investment Consultant's Statement



ALLAN MARTIN

April 3, 2013

Board of Retirement Orange County Employees Retirement System 2223 Wellington Avenue Santa Ana, California 92701-3101

Dear Board Members:

This letter reviews the investment performance of the Orange County Employees Retirement System (OCERS) for the year ended December 31, 2012.

The primary objective of OCERS is to prudently and expertly invest the System's assets, to ensure the System's ability to pay promised benefits to participants and their beneficiaries, consistent with governing law and best industry practices. In pursuit of this objective, OCERS' Board periodically evaluates the System's liabilities, expected contributions and potential investment returns from differing investment allocations. The Board selects a strategic policy mix that best balances growth potential and acceptable risk. A policy benchmark index is constructed to mirror the system's strategic asset allocation policy. This policy benchmark is used to evaluate the performance of the Fund, and the contribution of managers employed by the Fund.

The System's custodian, State Street Bank and Trust Company, independently prepared the underlying performance data used in this report. The performance calculations were made in compliance with industry performance calculation standards. NEPC, LLC serves as OCERS' independent investment consultant and evaluates the performance of the fund in relation to the System's performance objectives, market benchmarks, and appropriate peer groups of other public pension funds.

### **The Markets and the Economy**

The US economy and global markets continued their gradual recovery in 2012 from their extraordinary meltdown in 2008. While considerable political and economic uncertainties remain, some sectors of the economy, particularly housing and corporate profits, exhibited encouraging growth. Inflation remained low, and at the end of the year, interest rates were at historic lows, although unemployment continued to hover around 8.0%.

While overall GDP growth was modest, the investment markets exhibited strong returns, especially in equities and credit. The broad domestic equity market (measured by the S&P 500 Index yielded a 16% return, and high yield bonds produced a 15.8% return for the year. In general, returns across other markets (Real Estate, Private Equity, and International Equity) exceed 10%, with only fixed income returns falling below 5%.

### **The OCERS Portfolio**

For the calendar year, OCERS' Total Fund (valued at \$9.95 Billion) had a time-weighted rate of return of 12.3%. This return exceeded the return of the OCERS Policy Index of 11.4%, primarily due to the outperformance of OCERS' International Equity and Fixed Income managers. Over the five and ten year periods ending December 31, 2012, the Fund returned 3.5% per annum and 8.1% per annum respectively. On a gross of fee basis, the Fund's total return ranked in the 77<sup>th</sup> percentile of a peer group universe for the one year period, in the 34<sup>th</sup> percentile over five years and in the 35<sup>th</sup>

900 Veterans Blvd. | Ste. 340 | Redwood City, CA 94063-1741 | TEL: 650.364.7000 | www.nepc.com

CAMBRIDGE | ATLANTA | CHARLOTTE | CHICAGO | DETROIT | LAS VEGAS | SAN FRANCISCO

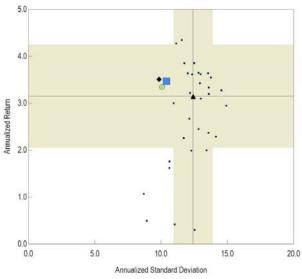
### Investment Consultant's Statement

(Continued)



percentile over ten years. Over the five year period the Fund's relatively conservative equity allocation resulted in substantially less volatility, as measured by the Fund's standard deviation, as shown below. As a result, the Fund's risk-adjusted performance, as measured by the Sharpe ratio, ranked in the top 9% of its peers.

### **Total Public Fund Universe** Risk-Return Comparison 5 Year Ending December 31st, 2012



- Total Fund Allocation Index
- Policy Index
- Universe Median
- IF Public DB > \$1B Gross

After a challenging 2011, 2012 saw a broad market rally in which OCERS' earned 12.0% net of fee return. The return well exceeded the Fund's actuarial assumed rate of 7.25%. Additionally, over the longer term OCERS' risk-adjusted return is significantly better than its peers, signifying the Fund is being compensated for risks it assumes. By being more diversified, the Fund is better positioned to withstand the potential impact of macro shocks in the future.

Sincerely,

ace- chart

Allan Martin Partner

### Investment Returns

The table below details the annualized rates of return for the different asset categories over various time periods ended December 31, 2012. The returns for each asset class represent the composite returns of all the manager portfolios within that asset class. All returns are gross of fees except for diversified credit, private equity, and real estate, where some of the fees are deducted at source. The method of computation of investment return is time-weighted approximation.

	1 Year	3 Year	5 Year
Domestic Equity (%)	16.25	10.48	1.58
Russell 3000 Index (%)	16.42	11.2	2.04
Global Equity (%)	17.91	N/A	N/A
MSCI World Index (%)	15.83	N/A	N/A
International Equity (%)	19.81	5.22	-2.77
MSCI AC World ex US Index (%)	16.83	3.87	-2.89
MSCI EAFE Index (%)	17.32	3.56	-3.69
Emerging Markets Equity (%)	18.69	4.23	-2.40
MSCI EME Index (%)	18.22	4.66	-0.92
Domestic Fixed (%)	8.71	8.17	7.58
Barclays Capital Universal Index (%)	5.53	6.7	6.19
International Fixed Income (%)	1.76	4.11	5.85
International Fixed Income Target Index <sup>(1)</sup> (%)	3.51	4.05	4.95
Diversified Credit (%)	37.5	27.53	10.47
Diversified Credit Target Index <sup>(2)</sup> (%)	12.46	9.28	7.51
Absolute Return (%)	3.38	8.79	6.6
Absolute Return Target Index <sup>(3)</sup> (%)	5.59	5.75	6.28
Real Return (%)	7.81	7.61	4.76
Real Return Target Index <sup>(4)</sup> (%)	6.53	8.09	7.25
Short Term Investments (%)	0.24	0.66	0.46
Cash Overlay (%)	11.87	8.67	N/A
91-day Treasury Bill (%)	0.11	0.11	0.52
Real Estate (%)	12.6	11.5	1.76
Real Estate Target Index <sup>(5)</sup> (%)	12.79	11.36	2.56
Private Equity (%)	7.5	10.13	3.07
Cambridge Private Equity Lagged	14.87	15.49	5.84
Total Fund (%)	12.26	8.10	3.49
Composite Policy Benchmark <sup>6</sup> (%)	11.06	7.80	3.29

<sup>(1)</sup> Intl Fixed Income Target Index = Citigroup Non-US Government Hedged Index through 3/31/04. Thereafter, the index is 50% Citigroup Non-US World Government Bond Index Unhedged + 50% Citigroup Non-US World Government Bond Index Hedged

<sup>(2)</sup> Diversified Credit Target Index = 50% Merrill Lynch HY Constrained + 50% CS Levered Loan

<sup>(9)</sup> Absolute Return Target Index = 3-month Treasury Bill + 7% through 3/31/08, 3-month Treasury Bill + 5 5/7% through 6/30/10, 3-month Treasury Bill + 5% through 6/30/12 and LIBOR + 5% threafter

<sup>(4)</sup> Real Return Target Index = BC US TIPS Index through 2/29/08, 60% BC US TIPS Index + 40% (CPI + 5%) through 6/30/12 and CPI + 5% thereafter

<sup>(5)</sup> Real Estate Target Index = NCREIF Total Index through 9/30/07, 90% NCREIF Total Index + 10% FTSE EPRA/NAREIT Global Real Estate Index through 6/30/12 and 90% NCREF ODCE + 10% NAREIT Developed REITs Index thereafter

<sup>60</sup> Policy Benchmark = 15.0% Russell 3000 + 9.0% MSCI EAFE Index + 4.0% MSCI World Index + 6.0% MSCI Emerging Markets Equity + 2% MSCI EAFE Small Cap Equity + 13.0% BC US Universal Index + 1.5% Citi Non-US Government Hedged + 1.5% Citi Non-US Government Bond Index + 3.5% ML HY Constrained + 3.5% CS Leveraged Loan + 13% (LIBOR + 5%) + 1.0% NCREIF Timberland Index + 1.5% NCREIF Farmland Index + 1.0% DJ UBS Commodity Index + 3% S&P500 Energy Index + 3.5% (CPI + 5%) + 9.0% NCREIF ODCE Index + 1.0% NAREIT Developed REITS Index + 5% Cambridge Private Equity Lagged + 1.95% JPMorgan GBI-EM Global Diversified Un-hedged + 1.05% JPMorgan EM Bond Index

# Statement of Investment Objectives and Policies

### General

This statement is intended to set forth the factors involved in the management of investment assets for the Orange County Employees Retirement System (the System). The responsibility of the Board (with the participation of its Investment Committee, Staff and Advisors) is to establish broad investment policy, guidelines and objectives for the total fund and its component parts, to select independent investment managers and to monitor the activities of the investment managers. The responsibility of each investment manager is to develop and implement management strategies in accordance with the stated investment policies, guidelines and objectives, in a manner consistent with the "prudent man" rule for similar funds, i.e., with care, skill, prudence and diligence, with full discretion subject to the guidelines and applicable statutes. The investment manager is responsible for administration of the investment program within parameters established.

### Strategic Asset Allocation Policy and Maintenance

The Board periodically undertakes strategic asset allocation studies. Such studies define the targeted level of diversification among the various major asset classes and the range in which they are permitted to fluctuate. When significant changes are made to the plan, a transition plan is adopted.

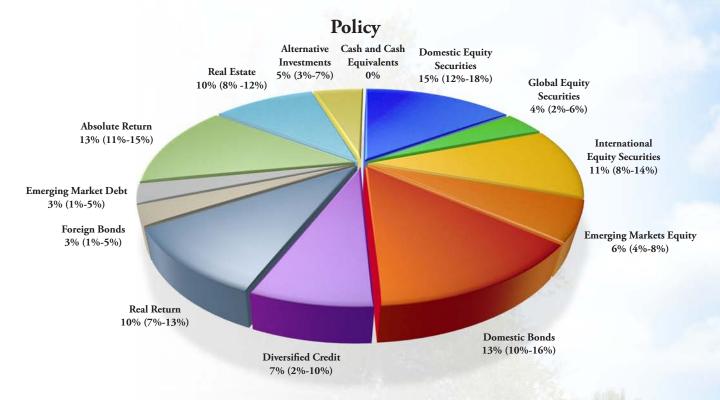
In normal circumstances, asset levels are permitted to fluctuate around targeted levels, and cash inflows are administered by staff in a manner that is consistent with maintenance of the desired level of diversification. When asset fluctuations and/or external cash flows take actual allocation outside the accepted range, cash inflows shall be directed toward the underallocated asset categories and cash outflows shall be directed from the overallocated asset classes.

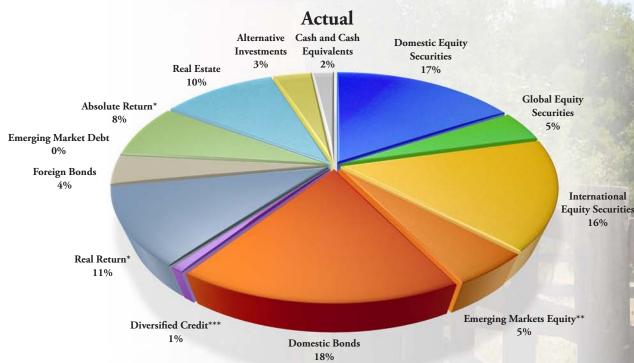
### **Program Administration and Manager Structure**

For each major asset class, the System shall diversify assets by employing managers with demonstrated skill in their particular areas of expertise. The System will retain managers who utilize varied investment approaches and allocate assets in a manner that is consistent with the overall strategic plan. So, for example, the sum of all domestic equity managers should exhibit characteristics that are similar, but not necessarily identical, to the overall equity market. When asset fluctuation causes the asset class to exhibit characteristics that are dissimilar from the plan, staff shall direct cash flows to or from the various managers so that actual characteristics are consistent with the plan.

# Asset Diversification

December 31, 2012

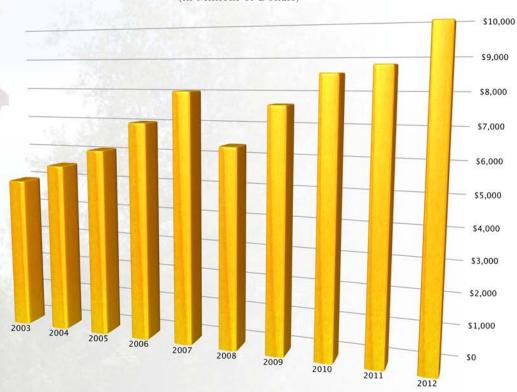




- \* Investment classified as alternative investments and domestic bonds in the financial statements.
- \*\* Investment classified as international equity securities in the financial statements.
- \*\*\* Investments classified as domestic bonds in the financial statements

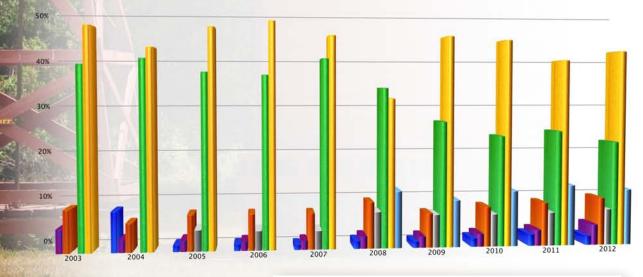
# Growth of System Net Assets at Fair Value





### Historical Asset Allocation

December 2003 – December 2012 (Actual)



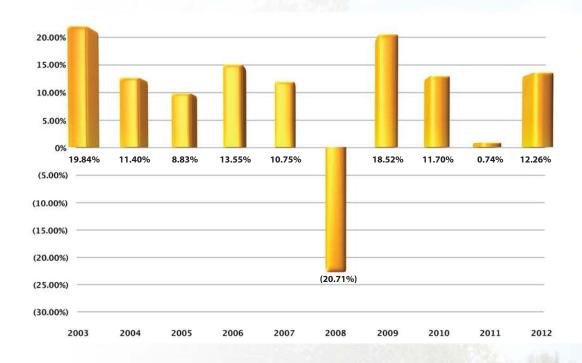
- Cash & Equivalents
- Real Estate
- Fixed Income
- Real Return

- Alternative Investments
- Absolute Return
- Equities

78

# History of Performance

December 2003 – December 2012 (Based on Fair Value)



# Schedule of Commissions

(Amounts in Thousands)

Broker Name	Number of Shares Traded	Commission
Abel Noser Corporation	1,115	\$22
Barclays Capital	2,191	38
Bloomberg Tradebook, LLC	1,294	20
Citigroup Global Markets, Inc.	6,804	40
CLSA	1,828	17
Convergex Execution Solutions, LLC	1,686	38
Cowen and Company, LLC	387	13
Credit Agricole	371	22
Credit Lyonnais Securities	4,162	12
Credit Suisse Securities	24,040	207
CS First Boston (Hong Kong) Limited	5,354	10
Daiwa Securities	3,110	13
Deutsche Bank	10,978	40
Goldman Sachs	10,403	68
Hudson Securities, Inc.	250	9
Instinet	3,019	10
Investment Technology Group, Inc.	3,723	26
Jefferies & Company, Inc.	614	16
J.P. Morgan Securities	10,294	78
MacQuarie	5,148	37
Merrill Lynch & Company, Inc.	17,180	85
Mizuho Securities, Inc.	1,568	11
Morgan Stanley & Company, Inc.	12,259	76
Nomura Securities International Inc.	1,908	24
Pershing, LLC	1,825	45
Raymond James, LTD	310	9
RBC Capital Markets, LLC	326	9
Redburn Partners, LLP	3,160	16
Sanford C. Bernstein, LTD	2,790	36
Societe Generale, London Branch	679	13
Stifel Nicolaus & Company, Inc.	247	8
TD Waterhouse	346	11
UBS	10,625	67
Weeden & Company, LP	561	10
Wunderlich Securities, Inc.	271	13
Other*	20,024	275
Total	170,850	\$1,444

Other includes approximately 171 additional firms that comprise roughly 19% of total commissions and 12% of the total number of shares traded.

# Commission Recapture Program

OCERS implemented a direct brokerage program where investment managers are encouraged to trade with specific brokerage firms for the purpose of reducing trading commissions. The brokerage firms utilized for these services are Abel Noser, Capital Institutional Services, ConvergEx Group, and State Street Bank.

# Schedule of Investment Expenses

For the Year Ended December 31, 2012 (Dollars in Thousands)

### **Investment Management Fees**

Alternative Investments	\$8,870
International Equity	8,080
Domestic Bonds	5,050
Real Estate	4,092
Real Return	4,044
Foreign Bonds	1,089
Global Equity Securities	750
Total Investment Management Fees	31,975
Foreign Income Tax Expense/Other	9,899
Security Lending Activity	

S Security Lending Fees

Rebate Fees 344 **Total Security Lending Activity** 841 **Total Investment Expenses** \$42,715

# **Investment Summary**

As of December 31, 2012 (Dollars in Thousands)

Investment	Fair Value	Percentage
Domestic Equity Securities	\$1,629,205	17%
International Equity Securities	2,047,206	22%
Global Equity Securities	435,067	5%
Domestic Bonds	2,402,348	25%
Foreign Bonds	662,508	7%
Real Estate	967,362	10%
Alternative Investments	1,332,946	14%
Total*	\$9,476,642	100%

<sup>\*</sup> The table above does not include the fair value of OPEB 115 Agency Funds held by OCERS in an investment capacity.

497

# Schedule of Largest Equity Holdings (by Market Value)\*

As of December 31, 2012 (Amounts in Thousands)

Common Stock	Shares	Market Value	% of Composite
Roche Holding AG Genusschein	103	\$20,798	0.21%
BNP Paribas	285	15,996	0.16%
Samsung Electronics Co, LTD	11	15,675	0.16%
Prudential PLC	967	13,598	0.13%
HSBC Holdings, PLC	1,278	13,437	0.13%
Nestle SA REG	206	13.413	0.13%
AIA Group, LTD	3,355	13,095	0.13%
Softbank Corp	321	11,683	0.12%
Pernod Ricard SA	101	11,666	0.12%
Schneider Electric SA	156	11,256	0.11%

# Schedule of Largest Fixed Income Holdings (by Market Value)\*

As of December 31, 2012 (Amounts in Thousands)

Asset	CPN / Maturity	Market Value	% of Composite
FNMA TBA 30YR Single Family JA	3.5% / 12-01-2099	\$87,423	0.87%
SWU0566V5 IRS USD R F 1.50000	1.5% / 03-18-2016	80,208	0.80%
BWPC670U0 CDS USD R V 03MEVENT	1% / 12-20-2017	61,700	0.61%
TSY INFL IX N/B	0.125% / 07-15-2022	43,651	0.43%
TSY INFL IX N/B	1.25% / 07-15-2020	40,224	0.40%
BWPC1CME6 CDS USD R V 03MEVENT	1% / 06-20-2017	34,800	0.34%
TSY INFL IX N/B	3.875% / 04-15-2029	31,479	0.31%
TSY INFL IX N/B	0.125% / 01-15-2022	31,354	0.31%
TSY INFL IX N/B	2.375% / 01-15-2027	30,365	0.30%
TSY INFL IX N/B	2.375% / 01-15-2025	27,621	0.27%

<sup>\*</sup> A complete list of portfolio holdings is available for review at the OCERS' office.

# List of Investment Managers

As of December 31, 2012

### Domestic Equity

Artisan Partners
BlackRock Institutional Trust Company
Cadence Capital Management
Dodge & Cox
Eagle Asset Management
Waddell & Reed Asset Management Group
Washington Capital Management, Inc.

### **Domestic Fixed Income**

BlackRock Institutional Trust Company Loomis, Sayles & Company Pacific Investment Management Company

### **International Equity**

Alliance Bernstein
AQR Capital Management, LLC
AXA Rosenberg Investment Management, LLC
BlackRock Institutional Trust Company
Capital Guardian Trust Company
Globeflex Capital, L.P.
Mercator Asset Management
Mondrian Investment Partners, Ltd.
Pyramis Global Advisors
William Blair & Co.

### **Global Equity**

Franklin Templeton Investments Grantham Mayo Van Otterloo & Co LLC J.P. Morgan Asset Management

### **International Fixed Income**

Mondrian Investment Partners, Ltd.

### Absolute Return

Archer Capital Management
Beach Point Capital Management
BlackRock Alternative Advisors
Bridgewater Associates, Inc.
Pacific Alternative Asset Management Company
Perry Capital
Venor Capital Management

### Real Return

BlackRock Institutional Trust Company
EIG Alternative Investments
EnerVest, Ltd
Hancock Agricultural Investment Group
Hancock Timber Resource Group
Kayne Anderson Capital Advisors
Pacific Investment Management Company
RMK Timberland Group
Schroder Investment Management
UBS AgriVest LLC
Wellington Management

### Real Estate

### Domestic

AEW Capital Management Angelo Gordon & Co. ASB Capital Management CB Richard Ellis Investors Long Wharf Real Estate Partners Morgan Stanley

### **Global Real Estate Securities**

LaSalle Investment Management

### **Alternative Investments**

### Managers

Abbott Capital Adams Street Partners HarbourVest Partners, LLC Mesirow Financial Private Equity

### Cash Overlay

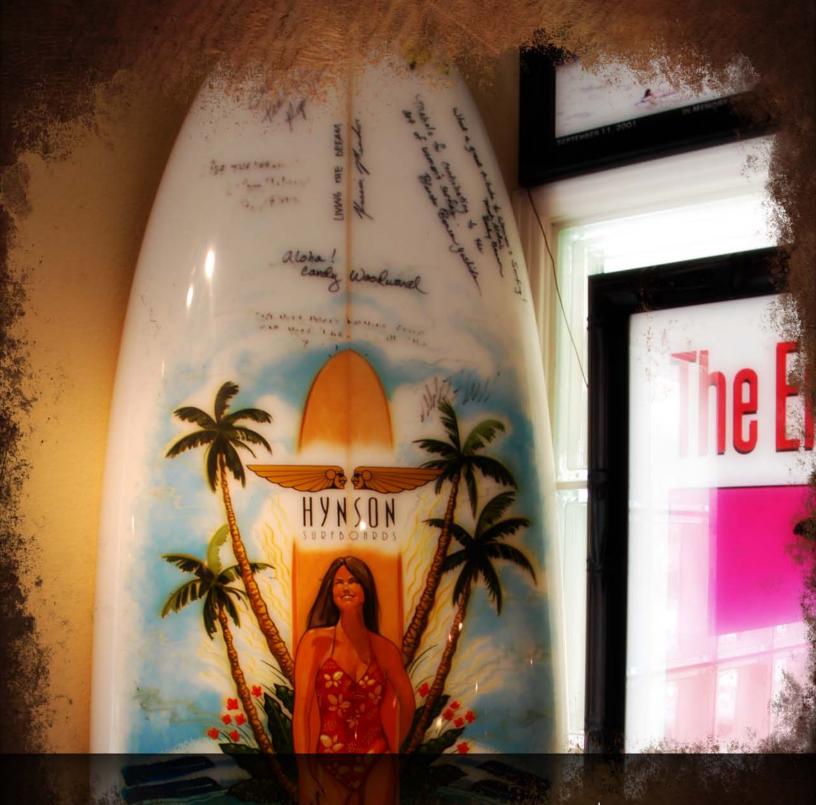
The Clifton Group

### Securities Lending Program

State Street Corporation

ANGE YEES RETIREMENT SYSTEM ACTUARIAL

Section | IV



Huntington Beach, California

International Surfing Museum

# International Surfing Museum

Placentia
Fullerton

Buena Park

Anaheim

Orange

Seal
Beach

Huntington
Beach

Newport
Beach

International Surfing Museum is a popular destination for not only surfers, but those who love the sport and have an interest in surfing culture, including the surfing genre-minded films and music. Since opening its doors in 1987, the Huntington Beach museum located in the city's historic downtown has logged visitors from every nation on earth.

The unique collection of surfing-related memorabilia includes an early 1919 surfboard made out of redwood, the original Bolex 16mm movie camera used by director Bruce Brown to shoot the influential 1964 documentary "The Endless Summer" and even a full-scale replica of Marvel Comics hero The Silver Surfer created in connection with the 2007 film "Fantastic Four: Rise of the Silver Surfer." Of special significance for museumgoers is the wealth of information and photos of legendary Duke Kahanamoku, the famed Olympic gold and silver medalist who brought surfing to Huntington Beach in 1925.

### **Fun Fact**

The museum has collected donations of sand from around the globe including Peru, Australia, Israel, France, the Marshall Islands, Ecuador, Hawaii and, of course, Surf City, Huntington Beach.

Laguna
Beach
San Juan
Capistrano

Dana
Point
San
Clemente



# Actuary's Certification Letter

Orange County Employees Retirement System



THE SEGAL COMPANY 100 Montgomery Street Suite 500 San Francisco, CA 94104-4308 T 415.263.8200 F 415.263.8290 www.segalco.com

May 15, 2013

Board of Retirement Orange County Employees Retirement System 2223 Wellington Avenue Santa Ana, CA 92701-3101

Re: Certification for Pension Plan

Dear Members of the Board:

The Segal Company (Segal) prepared the December 31, 2012 annual actuarial valuation of the Orange County Employees Retirement System. We certify that the valuation was performed in accordance with generally accepted actuarial principles and practices. It is our understanding that the methods used for funding purposes meet the parameters of the Governmental Accounting Standards Board Statement No. 25.

The funding method used by the System is called the Entry Age Normal Actuarial Cost Method. One of the funding objectives of the System is to reduce the outstanding balance of the December 31, 2004 unfunded actuarial accrued liability (UAAL) to zero over a declining period, currently 22 years. The outstanding balance of the UAAL established in the December 31, 2009 valuation as a result of including additional premium pay items as pensionable salary and the new UAAL established in the December 31, 2010 valuation as a result of reallocating contributions and benefit payments among Rate Groups are also amortized over a 22-year period, in the December 31, 2012 valuation. Any increases or decreases in UAAL that arise in future years due to actuarial gains or losses will be amortized over separate 15-year periods. Increases or decreases due to assumption changes will be amortized over separate 30-year periods. The progress being made toward the realization of the financing objectives through December 31, 2012 is illustrated in the History of Unfunded Actuarial Accrued Liability and the Schedule of Funding Progress.

As part of the December 31, 2012 actuarial valuation, Segal conducted an examination of all participant data for reasonableness. Summaries of the employee data used in performing the actuarial valuations are provided in our valuation report. We did not audit the System's financial statements. 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 recognizing the differences between the actual and expected return on market value over a five-year period. The development of the actuarial value as of December 31, 2012 is provided in the Development of Actuarial and Valuation Value of Assets.

Benefits, Compensation and HR Consulting Offices throughout the United States and Canada



Founding Member of the Multinational Group of Actuaries and Consultants, a global affiliation of independent firms

# Actuary's Certification Letter

(Continued)

Board of Retirement Orange County Employees Retirement System May 15, 2013 Page 2

A listing of the supporting schedules Segal prepared for inclusion in the actuarial, statistical, and financial sections of the System's CAFR is as follows:

- History of Unfunded Actuarial Accrued Liability for inclusion in Actuarial Section of CAFR;
- 2. History of Employer Contribution Rates;
- 3. Summary of Active Membership;
- 4. Summary of Retired Membership;
- 5. Development of Actuarial and Valuation Value of Assets;
- 6. Short-Term Solvency Test;
- 7. Actuarial Methods and Assumptions;
- 8. Summary of Major Plan Provisions;
- 9. Experience Analysis; and
- 10. Schedule of Funding Progress for inclusion in Financial Section of CAFR.

The valuation assumptions used in this valuation were included in the Actuarial Section. The results of this valuation were prepared using the actuarial assumptions and methods developed in the triennial experience study as of December 31, 2010 and the economic assumptions study prepared in conjunction with the December 31, 2012 valuation. All of the assumptions recommended in those studies were adopted by the Board. Actuarial valuations are performed on an annual basis. With the exception of the out-of-cycle review of the investment return assumption just discussed, an experience analysis is performed every three years. The next experience analysis is due to be performed as of December 31, 2013 and any changes in assumptions that result will be reflected in the December 31, 2014 valuation.

In the December 31, 2012 valuation, the ratio of the valuation value of assets to actuarial accrued liabilities decreased from 67.03% to 62.52%. The aggregate employer rate (average of the County and all special districts rates combined) has increased from 34.71% of payroll to 41.64% of payroll before the two-year phase-in as discussed below. The aggregate employee's rate has increased from 11.47% of payroll to 12.87% of payroll.

Note that the Board adopted a two-year phase-in of the impact of the change in economic assumptions for the employer contribution rates. After reflecting the two-year phase-in, the aggregate employer rate calculated in this valuation is 39.32% of payroll.

5247154v1/05794.002

# Actuary's Certification Letter

(Continued)

Board of Retirement Orange County Employees Retirement System May 15, 2013 Page 3

In the December 31, 2012 valuation, the actuarial value of assets included \$97 million in unrecognized investment gains, which represented 1% of the market value of assets. If these deferred investment gains were recognized immediately in the actuarial value of assets, the funded percentage would increase from 62.5% to 63.2% and the aggregate employer contribution rate, expressed as a percent of payroll, would decrease from 41.64% to about 41.1%.

The undersigned are Members of the American Academy of Actuaries and meet the qualification requirements to render the actuarial opinion contained herein.

Sincerely,

Paul Angelo, FSA, MAAA, FCA, EA Senior Vice President & Actuary Andy Yeung, ASA, MAAA, FCA, EA Vice President & Associate Actuary

AW/hy Enclosures

5247154v1/05794.002

# History of Unfunded Actuarial Accrued Liability

(Dollars in Thousands)

Valuation Date	Actuarial Accrued Liability	Valuation Value of Assets	Unfunded Actuarial Accrued Liability	Ratio of Assets to Actuarial Accrued Liability	Annual Active Member Compensation	Ratio of Unfunded Actuarial Accrued Liability to Active Compensation
12/31/07	\$9,838,686(1)	\$7,288,900	\$2,549,786(1)	74.08%(1)	\$1,457,159	174.98%(1)
12/31/08	10,860,715	7,748,380	3,112,335	71.34%	1,569,764	198.27%
12/31/09	11,858,578	8,154,687	3,703,891	68.77%	1,618,491	228.85%
12/31/10	12,425,873	8,672,592	3,753,281	69.79%	1,579,239	237.66%
12/31/11	13,522,978	9,064,355	4,458,623	67.03%	1,619,474	275.31%
12/31/12	15,144,888	9,469,208	5,675,680	62.52%	1,609,600	352.55%

<sup>(1)</sup> Revised due to the Board's adoption of revised retirement rates for General plans with improved benefit formulas.

- Each year's assets exclude an amount as shown in the following table of the County's unamortized 1994 funding of its portion of the Unfunded Actuarial Accrued Liability, which funding for 1995 was being amortized over a 14-year period beginning July 1, 1994 and for 1996 and later was being amortized over a 28-year period beginning July 1, 1996. Beginning July 1, 2003, the County can utilize this amount at its discretion to fund any portion of the employer contribution.
- Each year since December 31, 2005 the assets also exclude prepaid employer contributions.

	Amount Exclud	led from Assets
Valuation Date	County Investment Account	Prepaid Employer Contributions
12/31/07	\$174,348	\$108,301
12/31/08	126,683	24,345
12/31/09	108,324	20,027
12/31/10	108,531	29,545
12/31/11	97,767	162,873
12/31/12	103,261	177,632

# History of Employer Contribution Rates

### Employer Contribution Rate (% of pay)

Valuation Date	General (Non-OCTA, Non-OCSD)	General (1.62% @ 65, Non-OCTA)	General (2.7% @ 55)	General (2.0% @ 57)	General (OCTA)	General (2.5% @ 55)	General (1.64% @ 57, OCSD)	General (2.0% @ 55, TCA)
12/31/07	NC 8.92% UAAL 5.25 Total 14.17%	N/A	NC 11.24% UAAL 10.59 Total 21.83%	N/A	NC 11.26% UAAL 3.76 Total 15.02%	NC 10.54% UAAL 11.41 Total 21.95%	N/A	NC 12.60% UAAL 6.13 Total 18.73%
12/31/08	NC 8.99% UAAL 7.06 Total 16.05%	N/A	NC 11.79% UAAL 13.00 Total 24.79%	N/A UAAL 5.94 UAAL 13.01 N/A  Total 17.26% Total 24.20%		NC 13.02% UAAL 5.72 Total 18.74%		
12/31/09	NC 8.69% UAAL 10.43 Total 19.12%	NC 3.69% UAAL 15.50 Total 19.19%	NC 11.61% UAAL 15.50 Total 27.11%	N/A	NC 11.11% UAAL 9.28 Total 20.39%	NC 10.93% UAAL 14.75 Total 25.68%	NC 10.14% UAAL 14.75 Total 24.89%	NC 12.59% UAAL 7.05 Total 19.64%
12/31/10	NC 8.59% UAAL 8.26 Total 16.85%	NC 5.10% UAAL 16.84 Total 21.94%	NC 11.55% UAAL 16.84 Total 28.39%	N/A	NC 10.96% UAAL 10.00 Total 20.96%	NC 10.92% UAAL 16.55 Total 27.47%	NC 10.14% UAAL 16.55 Total 26.69%	NC 12.56% UAAL 8.41 Total 20.97%
12/31/11	NC 8.55% UAAL 10.39 Total 18.94%	NC 4.91% UAAL 20.98 Total 25.89%	NC 12.03% UAAL 20.98 Total 33.01%	NC 10.99% UAAL 20.98 Total 31.97%	NC 10.57% UAAL 13.08 Total 23.65%	NC 11.29% UAAL 20.66 Total 31.95%	NC 10.11% UAAL 20.66 Total 30.77%	NC 13.11% UAAL 9.11 Total 22.22%
12/31/12	NC 9.68% UAAL 12.91 Total 22.59%	NC 5.56% UAAL 25.85 Total 31.41%	NC 13.69% UAAL 25.85 Total 39.54%	NC 12.10% UAAL 25.85 Total 37.95%	NC 11.83% UAAL 16.48 Total 28.31%	NC 12.88% UAAL 25.60 Total 38.48%	NC 11.02% UAAL 25.60 Total 36.62%	NC 14.20% UAAL 12.97 Total 27.17%
With 2-Year Phase-In	21.04%	29.84%	37.45%	35.96%	26.62%	36.57%	34.87%	25.71%

# History of Employer Contribution Rates

(Continued)

### Employer Contribution Rate (% of pay)

Valuation Date	General (2.0% @ 55, Cemetery, future service)	General (2.7% @ 55, OCFA)	General (2.0% @ 55, OCFA)	Safety Law Enforcement (3% @ 50)	Safety Law Enforcement (3% @ 55)	Safety Fire Authority (3% @ 50)	Safety Fire Authority (3% @ 55)	Safety Probation
12/31/07	NC 10.79% UAAL 4.36 Total 15.15%	NC 11.48% UAAL 11.53 Total 23.01%	N/A	NC 21.27% UAAL 18.25 Total 39.52%	N/A	NC 21.02% UAAL 17.22 Total 38.24%	N/A	NC 20.49% UAAL 10.90 Total 31.39%
12/31/08	NC 10.85% UAAL 7.05 Total 17.90%	NC 12.03% UAAL 12.59 Total 24.62%	N/A	NC 21.39% UAAL 21.95 Total 43.34%	N/A	NC 21.16% UAAL 21.94 Total 43.10%	N/A	NC 20.15% UAAL 12.03 Total 32.18%
12/31/09	NC 11.24% UAAL 6.92 Total 18.16%	NC 11.98% UAAL 14.55 Total 26.53%	NC 11.11% UAAL 14.55 Total 25.66%	NC 21.13% UAAL 25.26 Total 46.39%	NC 20.38% UAAL 25.26 Total 45.64%	NC 21.31% UAAL 27.22 Total 48.53%	NC 18.30% UAAL 27.22 Total 45.52%	NC 20.17% UAAL 13.90 Total 34.07%
12/31/10 **	NC 10.90% UAAL 6.86 Total 17.76%	NC 11.85% UAAL 16.14 Total 27.99%	NC 11.11% UAAL 16.14 Total 27.25%	NC 21.05% UAAL 26.40 Total 47.45%	NC 20.38% UAAL 26.40 Total 46.78%	NC 21.54% UAAL 23.92 Total 45.46%	NC 18.30% UAAL 23.92 Total 42.22%	NC 20.07% UAAL 16.22 Total 36.29%
12/31/11	NC 10.80% UAAL 8.23 Total 19.03%	NC 12.18% UAAL 20.43 Total 32.61%	NC 14.35% UAAL 20.43 Total 34.78%	NC 21.48% UAAL 29.38 Total 50.86%	NC 21.47% UAAL 29.38 Total 50.85%	NC 23.49% UAAL 19.66 Total 43.15%	NC 18.58% UAAL 19.66 Total 38.24%	NC 19.31% UAAL 17.26 Total 36.57%
12/31/12	NC 12.34% UAAL 12.28 Total 24.62%	NC 13.92% UAAL 24.76 Total 38.68%	NC 14.01% UAAL 24.76 Total 38.77%	NC 24.24% UAAL 36.71 Total 60.95%	NC 24.20% UAAL 36.71 Total 60.91%	NC 26.16% UAAL 26.84 Total 53.00%	NC 21.12% UAAL 26.84 Total 47.96%	NC 21.26% UAAL 21.91 Total 43.17%
With 2-Year Phase-In	22.99%	36.70%	36.99%	57.27%	57.37%	49.83%	44.85%	40.52%

# History of Employer Contribution Rates

(Continued)

### Employer Contribution Rate (% of pay)

Valuation Date	CalPEPRA Rate Group #1 (2.5% @ 67)	CalPEPRA Rate Group #2 (1.62% @ 65)	CalPEPRA Rate Group #2 (2.5% @ 67)	CalPEPRA Rate Group #3 (2.5% @ 67)	CalPEPRA Rate Group #5 (2.5% @ 67)	CalPEPRA Rate Group #9 (2.5% @ 67)	CalPEPRA Rate Group #10 (2.5% @ 67)	CalPEPRA Rate Group #11 (2.5% @ 67)
12/31/10	NC 7.24% UAAL 8.26 Total 15.50%	NC 5.78% UAAL 16.84  Total 22.62%	NC 7.64% UAAL 16.84 Total 24.48%	NC 8.34% UAAL 16.55 Total 24.89%	NC 9.59% UAAL 10.00 Total 19.59%	NC 9.78% UAAL 8.41 Total 18.19%	NC 7.36% UAAL 16.14 Total 23.50%	NC 7.31% UAAL 6.86 Total 14.17%
12/31/11	NC 8.06% UAAL 10.39 Total 18.45%	NC 6.20% UAAL 20.98 Total 27.18%	NC 8.26% UAAL 20.98 Total 29.24%	NC 8.70% UAAL 20.66 Total 29.36%	NC 9.89% UAAL 13.08 Total 22.97%	NC 10.36% UAAL 9.11 Total 19.47%	NC 7.84% UAAL 20.43 Total 28.27%	NC 7.95% UAAL 8.23 Total 16.18%
12/31/12	NC 8.68% UAAL 12.91 Total 21.59%	NC 6.78% UAAL 25.85 Total 32.63%	NC 7.44% UAAL 25.85 Total 33.29%	NC 9.38% UAAL 25.60 Total 34.98%	NC 10.69% UAAL 16.48 Total 27.17%	NC 10.97% UAAL 12.97 Total 23.94%	NC 8.50% UAAL 24.76 Total 33.26%	NC 8.66% UAAL 12.28 Total 20.94%
With 2-Year Phase-In	20.33%	31.10%	32.05%	33.52%	25.72%	22.87%	31.81%	19.63%

Valuation Date	CalPEPRA Rate Group #6 (2.7% @ 57)			CalPEPRA Rate Group #7 (2.7% @ 57)		CalPEPRA Rate Group #8 (2.7% @ 57)		
12/31/10	NC UAAL Total	11.37% 16.22 <b>27.59</b> %	_	NC UAAL <b>Total</b>	15.03% 26.40 <b>41.43%</b>	_	NC UAAL <b>Total</b>	14.53% 23.92 38.45%
12/31/11	NC UAAL Total	12.23% 17.26 <b>29.49</b> %		NC UAAL <b>Total</b>	15.55% 29.38 <b>44.93</b> %	_	NC UAAL <b>Total</b>	15.23% 19.66 <b>34.89</b> %
12/31/12	NC UAAL Total	13.91% 21.91 <b>35.82</b> %	_	NC UAAL <b>Total</b>	17.05% 36.71 <b>53.76%</b>	_	NC UAAL <b>Total</b>	16.41% 26.84 <b>43.25</b> %
With 2-Year Phase-In		33.40%			50.61%			40.96%

 $<sup>^{</sup>st}$  The UAAL established as a result of including additional premium pay items is amortized over a 25-year period.

<sup>\*\*</sup> The UAAL established as a result of reallocating contributions and benefit payments among Rate Groups is amortized over a 24-year period.

# Summary of Active Membership

All All and a second				
Valuation Date	Number	Annual Salary	Annual Average Salary	Increase in Average Salary (%)
12/31/07 General Safety Total	19,803 3,815 <b>23,618</b>	\$1,156,684,000 300,475,000 \$1,457,159,000	\$58,410 78,761 \$61,697	6.50 5.32 6.29
12/31/08 General Safety <b>Total</b>	19,795 3,925 <b>23,720</b>	\$1,238,077,000 331,687,000 <b>\$1,569,764,000</b>	\$62,545 84,506 \$66,179	7.08 7.29 7.26
12/31/09 General Safety <b>Total</b>	18,873 3,760 <b>22,633</b>	\$1,258,558,000 359,933,000 <b>\$1,618,491,000</b>	\$66,686 95,727 \$71,510	6.62 13.28 8.06
12/31/10 General Safety <b>Total</b>	18,155 3,587 21,742	\$1,232,657,000 346,582,000 \$1,579,239,000	\$67,896 96,622 \$72,635	1.81 0.93 1.57
12/31/11 General Safety <b>Total</b>	17,717 3,704 <b>21,421</b>	\$1,249,064,000 370,410,000 <b>\$1,619,474,000</b>	\$70,501 100,003 \$75,602	3.84 3.50 4.08
12/31/12 General Safety <b>Total</b>	17,529 3,727 21,256 *	\$1,238,958,000 370,643,000 <b>\$1,609,601,000</b>	\$70,680 99,448 \$75,725	0.25 -0.55 0.16

Excludes Deferred and Pending members.

<sup>\*</sup> Note that 33 members that were originally reported by OCERS as active or active on leave of absence were reclassified by Segal as vested former members in the December 31, 2012 valuation

# Summary of Retired Membership

Plan Year Ending	At Beginning of Year	Added Number	Annual Allowance (in 000's)*	Removed Number	Annual Allowance (in 000's)	At End of Year	Annual Allowance (in 000's)	% Increase in Annual Allowance	Average Monthly Allowance
2007	10,915	817	\$41,552	(311)	\$(6,596)	11,421	\$361,775	10.70	\$2,640
2008	11,421	658	38,298	(301)	(6,426)	11,778	393,647	8.81	2,785
2009	11,778	744	32,435	(279)	(6,829)	12,243	419,253	6.50	2,854
2010	12,243	851	46,736	(332)	(8,334)	12,762	457,655	9.16	2,988
2011	12,762	888	45,913	(361)	(9,371)	13,289	494,197	7.98	3,099
2012	13,289	1,026	58,344	(368)	(9,036)	13,947	543,505	9.98	3,247

<sup>\*</sup> Includes COLA granted during the plan year.

*Note:* Annual allowances exclude RMBR and STAR COLA.

# Development of Actuarial and Valuation Value of Assets

As of December 31, 2012

Plan Year Ending	Total Actual Market Return (net)	Expected Market Return (net)	Investment Gain/(Loss)	Deferred Factor	Deferred Return
2009	\$1,092,660,000	\$489,051,000	\$603,609,000	0.2	\$120,722,000
2010	787,215,000	582,621,000	204,594,000	0.4	81,838,000
2011	3,236,000	651,782,000	(648,546,000)	0.6	(389,128,000)
2012	1,014,471,000	659,447,000	355,024,000	0.8	284,019,000
R. C.		1 7			

1.	Total Deferred Return	\$97,451,000
2.	Net Market Value of Assets (Excludes \$103,261,000 in County Investment Account and \$177,632,000 in Prepaid Employer Contributions)	9,566,874,000 *
3.	Actuarial Value of Assets (2) – (1)	9,469,423,000 **
4.	Non-valuation Reserves (a) Unclaimed member deposit (b) Medicare medical insurance reserve (c) Retired member benefit reserve (RMBR) (d) Subtotal	123,000 92,000 0 215,000
5.	Valuation Value of Assets (3) – (4)(d)	\$9,469,208,000
6.	Deferred Return Recognized in Each of the Next 4 Years	
	<ul> <li>(a) Amount recognized on 12/31/2013</li> <li>(b) Amount recognized on 12/31/2014</li> <li>(c) Amount recognized on 12/31/2015</li> <li>(d) Amount recognized on 12/31/2016</li> <li>(e) Subtotal (may not total exactly due to rounding)</li> </ul>	\$102,936,417 (17,785,583) (58,704,583) 71,004,750 \$97,451,000

<sup>\*</sup> Based on the unaudited financial statement provided by OCERS for the December 31, 2012 valuation.

<sup>\*\*</sup> Ratio of Actuarial Value of Assets to Net Market Value of Assets is 99% ( (3) / (2) ).

# Short-Term Solvency Test

(Dollars in Thousands)

	(1)	(2)	(3)		Portion of Accrued Liability Covered by Valuation Assets (%)		
Valuation Date	Active Member Contributions	Liability for Inactive Participants	Liability for Active Members (Employer Financed Portion)	Valuation Value of Assets	(1)	(2)	(3)
12/31/07	\$1,215,825	\$4,803,585	\$3,819,276(1)	\$7,288,900	100	100	33.24(1)
12/31/08	1,376,514	5,211,893	4,272,308	7,748,380	100	100	27.15
12/31/09	1,536,849	5,680,031	4,641,698	8,154,687	100	100	20.20
12/31/10	1,680,401	6,107,350	4,638,122	8,672,592	100	100	19.08
12/31/11	1,829,406	6,881,152	4,812,420	9,064,355	100	100	7.35
12/31/12	1,967,117	7,919,478	5,258,293	9,469,208	100	94.73	0.00

 $<sup>^{(1)}</sup>$  Revised due to the Board's adoption of revised retirement rates for General plans with improved benefit formulas.

### Section 1 - Post – Retirement Mortality Rates:

Healthy: For General Members and all Beneficiaries: RP-2000 Combined

Healthy Mortality Table set back three years.

For Safety Members: RP-2000 Combined Healthy Mortality Table set

back two years.

Disabled: For General Members: RP-2000 Combined Healthy Mortality Table

set forward three years.

For Safety Members: RP-2000 Combined Healthy Mortality Table set

forward two years.

The mortality tables shown above were determined to contain sufficient provision appropriate to reasonably reflect future mortality improvement, based on a review of the mortality experience in the January 1, 2008 through December 31, 2010 Actuarial Experience

Study.

Employee Contribution Rates: For General Members: RP-2000 Combined Healthy Mortality Table set back three years, weighted 40% male and 60% female.

For Safety Members: RP-2000 Combined Healthy Mortality Table set back two years, weighted 80% male and 20% female.

### Section 2 - Termination Rates Before Retirement:

### **Mortality Rates:**

Rate (%) Mortality					
	General		Safety		
Age	Male	Female	Male	Female	
25	0.04	0.02	0.04	0.02	
30	0.04	0.02	0.04	0.02	
35	0.06	0.04	0.06	0.04	
40	0.09	0.06	0.10	0.06	
45	0.12	0.09	0.13	0.09	
50	0.17	0.13	0.19	0.14	
55	0.27	0.20	0.29	0.22	
60	0.47	0.35	0.53	0.39	
65	0.88	0.67	1.00	0.76	

All pre-retirement deaths are assumed to be non-service connected.

(Continued)

### Section 2 - Termination Rates Before Retirement (Continued):

### **Disability Incidence Rates:**

Rate (%) Disability						
Age	General All Other(1)	General OCTA <sup>(2)</sup>	Safety - Law & Fire <sup>(3)</sup>	Safety - Probation (3)		
20	0.00	0.00	0.01	0.00		
25	0.00	0.00	0.04	0.06		
30	0.02	0.03	0.08	0.16		
35	0.06	0.08	0.22	0.20		
40	0.11	0.28	0.36	0.20		
45	0.14	0.46	0.52	0.20		
50	0.15	0.56	0.96	0.20		
55	0.18	0.84	1.68	0.20		
60	0.32	1.30	3.80	0.08		

<sup>(1) 50%</sup> of General All Other disabilities are assumed to be service connected disabilities. The other 50% are assumed to be non-service connected.

<sup>&</sup>lt;sup>(2)</sup> 70% of General - OCTA disabilities are assumed to be service connected disabilities. The other 30% are assumed to be non-service connected.

<sup>(3) 100%</sup> of Safety – Law Enforcement, Fire and Probation disabilities are assumed to be service connected disabilities.

(Continued)

### Section 2 - Termination Rates Before Retirement (Continued):

### **Termination Rates:**

Rate (%) Termination (< 5 Years of Service)						
Years of Service	General All Other <sup>(1)</sup>	General OCTA <sup>(1)</sup>	Safety - Law & Fire <sup>(2)</sup>	Safety - Probation <sup>(2)</sup>		
0	13.0	20.0	4.0	20.0		
1	8.0	16.0	3.0	15.0		
2	7.0	12.0	2.0	10.0		
3	6.0	9.0	2.0	5.0		
4	5.0	7.0	1.0	4.0		

Rate (%) Termination (> 5 Years of Service)						
Age	General All Other <sup>(3)</sup>	General OCTA <sup>(3)</sup>	Safety - Law & Fire <sup>(3)</sup>	Safety - Probation <sup>(3)</sup>		
20	5.0	4.0	1.0	4.0		
25	4.4	4.0	1.0	4.0		
30	4.0	4.0	1.0	3.4		
35	3.4	4.0	0.9	3.0		
40	3.0	3.4	0.6	2.4		
45	2.4	3.0	0.5	2.0		
50	2.3	3.0	0.2	2.0		
55	2.5	3.0	0.0	1.4		
60	2.5	3.0	0.0	0.4		

<sup>(1) 50%</sup> of all terminated members will choose a refund of contributions and 50% will choose a deferred vested benefit.

<sup>(2) 40%</sup> of all terminated members will choose a refund of contributions and 60% will choose a deferred vested benefit.

<sup>(3) 30%</sup> of terminated members will choose a refund of contributions and 70% will choose a deferred vested benefit.

(Continued)

### **Retirement Rates:**

	Rate (%)							
Age	General - Enhanced	General - Non Enhanced <sup>(1)</sup>	General - SJC	Safety - Law (3% @ 50) <sup>(2)</sup>	Safety - Law (3% @ 55) <sup>(2)</sup>	Safety - Fire (3% @ 50) <sup>(2)</sup>	Safety - Fire (3% @ 55) <sup>(2)</sup>	Safety - Probation <sup>(2)</sup>
49	0.0	0.0	0.0	10.0	0.0	0.0	0.0	0.0
50	3.0	2.0	3.0	14.0	11.5	7.0	8.0	4.0
51	2.0	2.0	3.0	14.0	12.0	9.0	10.0	4.0
52	2.0	2.0	3.0	14.0	12.7	11.0	11.0	4.0
53	2.0	2.0	3.0	14.0	17.9	12.0	12.0	4.0
54	5.0	2.0	3.0	20.0	18.8	16.0	14.0	8.0
55	15.0	3.0	4.0	20.0	30.7	20.0	24.0	12.0
56	9.0	4.0	5.0	20.0	20.0	20.0	23.0	12.0
57	9.0	6.0	6.0	20.0	20.0	25.0	27.0	16.0
58	9.0	8.0	7.0	20.0	25.0	25.0	27.0	25.0
59	9.0	8.0	9.0	25.0	30.0	30.0	36.0	25.0
60	12.0	8.0	11.0	60.0	100.0	60.0	100.0	25.0
61	12.0	8.0	13.0	60.0	100.0	60.0	100.0	25.0
62	17.0	16.0	15.0	60.0	100.0	60.0	100.0	25.0
63	15.0	16.0	15.0	60.0	100.0	60.0	100.0	50.0
64	18.0	16.0	20.0	60.0	100.0	60.0	100.0	100.0
65	20.0	20.0	20.0	100.0	100.0	100.0	100.0	100.0
66	25.0	25.0	24.0	100.0	100.0	100.0	100.0	100.0
67	21.0	21.0	24.0	100.0	100.0	100.0	100.0	100.0
68	21.0	21.0	24.0	100.0	100.0	100.0	100.0	100.0
69	21.0	21.0	24.0	100.0	100.0	100.0	100.0	100.0
70	60.0	40.0	100.0	100.0	100.0	100.0	100.0	100.0
71	60.0	40.0	100.0	100.0	100.0	100.0	100.0	100.0
72	60.0	40.0	100.0	100.0	100.0	100.0	100.0	100.0
73	60.0	40.0	100.0	100.0	100.0	100.0	100.0	100.0
74	60.0	40.0	100.0	100.0	100.0	100.0	100.0	100.0
75	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

<sup>(1)</sup> These assumptions are also used for the CalPEPRA 1.62% @ 65 formula (Plan T).

<sup>(2)</sup> Retirement rate is 100% after a member accrues a benefit of 100% of final average earnings.

(Continued)

### Retirement Rates: (Continued)

Rate (%)							
Age	CalPEPRA General Formula	CalPEPRA Safety – Probation Formula <sup>(1)</sup>	CalPEPRA Safety – Law Formula <sup>(1)</sup>	CalPEPRA Safety – Fire Formula <sup>(1)</sup>			
50	0.0	3.0	10.0	7.0			
51	0.0	3.0	10.5	8.5			
52	4.0	3.0	11.0	9.5			
53	1.5	3.0	15.5	10.5			
54	1.5	7.0	16.5	12.0			
55	2.5	10.5	27.0	21.0			
56	3.5	10.5	17.5	20.0			
57	5.5	14.0	18.0	23.5			
58	7.5	22.0	22.0	23.5			
59	7.5	22.0	26.0	31.5			
60	7.5	100.0	100.0	100.0			
61	7.5	100.0	100.0	100.0			
62	15.0	100.0	100.0	100.0			
63	15.0	100.0	100.0	100.0			
64	15.0	100.0	100.0	100.0			
65	19.0	100.0	100.0	100.0			
66	25.0	100.0	100.0	100.0			
67	21.0	100.0	100.0	100.0			
68	21.0	100.0	100.0	100.0			
69	21.0	100.0	100.0	100.0			
70	40.0	100.0	100.0	100.0			
71	40.0	100.0	100.0	100.0			
72	40.0	100.0	100.0	100.0			
73	40.0	100.0	100.0	100.0			
74	40.0	100.0	100.0	100.0			
75	100.0	100.0	100.0	100.0			

<sup>(1)</sup> Retirement rate is 100% after a member accrues a benefit of 100% of final average earnings.

# Actuarial Methods and Assumptions

(Continued)

Retirement Age and Benefit for Deferred Vested Members: For deferred vested members, we make the following retirement age assumptions:

General Age: 57 Safety Age: 53

We assume that 25% of future General and 30% of future Safety deferred vested members are reciprocal. For reciprocals, we assume 4.75% compensation increases per annum.

Liability Calculation for Current Deferred Vested Members:

Liability for a current deferred vested member is calculated based on salary, service, and eligibility for reciprocal benefit as provided by the Retirement System. For those members without salary information that have 3 or more years of service, we used an average salary. For those members without salary information that have less than 3 years of service or for those members without service information, we assumed a refund of account balance.

**Future Benefit Accruals:** 

1.0 year of service per year of employment. There is no assumption to anticipate conversion of unused sick leave at retirement.

Unknown Data for Members:

Same as those exhibited by members with similar known characteristics. If not specified, members are assumed to be male.

Percent Married:

80% of male members and 50% of female members are assumed to be married at retirement or time of pre-retirement death.

Age of Spouse:

Female (or male) three years younger (or older) than spouse.

Net Investment Return:

7.25%; net of investment and administrative expenses.

**Employee Contribution** Crediting Rate:

5.00%, compounded semi-annually.

**Consumer Price Index:** 

Increase of 3.25% per year, retiree COLA increases due to CPI subject to a 3.0% maximum change per year.

# Actuarial Methods and Assumptions

(Continued)

# Salary Increases:

## Annual Rate of Compensation Increase (%)

Inflation: 3.25% per year, plus "across the board" salary increases of 0.50% per year, plus the following merit and promotion increases:

Years of Service	General	Safety
Less than 1	10.00%	14.00%
1	7.00	9.00
2	6.00	8.00
3	5.00	7.00
4	4.00	5.00
5	3.00	4.00
6	2.00	3.00
7	1.75	3.00
8	1.50	2.00
9	1.25	2.00
10	1.25	1.50
11	1.25	1.50
12	1.25	1.50
13	1.25	1.50
14	1.25	1.50
15	1.25	1.50
16	1.00	1.00
17	1.00	1.00
18	1.00	1.00
19	1.00	1.00
20 & over	1.00	1.00

# Actuarial Methods and Assumptions

(Continued)

# **Annual Payoffs Assumptions:**

Non-CalPEPRA Formulas:

Additional compensation amounts are expected to be received during a member's final average earnings period. The percentages used in this valuation are:

	Final One <u>Year Salary</u>	Final Three Year Salary
General Members	4.00%	2.70%
Safety - Probation	5.20%	2.70%
Safety - Law	6.60%	4.50%
Safety - Fire	4.00%	2.00%

The annual payoffs assumptions are the same for service and disability retirements.

CalPEPRA Formulas:

None

Actuarial Value of Assets:

Market value of assets less unrecognized returns in each of the last five years. Unrecognized return in equal to the difference between the actual and the expected return on a market value basis, and is recognized over a five-year period.

Valuation Value of Assets:

The Valuation Value of Assets is the Actuarial Value of Assets reduced by the value of the non-valuation reserves.

Actuarial Cost Method:

Entry Age Normal Actuarial Cost Method. Entry Age is the current age minus Vesting Credit. Normal Cost and Actuarial Accrued Liability are calculated on an individual basis and are allocated by salaries, with Normal Cost determined as a level percentage of individual salary, as if the current benefit accrual rate had always been in effect. The outstanding balance of the December 31, 2004 Unfunded Actuarial Accrued Liability is amortized over a declining 22-year period. The outstanding balance of the UAAL established in the December 31, 2009 valuation as a result of including additional premium pay items as pensionable salary and the new UAAL established in the December 31, 2010 valuation as a result of reallocating contributions and benefit payments among Rate Groups are also amortized over a 22-year period, in the December 31, 2012 valuation. Any increases or decreases in Unfunded Actuarial Accrued Liability that arise in future years due to actuarial gains or losses will be amortized over separate 15-year periods. Any increases or decreases in UAAL due to changes in actuarial assumptions are amortized over separate 30-year periods.

Please note that for Probation members who have prior benefit service in another General OCERS plan, the normal cost rate for the current plan is calculated assuming their Entry Age is the date they entered service with their current plan.

This section summarizes the major provisions of OCERS included in the valuation. It is not intended to be, nor should it be interpreted as, a complete statement of all plan provisions.

# Membership Eligibility:

Membership with OCERS begins with the day of employment in an eligible position by the County or a participating employer.

#### Non-CalPEPRA General Plans

2.5% @ 55 Plans (Orange County Sanitation District and Law Library<sup>(1)</sup>)

Plan G General members hired before September 21, 1979.

Plan H General members hired on or after September 21, 1979. (Sanitation District members within Supervisors and Professional unit hired on or after October 1, 2010 are in Plan B)

2.7% @ 55 Plans (City of San Juan Capistrano, Orange County Employees except bargaining unit AFSCME members, Orange County Superior Court, Orange County Local Agency Formation Commission<sup>(1)</sup>, Orange County Employees Retirement System<sup>(2)</sup>, Children and Family Commission<sup>(3)</sup> and Orange County Fire Authority)

Plan I General members hired before September 21, 1979.

Plan J General members hired on or after September 21, 1979.

(1) Improvement is prospective only for service after June 23, 2005.

2.0% @ 55 Plans (Transportation Corridor Agency, Cemetery District - future service effective December 7, 2007 and General OCFA employees effective July 1, 2011)

Plan M General members hired before September 21, 1979.

Plan N General members hired on or after September 21, 1979.

1.62% @ 65 Plans (Orange County Employees, Orange County Superior Court, Orange County Local Agency Formation Commission and Orange County Managers Unit)

Plan O County OCEA members and Superior Court members rehired on or after May 7, 2010, LAFCO members rehired on or after July 1, 2010 and County Managers unit members rehired on or after August 17, 2010 and not electing to rejoin Plan I.

Plan P County OCEA members and Superior Court members hired on or after May 7, 2010, LAFCO members hired on or after July 1, 2010 and County Managers unit members hired on or after August 17, 2010 and not electing Plan J.

2.0% @ 57 Plan (City of San Juan Capistrano)

Plan S General members hired on or after July 1, 2012.

All Other General Employers

Plan A General members hired before September 21, 1979.

Plan B General members hired on or after September 21, 1979 and Sanitation District members within Supervisors and Professional unit hired on or after October 1, 2010.

<sup>(2)</sup> Improvement for management employees is prospective only for service after June 30, 2005.

<sup>(3)</sup> Improvement is prospective only for service after December 22, 2005.

(Continued)

# Membership Eligibility: (Continued)

#### Non-CalPEPRA Safety Plans

3% @ 50 Plans (Law Enforcement, Fire Authority and Probation)

Plan E Safety members hired before September 21, 1979.

Plan F Safety members hired on or after September 21, 1979 and before April 9, 2010 for Law Enforcement, before July 1, 2011 for Safety employees of OCFA Executive Management, and before July 1, 2012 for other OCFA Safety employees.

3% @ 55 Plans (Law Enforcement and Fire Authority)

Plan Q Safety Law Enforcement members rehired on or after April 9, 2010, Safety employees of OCFA Executive Management rehired on or after July 1, 2011, and other OCFA Safety employees rehired on or after July 1, 2012 and previously in Plan E.

Plan R Safety Law Enforcement members hired on or after April 9, 2010, Safety employees of OCFA Executive Management hired on or after July 1, 2011, and other OCFA Safety employees hired on or after July 1, 2012.

#### CalPEPRA General Plans

1.62% @ 65 Plan (Orange County Employees except County Attorneys, Orange County Employees Retirement System except Management Employees, Children and Family Commission, Local Agency Formation Commission, and Orange County Superior Court)

Plan T General members with membership dates on or after January 1, 2013.

2.5% @ 67 Plan (All Other General Employers, Orange County Attorneys, Orange County Employees Retirement System Management Employees)

Plan U General members with membership dates on or after *January 1, 2013*.

#### CalPEPRA Safety Plans

2.7% @ 57 Plan (Law Enforcement, Fire Authority and Probation Members)

Plan V Safety members with membership dates on or after January 1, 2013.

(Continued)

# Final Compensation for Benefit Determination:

Plans A, E, G, I, M, O and Q Highest consecutive twelve months of compensation

earnable. (§31462.1) (FAS1)

Plans B, F, H, J, N, P, R and S Highest consecutive thirty-six months of compensation

earnable. (§31462) (FAS3)

Plans T, U and V Highest consecutive thirty-six months of pensionable

compensation. (\$7522.10(c), \$7522.32 and \$7522.34) (FAS3)

## Service:

Years of service. (Yrs)

## Service Retirement Eligibility:

Plans A, B, G, H, I, J, M, N, O, P, S and T Age 50 with 10 years of service, or age 70 regardless of

service, or after 30 years, regardless of age. (§31672)

All part time employees over age 55 with 10 years of

employment may retire with 5 years of service.

Plan U Age 52 with 5 years of service. (§7522.20(a))

Plans E, F, Q and R Age 50 with 10 years of service, or after 20 years, regardless

of age. (§31663.25)

All part time employees over age 55 with 10 years of

employment may retire with 5 years of service.

Plan V Age 50 with 5 years of service. (\$7522.20(d))

(Continued)

# Benefit Formula: General Plans

2.5% @ 55	Retirement Age	Benefit Formula
Plan G (§31676.18)	50	(2.00% x FAS1 x Yrs)
Tier 1	55	(2.50% x FAS1 x Yrs)
	60	(2.50% x FAS1 x Yrs)
	62	(2.62% x FAS1 x Yrs)*
	65 or later	(2.62% x FAS1 x Yrs)*
Plan H (§31676.18)	50	(2.00% x FAS3 x Yrs)
Tier 2	55	(2.50% x FAS3 x Yrs)
	60	(2.50% x FAS3 x Yrs)
	62	(2.50% x FAS3 x Yrs)
	65 or later	(2.50% x FAS3 x Yrs)

2.7% @ 55	Retirement Age	Benefit Formula
Plan I (§31676.19)	50	(2.00% x FAS1 x Yrs)
Tier 1	55	(2.70% x FAS1 x Yrs)
	60	(2.70% x FAS1 x Yrs)
	62	(2.70% x FAS1 x Yrs)
	65 or later	(2.70% x FAS1 x Yrs)
Plan J (§31676.19)	50	(2.00% x FAS3 x Yrs)
Tier 2	55	(2.70% x FAS3 x Yrs)
	60	(2.70% x FAS3 x Yrs)
	62	(2.70% x FAS3 x Yrs)
	65 or later	(2.70% x FAS3 x Yrs)

2.0% @ 55	Retirement Age	Benefit Formula
Plan M (§31676.16)	50	(1.43% x FAS1 x Yrs)
Tier 1	55	(2.00% x FAS1 x Yrs)
	60	(2.34% x FAS1 x Yrs)**
	62	(2.62% x FAS1 x Yrs)**
	65 or later	(2.62% x FAS1 x Yrs)**
Plan N (§31676.16)	50	(1.43% x FAS3 x Yrs)
Tier 2	55	(2.00% x FAS3 x Yrs)
	60	(2.26% x FAS3 x Yrs)
	62	(2.37% x FAS3 x Yrs)
	65 or later	(2.43% x FAS3 x Yrs)***

<sup>\*</sup> Reflects benefit factors from Plan A as they provide a better benefit than those under 2.5% @ 55.

<sup>\*\*</sup> Reflects benefit factors from Plan A as they provide a better benefit than those under 2.0% @ 55.

<sup>\*\*\*</sup> Reflects benefit factors from Plan B as they provide a better benefit than those under 2.0% @ 55.

(Continued)

# Benefit Formula: General Plans (Continued)

1.62% @ 65	Retirement Age	Benefit Formula
Plan O (§31676.01)	50	(0.79% x FAS1 x Yrs)
Tier 1	55	(0.99% x FAS1 x Yrs)
	60	(1.28% x FAS1 x Yrs)
	62	(1.39% x FAS1 x Yrs)
	65 or later	(1.62% x FAS1 x Yrs)
Plan P and Plan T	50	(0.79% x FAS3 x Yrs)
(§31676.01)	55	(0.99% x FAS3 x Yrs)
Tier 2	60	(1.28% x FAS3 x Yrs)
	62	(1.39% x FAS3 x Yrs)
	65 or later	(1.62% x FAS3 x Yrs)

	2.0% @ 57	Retirement Age	Benefit Formula
	Plan S (§31676.12)	50	(1.34% x FAS3 x Yrs)
	Tier 2	55	(1.77% x FAS3 x Yrs)
ı		60	(2.34% x FAS3 x Yrs)
		62	(2.62% x FAS3 x Yrs)
		65 or later	(2.62% x FAS3 x Yrs)

All Other General Members	Retirement Age	Benefit Formula
Plan A (§31676.12)	50	(1.34% x FAS1 x Yrs)
Tier 1	55	(1.77% x FAS1 x Yrs)
	60	(2.34% x FAS1 x Yrs)
	62	(2.62% x FAS1 x Yrs)
	65 or later	(2.62% x FAS1 x Yrs)
Plan B (§31676.1)	50	(1.18% x FAS3 x Yrs)
Tier 2	55	(1.49% x FAS3 x Yrs)
	60	(1.92% x FAS3 x Yrs)
	62	(2.09% x FAS3 x Yrs)
	65 or later	(2.43% x FAS3 x Yrs)

All Other General Members	Retirement Age	Benefit Formula
Plan U	52	(1.00% x FAS3 x Yrs)
(§7522.20(a))	55	(1.30% x FAS3 x Yrs)
	60	(1.80% x FAS3 x Yrs)
	62	(2.00% x FAS3 x Yrs)
	65	(2.30% x FAS3 x Yrs)
	67 or later	(2.50% x FAS3 x Yrs)

(Continued)

# Benefit Formula: Safety Plans

3% @ 50	Retirement Age	Benefit Formula
Plan E (§31664.1)	50	(3.00% x FAS1 x Yrs)
Tier 1	55	(3.00% x FAS1 x Yrs)
	60 or later	(3.00% x FAS1 x Yrs)
Plan F (§31664.1)	50	(3.00% x FAS3 x Yrs)
Tier 2	55	(3.00% x FAS3 x Yrs)
	60 or later	(3.00% x FAS3 x Yrs)

3% @ 55	Retirement Age	Benefit Formula
Plan Q (§31664.2)	50	(2.29% x FAS1 x Yrs)
Tier 1	55	(3.00% x FAS1 x Yrs)
	60 or later	(3.00% x FAS1 x Yrs)
Plan R (§31664.2)	50	(2.29% x FAS3 x Yrs)
Tier 2	55	(3.00% x FAS3 x Yrs)
	60 or later	(3.00% x FAS3 x Yrs)

3% @ 55	Retirement Age	Benefit Formula
Plan V	50	(2.00% x FAS3 x Yrs)
(§7522.25(d))	55	(2.50% x FAS3 x Yrs)
	57 or later	(2.70% x FAS3 x Yrs)

## **Maximum Benefit:**

Plans A, B, E, F, G, H, I, J, M, N, O, P, Q, R, S and T

100% of Highest Average Compensation (\$31676.01, \$31676.1, \$31676.12, \$31676.16, \$31676.18, \$31676.19, \$31664.1, \$31664.2)

Plans U and V

None

(Continued)

# **Ordinary Disability:**

**General Plans** 

Plans A, B, G, H, I, J, M, N, O, P, S, T and U

**Eligibility** Five years of service. (§31720)

Benefit Formula Plans A, G, I, M, and O: 1.8% per year of service. If the benefit does not exceed

one-third of Final Compensation, the service is projected to 62, but the total benefit

cannot be more than one-third of Final Compensation. (§31727.1)

**Plans B, H, J, N, P, S, T and U:** 1.5% per year of service. If the benefit does not exceed one-third of Final Compensation, the service is projected to 65, but the total

benefit cannot be more than one-third of Final Compensation. (§31727)

Safety Plans

Plans E, F, Q, R and V

**Eligibility** Five years of service. (§31720)

Benefit Formula 1.8% per year of service. If the benefit does not exceed one-third of

Final Compensation, the service is projected to 55, but the total benefit cannot be more than one-third of Final Compensation (§31727.2).

For all members, 100% of the service retirement benefit will be paid, if greater.

# Line-of-Duty Disability:

**All Members** 

Eligibility No age or service requirements. (§31720)

Benefit Formula 50% of the Final Compensation or 100% of Service Retirement benefit, if greater.

(§31727.4)

#### Pre-Retirement Death:

All Members

Eligibility None.

**Benefit** Refund of employee contributions with interest plus one month's compensation for

each year of service to a maximum of six month's compensation. (§31781) A lump sum benefit in the amount of \$1,000 is payable upon death of a member (with 10

years of service) to his/her eligible beneficiary. (§31790)

Death in line of duty 50% of Final Compensation or 100% of Service Retirement benefit, if greater,

payable to spouse or minor-children. (§31787).

OR

**Vested Members** 

**Eligibility** Five years of service.

**Benefit** 60% of the greater of Service or Ordinary Disability Retirement benefit payable to

eligible surviving spouse (§31765.1, §31781.1), in lieu of §31781.

(Continued)

## **Death After Retirement:**

All Members

Service or Ordinary

60% of member's unmodified allowance continued to eligible spouse. (§31760.1) **Disability Retirement** A lump sum benefit in the amount of \$1,000 is payable upon death of a member (with 10 years of service) to his/her eligible beneficiary. (§31790) An eligible spouse is a surviving spouse who was married to the member at least one year prior to the date of retirement. (§31760.1)

Line-of-Duty Disability

100% of member's allowance continued to eligible spouse. (§31786) A lump sum benefit in the amount of \$1,000 is payable upon death of a member (with 10 years of service) to his/her eligible beneficiary. (§31790)

### Withdrawal Benefits:

Less than Five Year of Service

Refund of accumulated employee contributions with interest or earned benefit at age 70 (§31628). Effective January 1, 2003, a member may also elect to leave their contributions on deposit in the retirement fund. (§31629.5)

Five or More Years of Service

If contributions left on deposit, entitled to earned benefits commencing at any time after eligible to retire. (§31700)

# Post-retirement Cost-of-Living Benefits:

Future changes based on Consumer Price Index to a maximum of 3% per year, excess "banked." (§31870.1)

# Supplemental Benefit:

Non-vested supplemental COLA and medical benefits are also paid by the System to eligible retirees and survivors. These benefits have been excluded from this valuation.

# **Member Contributions:**

Non-CalPEPRA General Plans:

Plan A

Provide for an average annuity at age 60 equal to 1/200 of FAS1. (§31621.5) **Basic** 

Cost-of-Living Provide for 50% of future Cost-of-Living costs.

Plan B

**Basic** Provide for an average annuity at age 60 equal to 1/120 of FAS3. (§31621)

Cost-of-Living Provide for 50% of future Cost-of-Living costs.

(Continued)

## Member Contributions: (Continued)

Plans G, H, I and J

Basic Provide for an average annuity at age 55 equal to 1/100 of FAS3 (FAS1 for Plans

G and I). (§31621.8)

**Cost-of-Living** Provide for 50% of future Cost-of-Living costs.

Plan M, N, O and P:

Basic Provide for an average annuity payable at age 60 equal to 1/120 of FAS3 (FAS1

for Plans M and O). (§31621)

**Cost-of-Living** Provide for 50% of future Cost-of-Living costs.

Plan S

Basic Provide for an average annuity at age 60 equal to 1/100 of FAS3. (§31621.2)

**Cost-of-Living** Provide for 50% of future Cost-of-Living costs.

Non-CalPEPRA Safety Plans:

Plans E and Q

**Basic** Provide for an average annuity at age 50 equal to 1/200 FAS1. (§31639.5)

**Cost-of-Living** Provide for 50% of future Cost-of-Living costs.

Plans F and R

Basic Provide for an average annuity at age 50 equal to 1/100 of FAS3. (§31639.25)

**Cost-of-Living** Provide for 50% of future Cost-of-Living costs.

CalPEPRA Plans:

Plans T, U and V 50% of total Normal Cost rate.

## Other Information:

Non-CalPEPRA Safety members with 30 or more years of service are exempt from paying member contributions. The same applies for General members hired on or before March 7, 1973.

**Note:** The summary of major plan provisions is designed to outline principal plan benefits as interpreted for purposes of the actuarial valuation. If the System should find the plan summary not in accordance with the actual provisions, the System should alert the actuary so that both can be sure the proper provisions are valued.

# **Experience Analysis**

(Dollars in Thousands)

## Gains & Losses in Actuarial Accrued Liabilities During Years Ended December 31, Resulting from Differences Between Assumed Experience & Actual Experience

	Differences Bet	ween rissumed La	perience ex rictu	ar Experience	
		(54,911)            (97,561)       \$77,858       \$215,936       \$154,946         (57,752)       (322,523)       (224,044)       (388,935)         (17,159)       (14,931)       63,174       (38,159)         (427,383)       \$(259,596)       \$55,066       \$(272,148)			
Type of Activity	2008	2009	2010	2011	2012
Retirements	\$(54,911)				
Pay Increases	(97,561)	\$77,858	\$215,936	\$154,946	\$244,750
Investment Income	(257,752)	(322,523)	(224,044)	(388,935)	(387,808)
Other	(17,159)	(14,931)	<u>63,174</u>	(38,159)	(19,979)
Gain (or Loss) During Year From Experience	\$(427,383)	\$(259,596)	\$55,066	\$(272,148)	\$(163,037)
Nonrecurring Items:					
Plan Amendments and Assumption Changes	(115,764)			(363,842)	(934,619)
Correction to Include All Premium Pay Items		(228,051)			
Composite Gain (or Loss) During Year	\$(543,147)	\$(487,647)	\$55,066	\$(635,990)	\$(1,097,656)

# **Actuarial Certification**

#### **ACTUARIAL CERTIFICATION**

- This report presents the County of Orange Retiree Healthcare Plan ("Plan") June 30, 2011 actuarial valuation. The purpose of this valuation is to:
  - Determine the Governmental Accounting Standards Board Statement Nos. 43 and 45 June 30, 2011 Benefit Obligations,
  - Determine the Plan's June 30, 2011 Funded Status, and
  - Calculate the 2011/12 and 2012/13 Annual Required Contributions.
- The report provides information intended for reporting under GASB 43 and 45, but may not be appropriate for other purposes. Information provided in this report may be useful to the County for the Plan's financial management. Future valuations may differ significantly if the Plan's experience differs from our assumptions or if there are changes in Plan design, actuarial methods or actuarial assumptions. The project scope did not include an analysis of this potential variation.
- The valuation is based on Plan provisions, participant data, and asset information provided by the County as summarized in this report, which we relied on and did not audit. We reviewed the participant data for reasonableness.
- To the best of our knowledge, this report is complete and accurate and has been conducted using generally accepted actuarial principals and practices. Additionally, in our opinion, actuarial methods and assumptions comply with GASB 43 and 45. As members of the American Academy of Actuaries meeting the Academy Qualification Standards, we certify the actuarial results and opinions herein.

Respectfully submitted,

TRE B. Bath

John E. Bartel, ASA, MAAA, FCA President Bartel Associates, LLC July 3, 2012 Catherine a. Wandro

Catherine A. Wandro, ASA, MAAA Assistant Vice President Bartel Associates, LLC July 3, 2012





# **Actuarial Certification**

(Continued)

#### SECTION VIII. ACTUARIAL CERTIFICATION

The results set forth in this report are based on the actuarial valuation of the retiree medical program of Orange County Fire Authority (OCFA) as of July 1, 2012.

The valuation was performed in accordance with generally accepted actuarial principles and practices and in accordance with GASB Statements No. 43 & 45. We relied on census data for active employees and retirees provided to us by OCFA. We also made use of plan information, premium information, and enrollment information provided to us by OCFA.

The assumptions used in performing the valuation, as summarized in this report, and the results based thereupon, represent our best estimate of anticipated experience and actuarial cost of the retiree medical benefits program.

I am a member of the American Academy of Actuaries and believe I meet the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained herein.

Certified by:

Marilyn K. Jones, ASA, EA, MAAA, FCCA

**Consulting Actuary** 

Date: 4/10/2013

ORANGE COUNTY

EMPLOYEES RETIREMENT SYSTEM

STATISTICAL

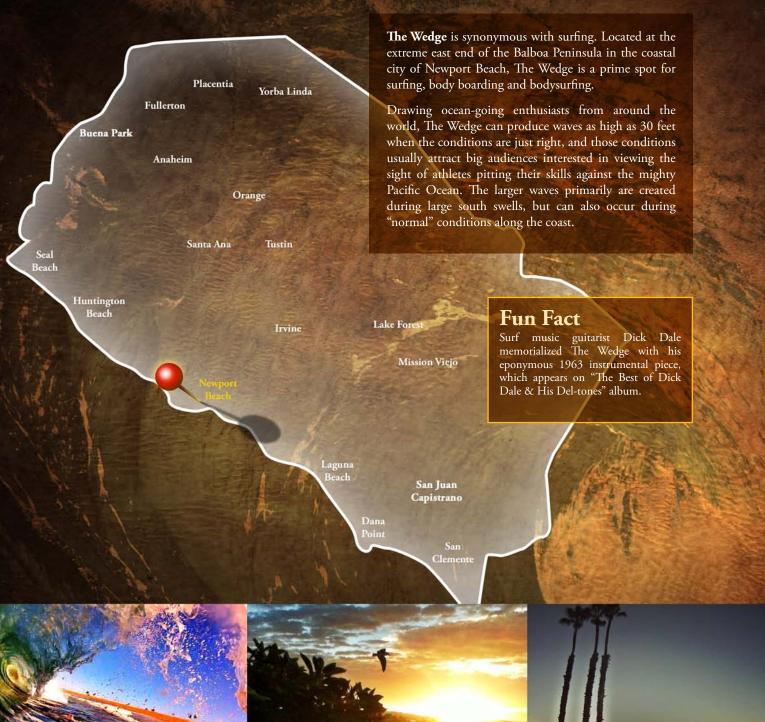
Section V



Newport Beach, California

The Wedge

# The Wedge



# Statistical Section Review

The Statistical Section of the Comprehensive Annual Financial Report provides additional information in order to promote a more comprehensive understanding of the financial statements, note disclosures and supplemental information.

The Governmental Accounting Standards Board (GASB) established five categories of information to be provided in the Statistical Section: Financial Trends, Revenues, Expenses, Demographic and Economic, and Operating Information.

This section provides multi-year trend information to facilitate an understanding of how OCERS as an organization has changed over time.



# Schedule of Changes in Fiduciary Net Position

2003 – 2012 (Dollars in Thousands)

Years Ended December 31	2003	2004	2005	2006	2007
Additions		·			
Pension Trust Fund					
Employer Contributions	\$124,243	\$194,430	\$226,130	\$277,368	\$401,037
Employee Contributions	81,581	81,931	107,544	137,582	159,476
Investment Income	788,036	568,027	460,431	828,147	763,117
Net Securities Lending	872	857	1,425	1,317	3,452
Commission Recapture-Net/Other	178	116	123	736	1,773
Health Care Funds					
Employer Contributions	N/A	N/A	N/A	N/A	N/A
Investment Income	N/A	N/A	N/A	N/A	N/A
Net Securities Lending	N/A	N/A	N/A	N/A	N/A
Commission Recapture-Net/Other	N/A	N/A	N/A	N/A	N/A
Total Additions	\$994,910	\$845,361	\$795,653	\$1,245,150	<u>\$1,328,855</u>
Deductions					
Pension Trust Fund					
Benefits	\$216,685	\$238,529	\$264,927	\$318,666	\$353,861
Administrative Expenses	8,848	9,463	9,953	17,145	10,381
Health Care Funds					
Benefits	N/A	N/A	N/A	N/A	N/A
Administrative Expenses	N/A	N/A	N/A	N/A	N/A
Total Deductions	\$225,533	\$247,992	<u>\$274,880</u>	\$335,811	<u>\$364,242</u>
Changes in Fiduciary Net Position	\$769,377	<u>\$597,369</u>	<u>\$520,773</u>	\$909,339	<u>\$964,613</u>

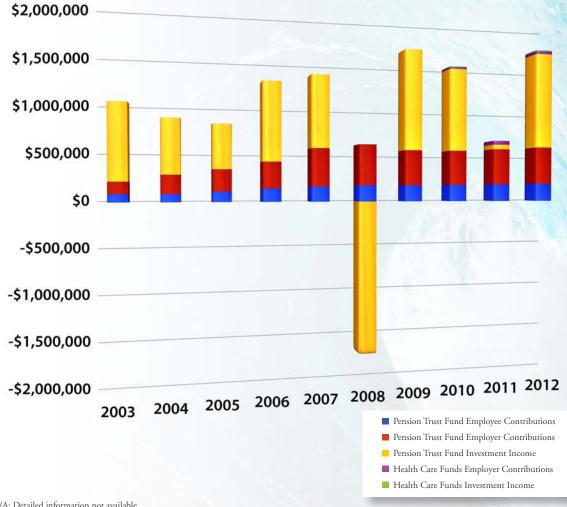
Years Ended December 31	2008	2009	2010	2011	2012
Additions		·			
Pension Trust Fund					
Employer Contributions	\$433,911	\$377,976	\$372,437	\$387,585	\$406,805
Employee Contributions	172,291	171,928	177,929	183,820	191,215
Investment Income	(1,627,177)	1,073,912	885,569	46,669	1,001,650
Net Securities Lending	6,145	3,989	1,849	1,703	2,007
Commission Recapture-Net/Other	1,249	2,161	1,124	2,084	1,113
Health Care Funds					
Employer Contributions	N/A	N/A	18,216	43,354	30,985
Investment Income	N/A	N/A	9,906	(675)	12,030
Net Securities Lending	N/A	N/A	21	21	24
Commission Recapture-Net/Other	N/A	N/A	13	27	14
Total Additions	\$(1,013,581)	\$1,629,966	\$1,467,064	\$664,588	\$1,645,843
Deductions					
Pension Trust Fund					
Benefits	\$419,502	\$461,530	\$459,383	\$493,749	\$541,154
Administrative Expenses	11,006	10,947	12,368	12,828	14,209
Health Care Funds					
Benefits	N/A	N/A	27,672	28,899	29,893
Administrative Expenses	N/A	N/A	27	27	28
Total Deductions	\$430,508	\$472,477	\$499,450	\$535,503	\$585,284
Changes in Fiduciary Net Position	<u>\$(1,444,089)</u>	<u>\$1,157,489</u>	<u>\$967,614</u>	<u>\$129,085</u>	<u>\$1,060,559</u>

N/A: Detailed information not available.

# Schedule and Graph of Fiduciary Revenues by Source

2003 - 2012(Dollars in Thousands)

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Pension Trust Fund										
Employee Contributions	\$81,581	\$81,931	\$107,544	\$137,582	\$159,476	\$172,291	\$171,928	\$177,929	\$183,820	\$191,215
Employer Contributions	124,243	194,430	226,130	277,368	401,037	433,911	377,976	372,437	387,585	406,805
Investment Income <sup>1</sup>	789,086	569,000	461,979	830,200	768,342	(1,619,783)	1,080,062	888,542	50,456	1,004,770
Health Care Funds										
Employer Contributions	N/A	N/A	N/A	N/A	N/A	N/A	N/A	18,216	43,354	30,985
Investment Income <sup>1</sup>	N/A	N/A	N/A	N/A	N/A	N/A	N/A	9,940	(627)	12,068
Total	\$994,910	\$845,361	\$795,653	\$1,245,150	\$1,328,855	\$(1,013,581)	\$1,629,966	\$1,467,064	\$664,588	\$1,645,843



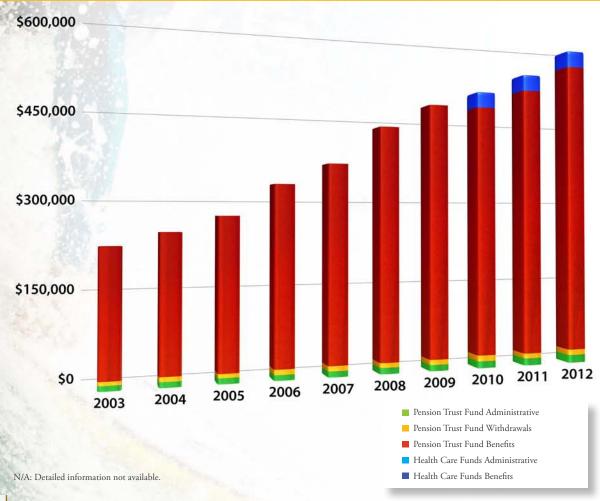
N/A: Detailed information not available.

<sup>&</sup>lt;sup>1</sup> Investment Income includes net appreciation (depreciation) less investment manager fees, security lending fees and commission recapture.

# Schedule and Graph of Expenses by Type

2003 – 2012 (Dollars in Thousands)

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Pension Trust Fund										
Administrative	\$8,848	\$9,463	\$9,953	\$9,600	\$10,381	\$11,006	\$10,947	\$12,368	\$ 12,828	\$ 14,209
Withdrawals										
Separation	5,450	6,982	6,439	8,073	8,007	7,022	7,604	8,566	6,833	8,078
Death	962	863	560	897	792	1,337	1,448	1,880	2,041	2,019
Benefits	210.273	230,684	257,928	309,696	345,062	411,143	452,478	448,937	484,875	531,057
Health Care Funds										
Administrative	N/A	27	27	28						
Benefits	N/A	27,672	28,899	29,893						
Total	\$225,533	\$247,992	\$274,880	\$328,266	\$364,242	\$430,508	\$472,477	\$499,450	\$535,503	\$585,284

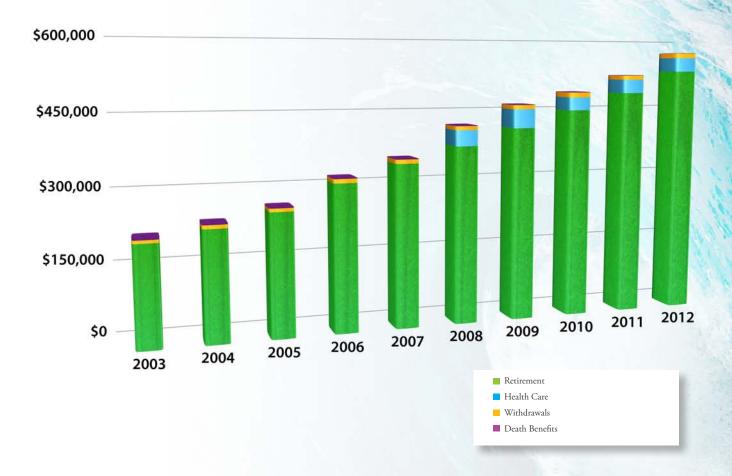


**Statistical** 

# Schedule and Graph of Benefit Expenses by Type

2003 – 2012 (Dollars in Thousands)

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Retirement	\$208,861	\$230,225	\$257,396	\$309,102	\$344,321	\$376,937	\$411,959	\$448,099	\$484,012	\$530,269
Health Care <sup>1</sup>	N/A	N/A	N/A	N/A	N/A	33,480	39,858	27,672	28,899	29,893
Withdrawals	6,412	7,845	6,999	8,970	8,799	8,359	9,052	10,446	8,874	10,097
Death Benefits	1,412	459	532	594	741	726	661	838	863	788
Total	\$216,685	\$238,529	\$264,927	\$318,666	\$353,861	\$419,502	\$461,530	\$487,055	\$522,648	\$571,047



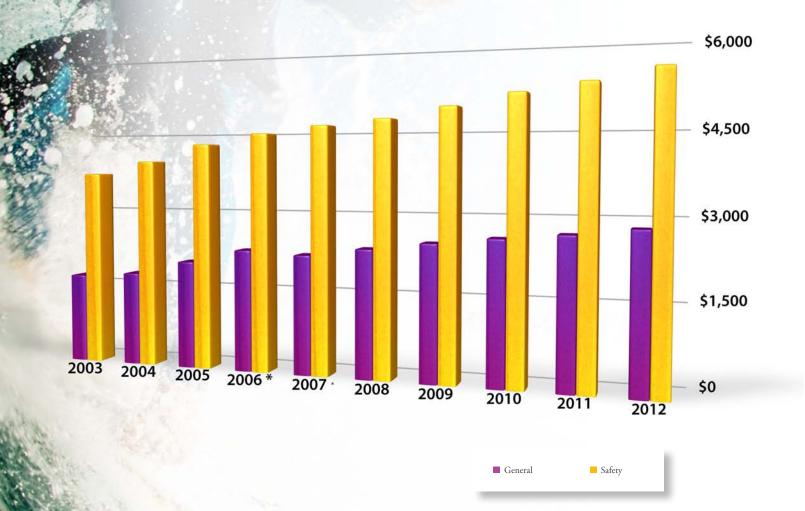
N/A: Detailed information not available.

<sup>1</sup> Health care benefits for 2008 and 2009 encompass all plans, including 401(h), which are reported as trust funds, and 115, which are reported as agency funds.

# Schedule and Graph of Average Monthly Pension Check

2003 - 2012

Years Ended December 31	2003	2004	2005	2006*	2007	2008	2009	2010	2011	2012
General	\$1,691	\$1,766	\$2,031	\$2,286	\$2,228	\$2,373	\$2,508	\$2,621	\$2,714	\$2,836
Safety	\$3,713	\$3,959	\$4,283	\$4,479	\$4,618	\$4,724	\$4,926	\$5,141	\$5,297	\$5,516



\* Year 2006 includes health grant Source: OCERS' Pension Gold Information System

# Schedule of Average Pension Benefit Payment by Years of Service

				Years of S	ervice		
Service Retirement Effective Dates	0-5	5-10	10-15	15-20	20-25	25-30	30 & Over
Period 1/1/03 - 12/31/03							
Average Monthly Pension Benefits	\$457	\$599	\$1,109	\$1,695	\$2,566	\$4,136	\$5,628
Monthly Final Average Salary	\$3,123	\$3,476	\$4,160	\$4,453	\$4,821	\$5,636	\$6,311
Number of Retired Members	14	28	92	88	106	100	116
Period 1/1/04 - 12/31/04							
Average Monthly Pension Benefits	\$328	\$811	\$1,134	\$1,793	\$3,075	\$4,550	\$6,183
Monthly Final Average Salary	\$2,086	\$3,697	\$4,267	\$4,536	\$5,451	\$6,188	\$7,064
Number of Retired Members	19	37	77	69	70	61	87
Period 1/1/05 - 12/31/05							
Average Monthly Pension Benefits	\$503	\$731	\$1,496	\$2,316	\$3,101	\$4,760	\$5,877
Monthly Final Average Salary	\$3,253	\$4,181	\$4,585	\$5,223	\$5,227	\$6,374	\$6,567
Number of Retired Members	19	43	129	125	150	169	282
Period 1/1/06 - 12/31/06							
Average Monthly Pension Benefits	\$448	\$788	\$1,608	\$2,389	\$3,368	\$4,898	\$6,112
Monthly Final Average Salary	\$3,770	\$4,031	\$4,952	\$5,198	\$5,668	\$6,474	\$6,789
Number of Retired Members	15	46	129	167	129	174	155
Period 1/1/07 - 12/31/07							
Average Monthly Pension Benefits	\$368	\$817	\$1,593	\$2,407	\$3,366	\$5,626	\$6,401
Monthly Final Average Salary	\$2,213	\$4,206	\$5,065	\$5,239	\$5,714	\$7,219	\$7,223
Number of Retired Members	16	45	110	111	100	145	104
Period 1/1/08 - 12/31/08							
Average Monthly Pension Benefits	\$321	\$876	\$1,784	\$2,451	\$3,793	\$5,323	\$7,687
Monthly Final Average Salary	\$2,539	\$4,166	\$5,512	\$5,330	\$6,484	\$6,864	\$8,424
Number of Retired Members	19	31	83	90	78	91	97
Period 1/1/09 - 12/31/09							
Average Monthly Pension Benefits	\$381	\$950	\$1,821	\$2,716	\$3,711	\$5,852	\$7,467
Monthly Final Average Salary	\$3,766	\$4,228	\$5,564	\$6,006	\$6,417	\$7,669	\$8,378
Number of Retired Members	26	45	102	87	110	106	97
Period 1/1/10 - 12/31/10							
Average Monthly Pension Benefits	\$587	\$986	\$1,855	\$2,929	\$4,046	\$5,922	\$6,856
Monthly Final Average Salary	\$3,666	\$4,800	\$5,537	\$6,291	\$6,962	\$7,764	\$7,741
Number of Retired Members	23	45	108	106	130	127	129
Period 1/1/11 - 12/31/11							
Average Monthly Pension Benefits	\$678	\$1,057	\$1,689	\$3,054	\$4,257	\$5,910	\$6,766
Monthly Final Average Salary	\$4,843	\$5,825	\$5,475	\$6,497	\$7,314	\$7,874	\$7,650
Number of Retired Members	16	55	111	86	120	123	155
Period 1/1/12 - 12/31/12							
Average Monthly Pension Benefits	\$647	\$1,142	\$1,701	\$2,957	\$4,058	\$5,802	\$7,015
Monthly Final Average Salary	\$5,988	\$5,398	\$5,672	\$6,347	\$6,759	\$7,702	\$7,750
Number of Retired Members	20	71	128	88	187	145	172

Source: OCERS' Pension Gold Information System

# Schedule of Pension Benefit Recipients by Type of Benefit

December 31, 2012

Monthly Benefit	1	2	3	4	5	6	7	Total
\$1 – 500	593	127	3	4	17	67	31	842
\$501 – 1,000	1,004	238	_	32	43	71	127	1,515
\$1,001 – 1,500	1,162	169	27	89	27	53	91	1,618
\$1,501 – 2,000	987	138	101	65	17	40	41	1,389
\$2,001 – 2,500	986	96	250	28	33	33	21	1,447
\$2,501 – 3,000	771	77	168	17	25	19	13	1,090
\$3,001 – 3,500	691	49	135	3	15	12	6	911
\$3,501 – 4,000	563	31	115	8	16	8	5	746
\$4,001 – 4,500	509	20	79	4	4	6	7	629
\$4,501 – 5,000	486	22	42	-	2	4	3	559
\$5,001 – 5,500	424	5	28	2	5	1	4	469
\$5,501 – 6,000	407	10	20	4	1	-	1	443
\$6,001 – 6,500	331	9	14	-	4	-	1	359
\$6,501 – 7,000	318	3	16	-	-	-	1	338
Over \$7,000	1,507	9	61	4	9	-	2	1,592
Total	10,739	1,003	1,059	260	218	314	354	13,947

## **Definition of Terms**

**Eligible Spouse:** A member's spouse is considered eligible if the member has been married for at least one year at the time of retirement and remains married throughout the member's retirement.

**Eligible Child:** An eligible child is an unmarried child under the age of 18, or under the age of 22 if a full-time student.

#### Types of Retirement Benefit

- 1. Normal Retirement for Age and Service
- 2. Survivor Payment Normal Retirement
- 3. Service-Connected Disability Retirement
- 4. Nonservice-Connected Disability Retirement
- 5. Survivor Payment Disability Retirement
- 6. DRO (Domestic Relations Order payees)
- 7. Active Deaths

# Schedule of Pension Benefit Recipients by Option Selected

December 31, 2012

					07.5.6		
Monthly Benefit	JSURV	SL100	SL60	SLIFE	SLR60	UNMJS	Total
\$1 – 500	180	_	4	248	1	409	842
\$501 – 1,000	336	_	20	423	11	725	1,515
\$1,001 – 1,500	335	_	22	416	5	840	1,618
\$1,501 – 2,000	344	1	5	377	3	659	1,389
\$2,001 – 2,500	376	-	6	398	_	667	1,447
\$2,501 – 3,000	311	3	3	278	_	495	1,090
\$3,001 – 3,500	304	1	1	215	_	390	911
\$3,501 – 4,000	258	3	_	173	_	312	746
\$4,001 – 4,500	215	2	_	167	_	245	629
\$4,501 – 5,000	230	_	1	135	_	193	559
\$5,001 – 5,500	208	2	_	113	_	146	469
\$5,501 – 6,000	231	_	_	114	_	98	443
\$6,001 – 6,500	171	-	_	104	_	84	359
\$6,501 – 7,000	185	-	1	77	_	75	338
Over \$7,000	917	1	-	279	-	395	1,592
Total	4,601	13	63	3,517	20	5,733	13,947

# **Definition of Options:**

JSURV: Contingent joint survivor.

**SL100:** Single life with 100% joint survivor adjustment.

**SL60:** Single life with 60% adjustment.

SLIFE: Lifetime payment.

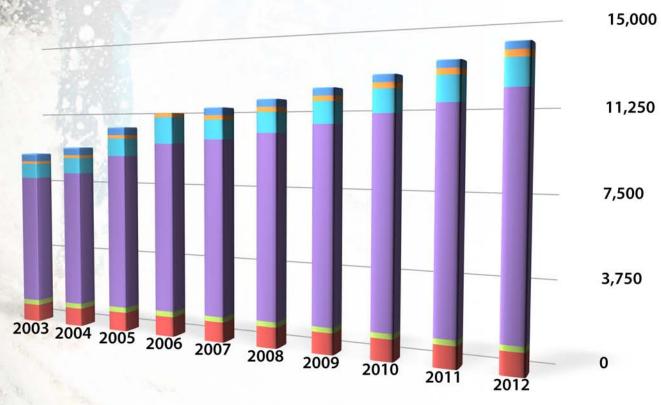
**SLR60:** Single life with 60% adjustment with reduction.

**UNMJS:** Unmodified with joint survivor.

# Schedule and Graph of Pension Benefit Recipients

2003 - 2012

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Service-Connected Disability	879	918	953	986	986	1,009	1,022	1,027	1,032	1,059
Nonservice-Connected Disability	264	258	269	269	257	258	252	254	259	260
Service Retirement	6,642	6,906	7,799	8,403	8,636	8,924	9,322	9,767	10,189	10,739
Survivors of Service and Disability Retirements	762	804	894	1,310	946	978	1,031	1,079	1,160	1,221
Qualified Domestic Relations Order Payees	129	153	174	203	221	238	248	272	289	314
Active Death Survivors	403	394	399	11	374	371	368	363	360	354
Total	9,079	9,433	10,488	11,182	11,420	11,778	12,243	12,762	13,289	13,947



Service-Connected DisabilityNonservice-Connected Disability

Survivors of Service and Disability RetirementsQualified Domestic Relations Order Payees

Service Retirement

■ Active Death Survivors

Source: OCERS' Pension Gold Information System

130 Statistical

# Schedule of Average Retirement Age

2003 - 2012

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
General	59.99	60.28	59.69	59.83	60.07	59.82	60.31	60.55	60.65	60.42
Safety	55.17	54.53	54.95	54.12	54.47	54.03	54.98	54.18	54.56	54.33

# Schedule of Average Years of Service at Retirement

2003 - 2012

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
General	20.93	19.59	23.59	21.17	20.04	20.44	20.79	20.53	20.82	20.88
Safety	25.13	23.52	22.94	23.09	24.66	23.77	22.63	23.91	25.27	24.41

# Schedule of Beneficiaries Receiving a Pension

2003 - 2012

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
General	1,068	1,089	1,175	1,200	1,190	1,214	1,253	1,286	1,352	1,398
Safety	97	109	118	121	130	135	146	156	168	177
Total	1,165	1,198	1,293	1,321	1,320	1,349	1,399	1,442	1,520	1,575

# Schedule of Active and Deferred Members

2003 - 2012

Years Ended December 31	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
General										
Active	19,006	18,935	18,812	19,101	19,803	19,795	18,873	18,155	17,717	17,559
Deferred	1,546	1,763	2,213	2,911	3,353	3,560	3,707	3,905	3,998	3,980
Safety										
Active	3,645	3,567	3,653	3,649	3,815	3,925	3,760	3,587	3,704	3,730
Deferred	119	147	196	267	293	321	387	403	408	402
Total	24,316	24,412	24,874	25,928	27,264	27,601	26,727	26,050	25,827	25,671

# Schedule of Participating Employers -Pension Plan

2003 - 2012

Years 1	Ended December 31	Total	Orange County	ОСТА	Superior Court <sup>2</sup>	Fire Authority	Sanitation District	City of San Juan Capistrano	TCA	All Other Sponsors
2003	# of Covered Employees <sup>1</sup>	22,651	18,538	2,021	_	1,057	572	94	115	254
P	% to Total System	100%	81.84%	8.92%	_	4.67%	2.53%	0.41%	0.51%	1.13%
2004	# of Covered Employees	22,502	16,908	2,048	1,458	1,061	593	102	92	240
	% to Total System	100%	75.14%	9.10%	6.48%	4.72%	2.64%	0.45%	0.41%	1.07%
2005	# of Covered Employees	22,465	16,776	1,976	1,617	1,066	602	90	94	244
	% to Total System	100%	74.68%	8.80%	7.20%	4.75%	2.68%	0.40%	0.42%	1.09%
2006	# of Covered Employees	22,750	16,971	1,940	1,726	1,092	603	91	86	241
	% to Total System	100%	74.60%	8.53%	7.59%	4.80%	2.65%	0.40%	0.38%	1.06%
2007	# of Covered Employees	23,618	17,702	2,012	1,845	1,116	598	93	86	166
	% to Total System	100%	74.95%	8.52%	7.81%	4.73%	2.53%	0.39%	0.36%	0.70%
2008	# of Covered Employees	23,720	17,798	2,022	1,812	1,121	615	93	93	166
	% to Total System	100%	75.03%	8.52%	7.64%	4.73%	2.59%	0.39%	0.39%	0.70%
2009	# of Covered Employees	22,633	17,021	1,836	1,711	1,114	611	88	92	160
	% to Total System	100%	75.20%	8.11%	7.56%	4.92%	2.70%	0.39%	0.41%	0.71%
2010	# of Covered Employees	21,742	16,486	1,639	1,635	1,064	594	87	79	158
	% to Total System	100%	75.83%	7.54%	7.52%	4.89%	2.73%	0.40%	0.36%	0.73%
2011	# of Covered Employees	21,421	16,084	1,549	1,638	1,244	596	80	80	150
	% to Total System	100%	75.09%	7.23%	7.65%	5.81%	2.78%	0.37%	0.37%	0.70%
2012	# of Covered Employees	21,289	16,118	1,509	1,569	1,195	596	80	74	148
	% to Total System	100%	75.70%	7.09%	7.37%	5.61%	2.80%	0.38%	0.35%	0.70%

<sup>&</sup>lt;sup>1</sup> Includes Active and Inactive members.

Source: OCERS' Pension Gold Information System

<sup>&</sup>lt;sup>2</sup> Orange County Superior Court became a separate agency in 2004.

# History of Actuarial Assumption Rate

For the Period January 1945 - December 2012

The table shown below is a comprehensive history of the interest rate assumption and the salary assumption rates corresponding to the Orange County Employees Retirement System since the inception of the System. These rates are adopted by the Retirement Board and used by the consulting actuary in the creation of the actuarial valuation of the System.

Specifically, the interest rate assumption estimates the rate at which the funds of the System's investment portfolio will realize earnings over many years into the future. The salary assumption rate estimates the relative increases in the salary of a member from the date of the valuation to the estimated date of separation of the member from active service.

Effective Date	Interest Rate	Salary Assumption Rate
1/1/1945	2.50%	0.00%
7/1/1962	3.50%	0.00%
12/31/1965	4.00%	0.00%
7/1/1969	4.50%	0.00%
6/30/1970	5.00%	0.00%
8/31/1973	5.75%	0.00%
7/1/1975	6.00%	0.00%
7/1/1981	7.25%	5.00%
7/1/1989	7.50%	5.50%
7/1/1991	8.00%	6.00%
7/1/1996	8.00%	3.50%
7/1/2000	8.00%	5.50%
7/1/2003	7.50%	4.50%
12/31/2004	7.75%	3.50%*
12/31/2007	7.75%	3.50%**
12/31/2011	7.75%	3.50%***
12/31/2012	7.25%	3.25%****

 $<sup>^{\</sup>ast}$  Inflation per year plus merit and promotion increases ranging from 0.6% to 0.7%

Source: The Segal Company

 $<sup>^{\</sup>ast\ast}$  Inflation per year plus merit and promotion increases ranging from 1% to 10%

<sup>\*\*\*</sup> Inflation per year plus 0.25% across-the-board real salary increases plus merit and promotion increases ranging from 1% to 14%

<sup>\*\*\*\*</sup> Inflation per year plus 0.50% across-the-board real salary increases.

RANGE COUNTY

EMPLOYEES RETIREMENT SYSTEM

GLOSSARY

Section VI



Buena Park, California

Ralph B. Clark Interpretive Center

# Ralph B. Clark Interpretive Center

Placentia
Yorba Linda
Fullerton

Buena Park

Anaheim

Orange

Seal
Beach

Huntington
Beach

Irvine

Ralph B. Clark Regional Park Interpretive Center provides a fascinating window into Orange County's distant past. The Interpretive Center is home to an extensive fossil collection, including marine fossils dating from about one million years ago to more recent terrestrial mammals that walked the earth tens of thousands of years ago. The fascinating specimens on display at the Interpretive Center were unearthed inside the boundaries of Clark Park, and during the development of the Coyote Hills area in northern Orange County. The center is nationally recognized as one of the more significant fossil museums in Southern California.

ke Forest

Mission Viejo

Fun Fact

Ralph B. Clark Regional Park is a 105-acre site located at the foot of the Coyote Hills and offers activities such as fishing, and facilities including sand volleyball courts, horseshoe pits, tennis courts and ball fields.

Beach San Juan
Capistrano
Dana
Point San
Clement





# Glossary of Terms

#### Accumulated Plan Benefits

Benefits attributable under the provisions of a pension plan to employees for services rendered to the benefit information date.

#### **Actuarial Assumptions**

Assumptions used in the actuarial valuation process as to the occurrence of future events affecting pension costs, such as mortality, withdrawal, disablement and retirement; changes in compensation and national pension benefits; rates of investments earnings and asset appreciation of depreciation; procedures used to determine the actuarial value of assets; characteristics of future entrants for open group actuarial cost methods and others relevant items.

#### **Accrual Basis**

The recording of the financial effects on a government of transactions and other events and circumstances that have cash consequences for the government in the periods in which those transactions, events and circumstances occur, rather than only in the periods in which cash is received or paid by the government.

#### **Actuarial Accrued Liability**

The portion, as determined by a particular cost method, of the total present value of benefits that is attributable to past service credit.

#### Actuarial Gain (Loss)

A measure of the difference between actuarial and expected experience based upon a set of actuarial assumptions. Examples include higher than expected salaries increases (loss) and a higher return on fund assets than anticipated (gain).

#### Actuarial Present Value

The discounted value of an amount or series of amounts payable or receivable at various times, determined as of a given date by the application of a particular set of actuarial assumptions.

#### Amortization

(1) The portion of the cost of a limited-life or intangible asset charged as an expense during a particular period. (2) The reduction of debt by regular payments of principal and interest sufficient to retire the debt by maturity.

#### **Auditor's Report**

In the context of a financial audit, a statement by the auditor describing the scope of the audit and the auditing standards applied in the examination, and setting forth the auditor's opinion on the fairness of

presentation of the financial information in conformity with generally accepted accounting principles (GAAP) or some other comprehensive basis of accounting.

#### Comprehensive Annual Financial Report (CAFR)

The official annual report of a government. It includes the basic financial statements and their related notes prepared in conformity with GAAP. It also includes supporting schedules necessary to demonstrate compliance with finance-related legal and contractual provision, required supplementary information, extensive introductory material and a detailed statistical section.

#### **Entry Age Actuarial Cost Method**

A method under which the actuarial present value of the projected benefits of each individual included in an actuarial valuation is allocated on the level basis over the earnings or services of the individual between entry age and assumed exit age(s).

#### **Normal Cost**

The ongoing annual cost allocated to the system by a particular actuarial cost method for providing benefits (future cost). Normal cost payments are made during the working lifetime of the member.

#### Pension Contribution

The amount paid into a pension plan by an employer (or employee), pursuant to the terms of the plan, state law, actuarial calculations or some other basis for determinations.

#### **Pension Trust Fund**

A fund used to account for public employee retirement benefits. Pension trust funds, like nonexpendable trust funds, use the accrual basis of accounting and have a capital maintenance focus.

#### **UAAL Amortization Payment**

The portion of pension contributions, which is designed to pay off (amortize) the unfunded actuarial accrued liability in a systematic fashion. Equivalently, it is a series of periodic payments required to pay off

#### **Unfunded Actuarial Accrued Liability (UAAL)**

The excess of the actuarial accrued liability over the actuarial value of assets.

RANGE



# OPANGE GOUNTY OPANGE GOUNTY ONLY EMPLOYEES PETIREMENT SYSTEM

Orange County Employees Retirement System 2223 East Wellington Avenue, Suite 100 Santa Ana, Ca 92701-3161

> 714.558.6200 | 888.570.6277 www.ocers.org