

Impact on Cash Management and Investment Strategies

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**City Treasurer
City of Anaheim**

**C.M.T.A.
San Diego
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Impact on Cash Management and Investment Strategies

- Elements of a Portfolio Management Program
 - Investment Policy
 - Return on Investment
 - Diversification
 - Cash Flow

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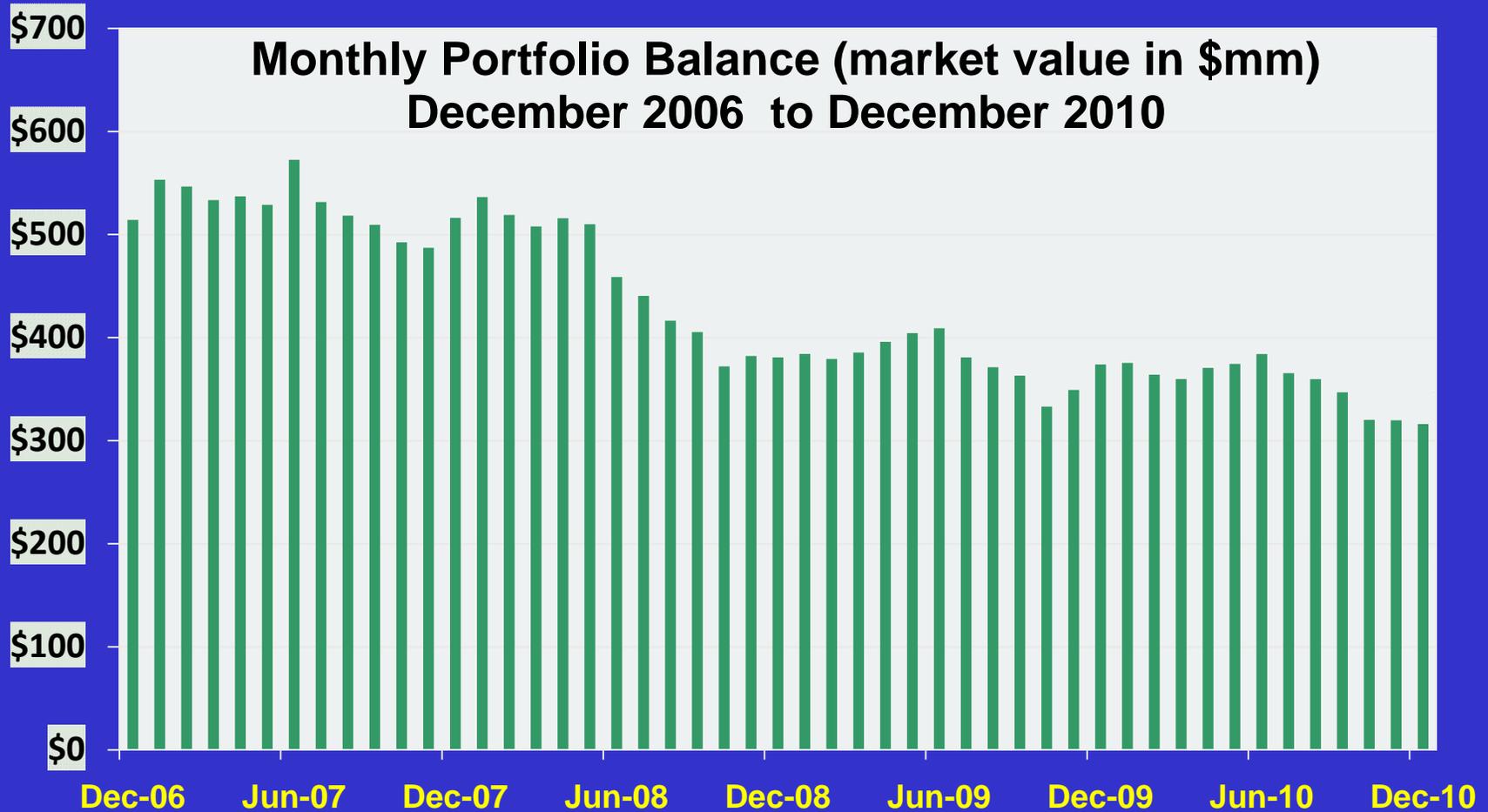
- Elements of a Portfolio Management Program
- Order of Priority:
 - Cash Flow - Liquidity
 - Diversification - Risk Mitigation / Safety
 - Return on Investment - Yield

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- Cash Flow
 - Ensures you have funds to pay the bills
- Issues that affect Cash Flow
 - Budgetary
 - Economic Environment
 - Political Agendas

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Anaheim's Portfolio Balances



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- **Investment Management Focus:**
 - **Safety**
 - **Liquidity**
 - **Yield**

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Risk Factors for Fixed Income Investors

- Credit Risk
- Absence of Diversification
- Interest Rate Risk
- Reinvestment Risk
- Inflationary Risk
- Duration of Portfolio

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- Safety = Risk Mitigation
- Diversification by:
 - Security Classification
 - Issuer
 - Maturity Date
 - Dollar Amount of Investment
 - Credit Rating / Quality

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- Diversification by Securities / Issuers
 - Short-Term:
 - L.A.I.F.
 - Money Markets
 - Treasury Bills
 - Agency Discount Notes
 - Commercial Paper / Bankers Acceptances
 - Repurchase Agreements
 - Time Certificates of Deposits
 - Negotiable Certificates of Deposits

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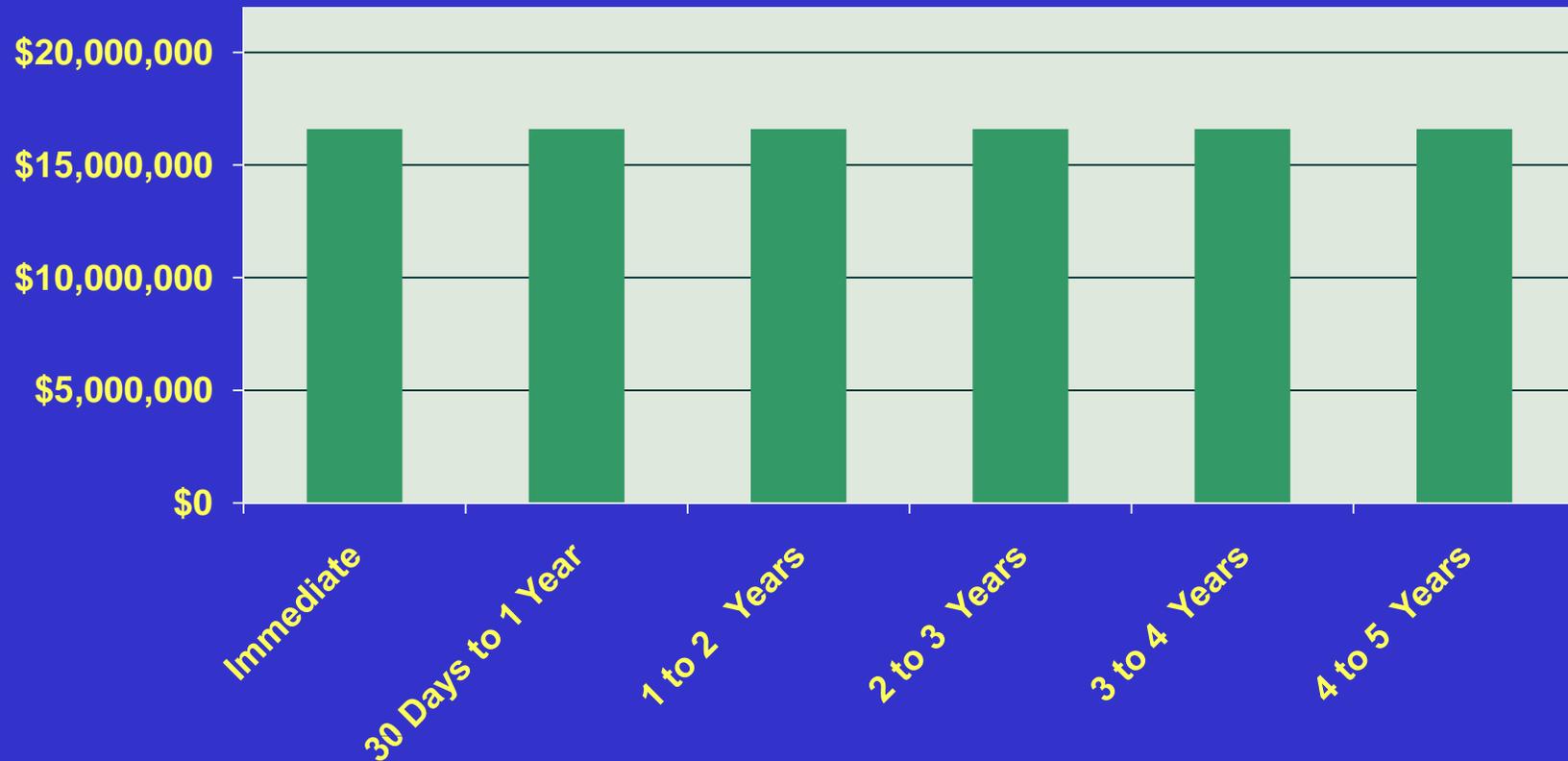
- Diversification by Securities / Issuers
 - Long -Term:
 - U.S. Treasury Notes / Bonds
 - Federal Agency Notes / Bonds
 - Medium Term Corporate Notes (MTNs)
 - Asset Backed Securities
 - Mortgage Backed Securities
 - Mutual Funds (Bond)
 - Certificates of Deposits

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- Diversification: by Maturity / Duration
 - Portfolio Structure
 - Laddered
 - Bar Bell
 - Modified Laddered
 - Two Portfolio Structure

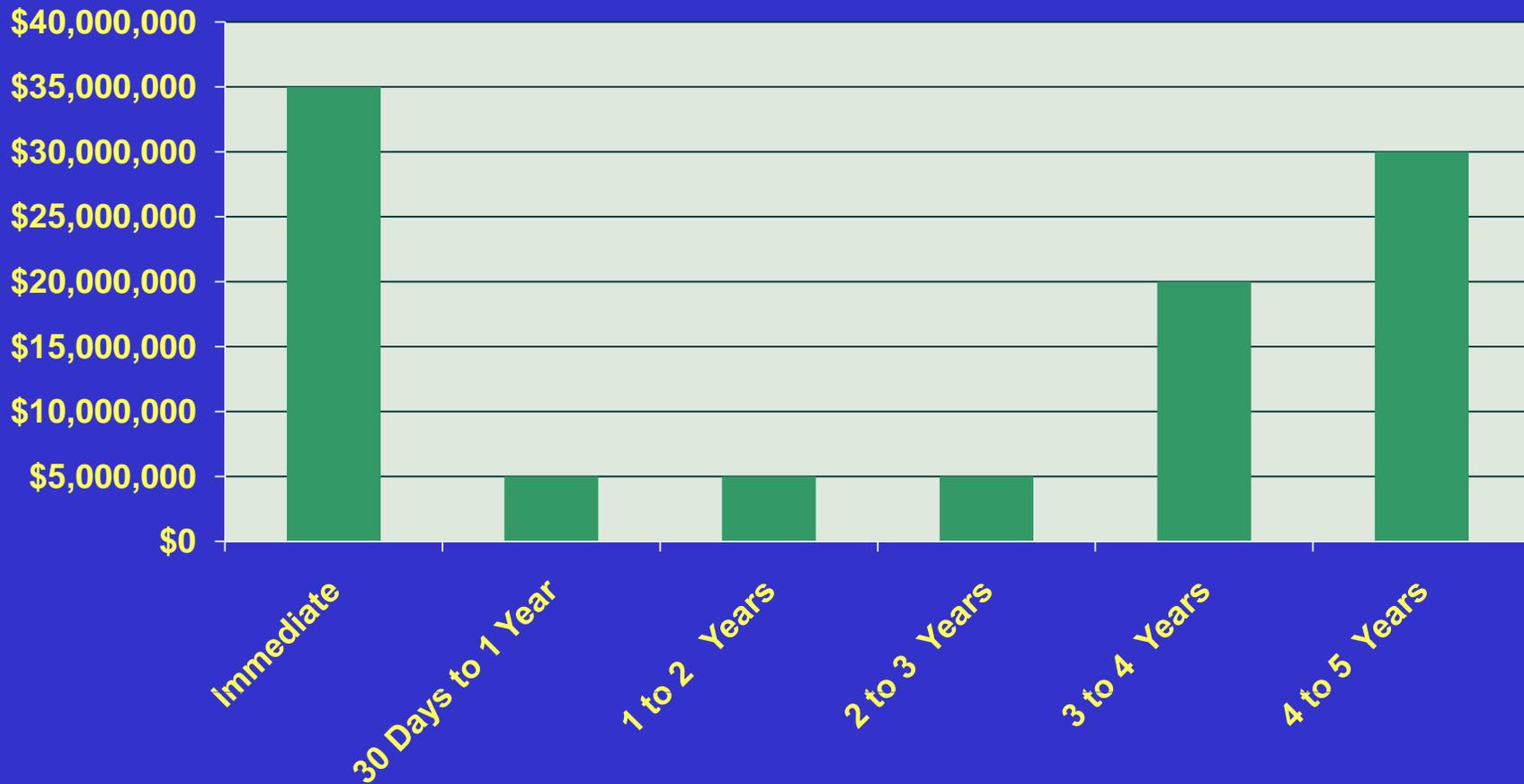
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Laddered Portfolio



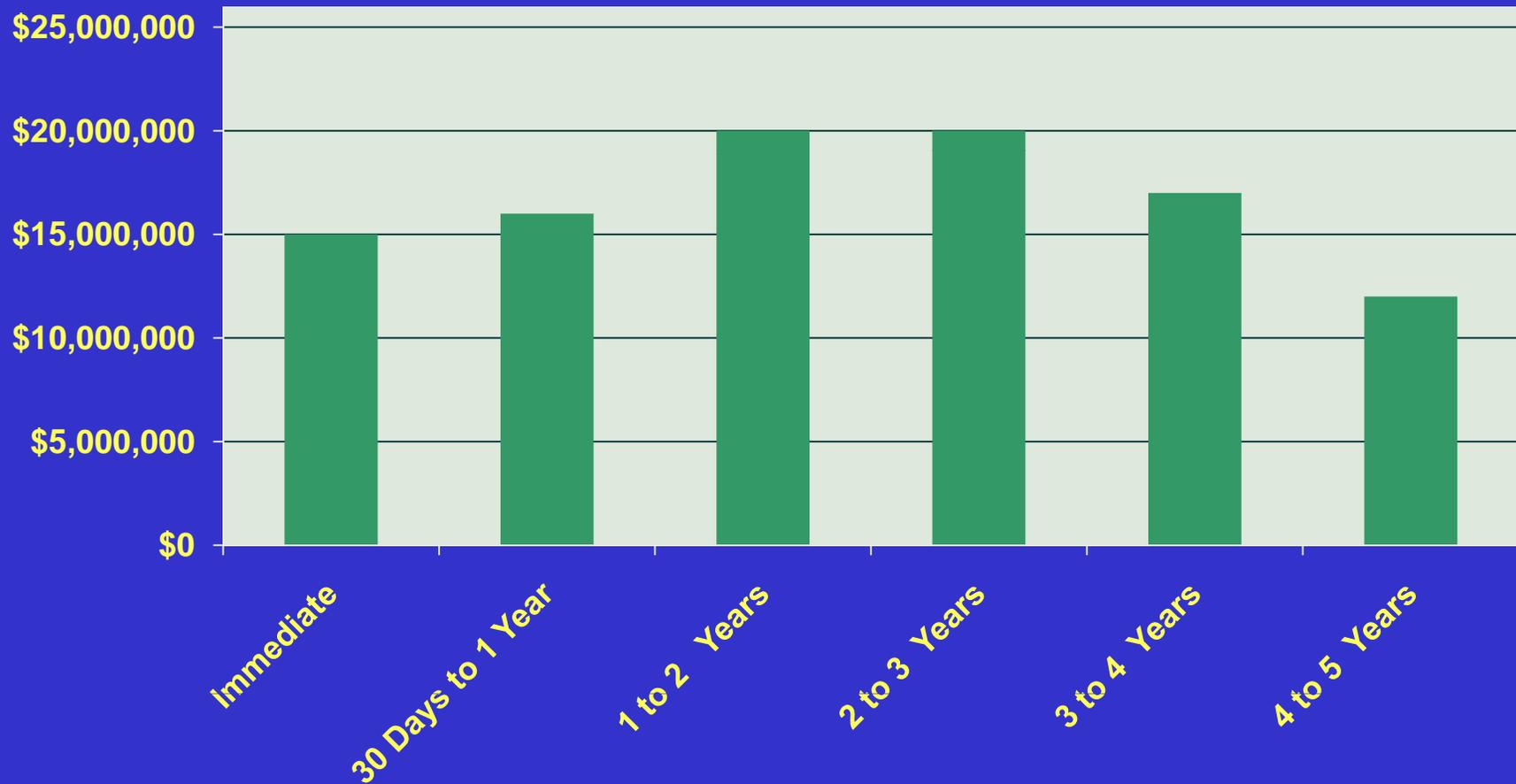
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Bar Bell Portfolio



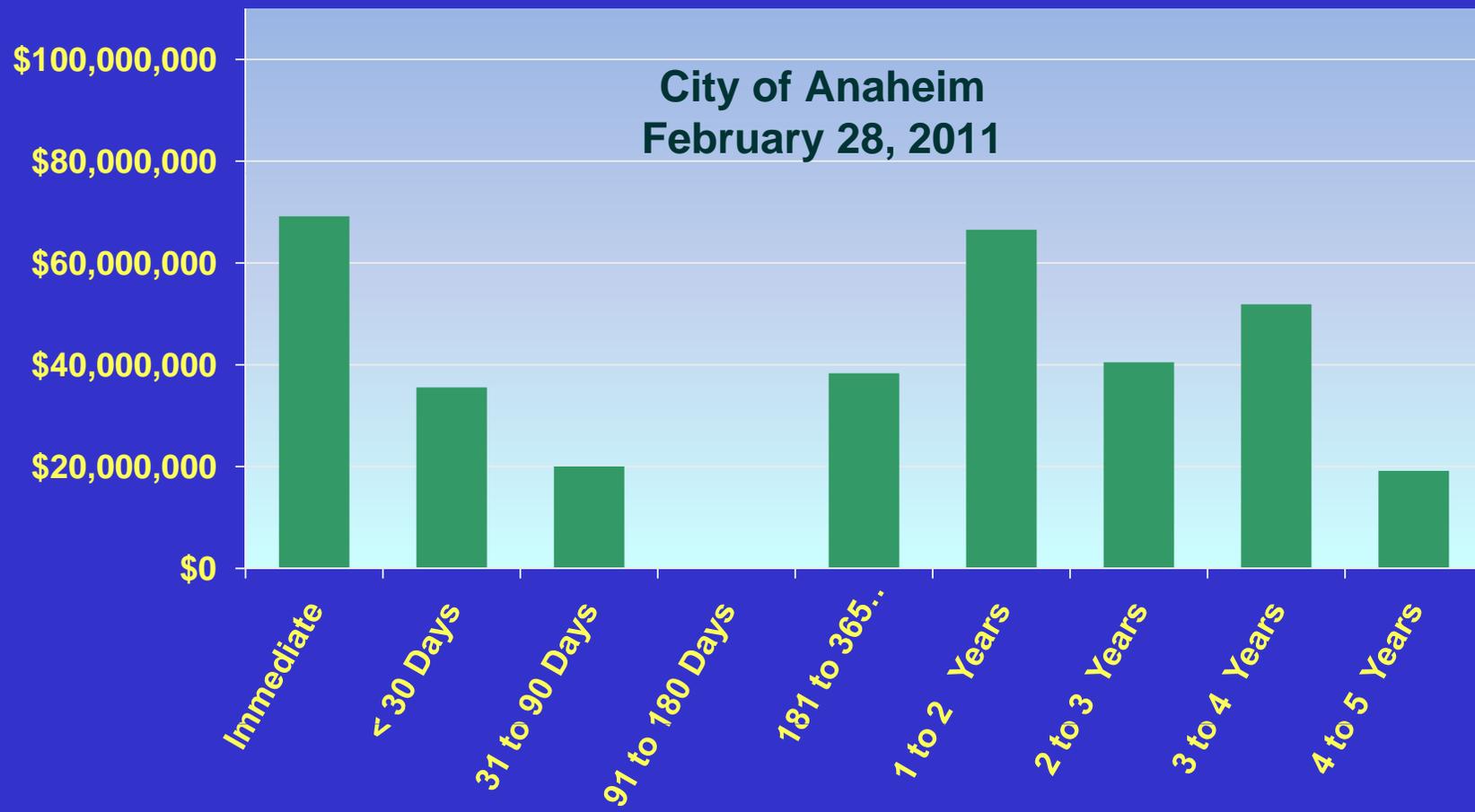
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Modified Laddered Portfolio



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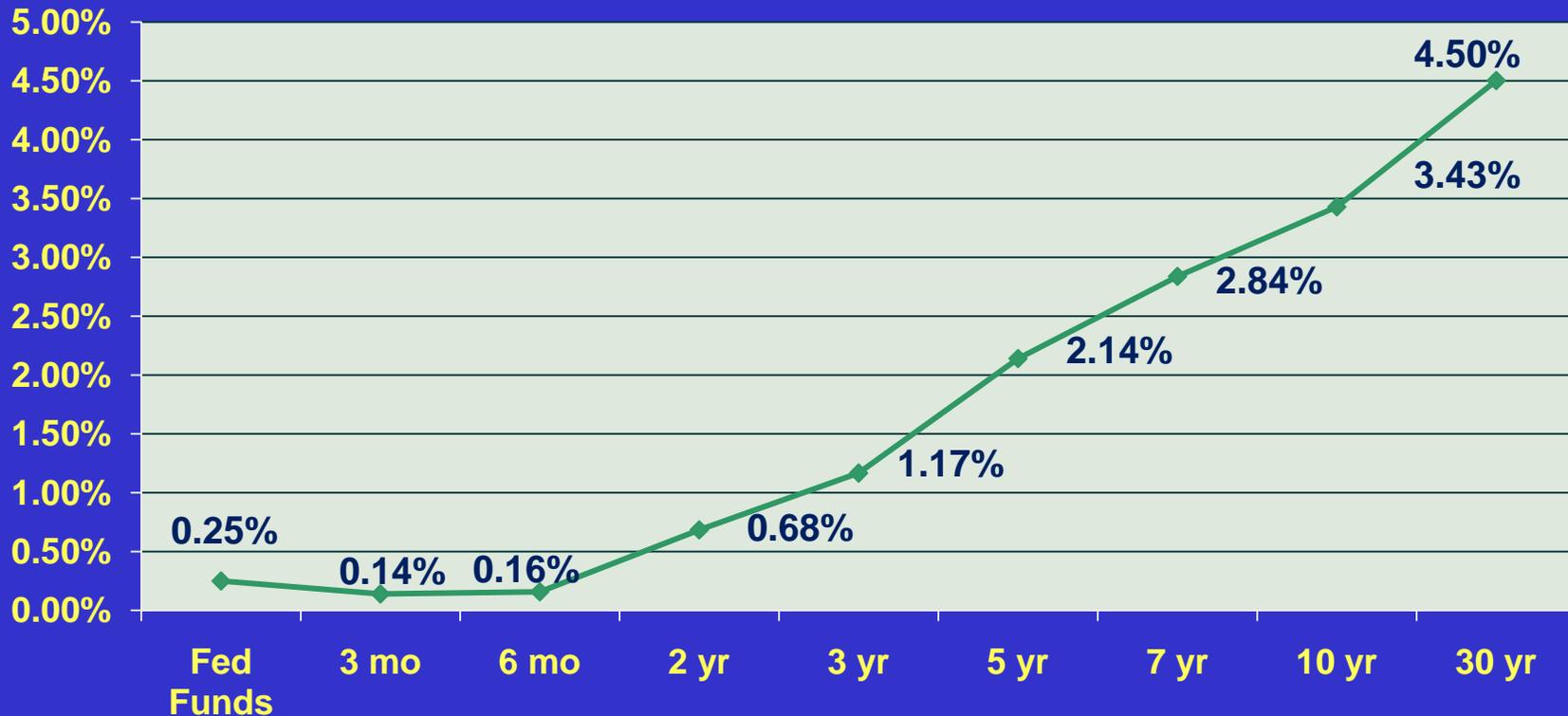
Two Part Portfolio Structure



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Interest Rate Risk – Market Rates

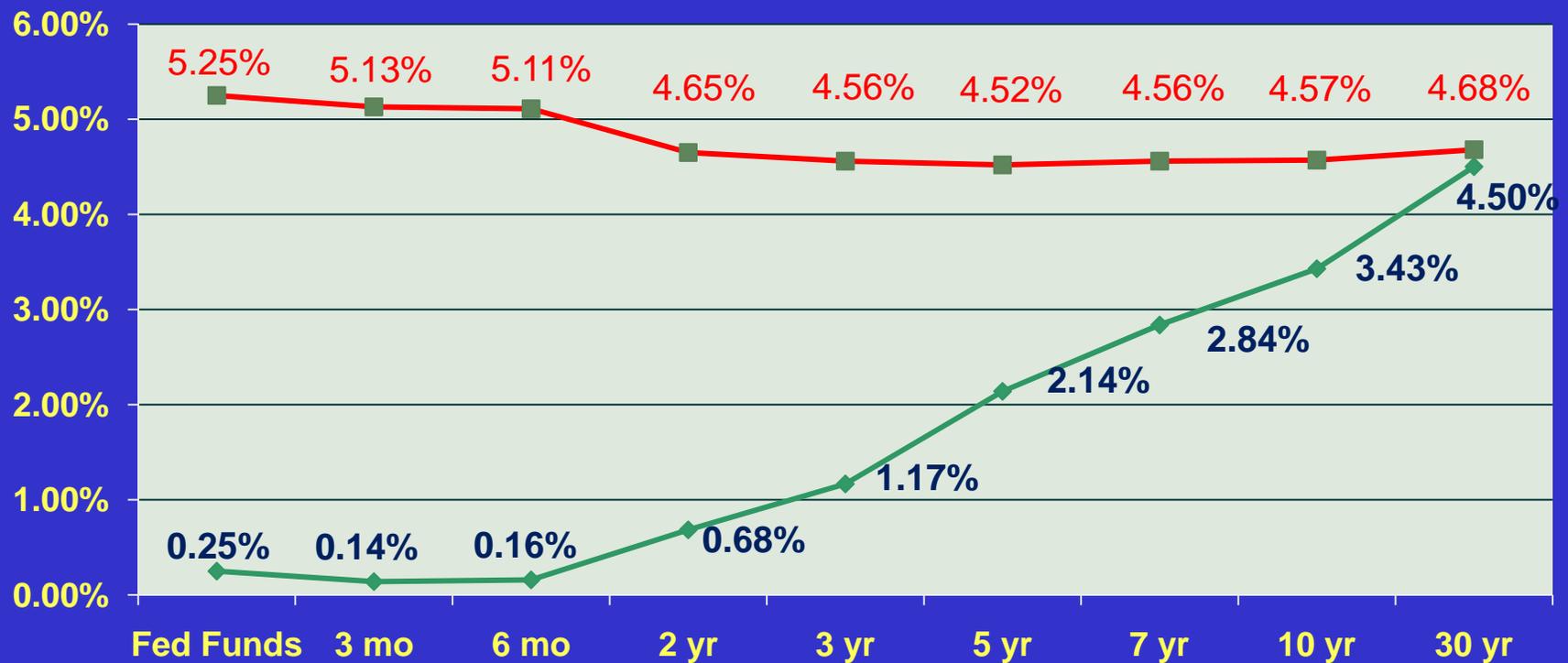
U.S. Treasury Yield Curve - February 28, 2011



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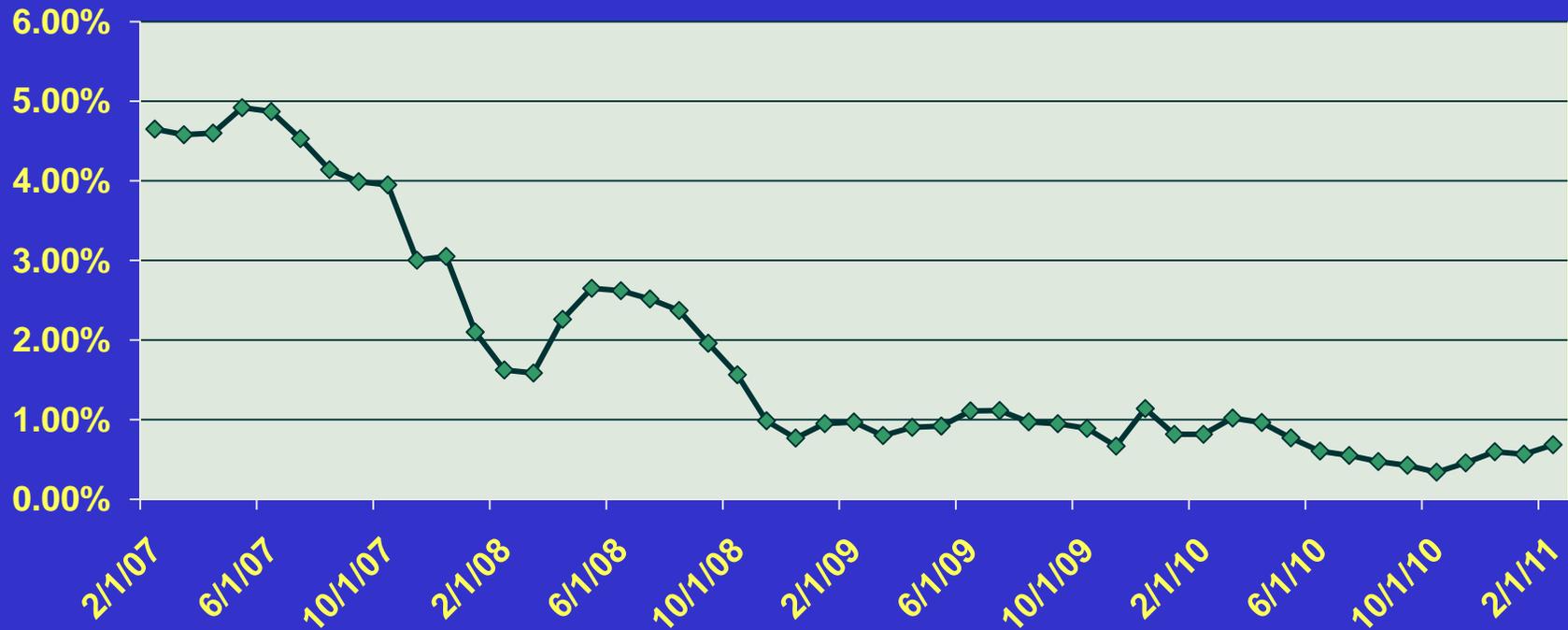
2 Year Treasury Notes

February 2007 and February 2011



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2 Year Treasury Historical Interest Rates February 2007 to February 2011



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Risk Factors for Fixed Income Investors

- Credit Risk
- Absence of Diversification
- Interest Rate Risk
- Reinvestment Risk
- Inflationary Risk
- **Duration of Portfolio**

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- **Duration:**

- Is a measure of a bond's price sensitivity to changes in interest rates.

- General Rule:

- Assume the duration of a bond is 5.0 years. If the yield on the bond were to change by 100 basis points (1.0%), the price of the bond would change by approximately 5.0%

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Duration: Impact on the Price of a Single Security

Par Value	Security Duration	Market Interest Rate Change	Security Price Change	Dollar Price Change
\$ 1,000,000	2 years	1.00 %	2.00 %	\$ 20,000
\$ 5,000,000	2 years	1.00 %	2.00 %	\$100,000
\$10,000,000	2 years	1.00 %	2.00 %	\$200,000
\$ 1,000,000	5 years	1.00 %	5.00 %	\$ 50,000
\$ 5,000,000	5 years	1.00 %	5.00 %	\$250,000
\$10,000,000	5 years	1.00 %	5.00 %	\$500,000

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City of Anaheim – Duration

Two Year Treasury to Portfolio Duration



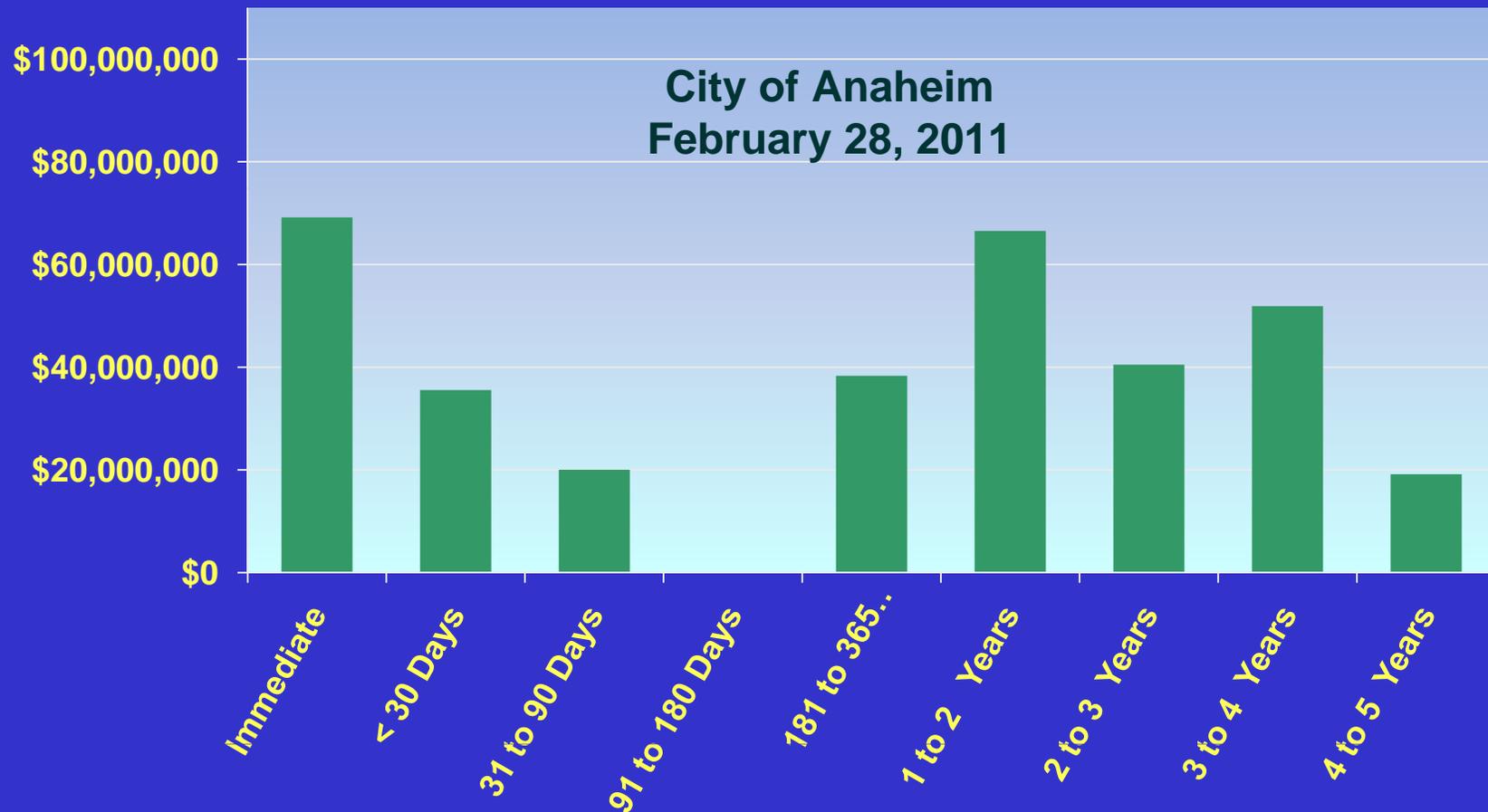
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City of Anaheim – Historical Yield to Duration February 2007 to February 2011



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Two Part Portfolio Structure



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City of Anaheim

Investment Summary - February 2011

	Short-term Portfolio	Long-term Portfolio	Total Portfolio Values
Portfolio Balance (Market Value)	\$ 104,729,248	\$ 236,419,373	\$ 341,248,622
Effective Yield	0.35 %	2.61 %	1.93 %
Avg. Weighted Maturity	10 days	2.2 years	1.5 years
Net Earnings	\$ 28,858	\$507,357	\$ 536,215
Benchmark *	0.07 %	0.72 %	0.42 %

*** Benchmark value is the Interpolated Treasury Yield to the Portfolio's Avg. Weighted Maturity**

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Investment Performance - February 2011

	Amount of Funds (Market Value)	Maturity	Effective Yield	Inter- polated Yield	Total Return Monthly	Total Return Annual
Short-term Portfolio	\$ 104,829,248	10 days	0.35 %	0.07 %	0.025	0.401
Long-term Portfolio	\$ 236,419,373	2.2 years	2.61 %	0.72 %	0.030	2.765
Total Portfolio	\$ 341,248,622	1.5 years	1.93 %	0.42 %	0.029	2.110

Please note the use of interpolated yield values and total return values are guidelines and not used in the performance evaluation of the portfolio

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Historical Portfolio Statistics

Month	Portfolio Balance	Avg. Wgt Maturity	Effective Yield	Inter-polated Yield	Diff: City to IY
Jun 10	\$ 383 mm	1.47 years	1.87 %	0.45 %	1.42 %
Jul 10	\$ 365 mm	1.45 years	1.83 %	0.41 %	1.42 %
Aug 10	\$359 mm	1.41 years	1.86 %	0.35 %	1.51 %
Sep 10	\$ 346 mm	1.37 years	1.87 %	0.30 %	1.57 %
Oct 10	\$ 320 mm	1.42 years	1.92 %	0.25 %	1.66 %
Nov 10	\$ 319 mm	1.37 years	1.91 %	0.34 %	1.57 %
Dec 10	\$ 316 mm	1.29 years	1.90 %	0.35 %	1.54 %
Jan 11	\$ 342 mm	1.48 years	1.88 %	0.39 %	1.49 %
Feb 11	\$341 mm	1.50 years	1.93 %	0.42 %	1.50 %

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- Resources for Investment Information:
 - Investing Public Funds, Girard Miller, GFOA
 - The Strategic Bond Investor, Anthony Crescenzi
 - Bond and Money Market Investments, Frank Fabozzi
 - Investment Mathematics For Finance and Treasury Professionals, Gregory Kitter
 - Getting Started in Bonds, Sharon Saltzgiver Wright
 - Treasury Management, GFOA newsletter
 - Investment Outlook, PIMCO, Bill Gross

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Additional Resources:

- GIOA
- CDIAC
- CMTA
- CSMFO
- AFP
- **Professional Peers**

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Questions ? ? ?

- **Contact information:**

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- www.anaheim.net