



---

*Numbers In Context*

## U.S. Equity

The U.S. stock market surged 10.1% in the fourth quarter to post a stellar 33.1% total return for 2013, marking its best annual return since climbing 36.5% in 1995. The index, which rode monetary stimulus to notch its fifth consecutive annual gain, closed 2013 at an all-time high and is now up 38.5% on a total return basis since the Wilshire 5000 Index's previous high on October 9, 2007.

Large cap stocks outpaced smaller shares during the quarter but lagged for the year. Growth stocks outperformed value in 2013, as well as during Q4. All economic sectors showed gains during the quarter, with Industrials and Information Technology performing the best. The interest-rate-sensitive Utilities group was a laggard during the quarter.

The U.S. has experienced a massive expansion in its monetary base since 2008, undergoing three rounds of quantitative easing. While the FOMC's recent announcement to taper QE3 represents a monetary tightening, the Fed continues to maintain a highly accommodative stance. Even if one assumes that tapering continues at \$10 billion increments following each FOMC meeting, the monetary base could expand above \$4 trillion by the end of 2014.

## Non-U.S. Equity

Developed global stock markets enjoyed stellar performance in 2013, brushing aside concerns over sluggish recoveries in certain countries from the Great Global Recession and taking full advantage of the easy money made available through accommodative central bank policies. Japanese stocks were especially strong performers, propelled by a sharply weaker yen that made Japanese exports relatively cheap for their trading partners. Emerging market stocks, on the other hand, struggled in 2013 against local economic slowdowns and political uncertainties.

## Fixed Income

Bond yields drifted down in October, then reversed course and rose in November and December; the bellwether 10-year U.S. Treasury yield ended the year at 3.04%, its highest level since July 2011 and a full 126 basis points higher than its yield at year-end 2012. Investors rotated into investment-grade and high yield corporate bonds during 2013, leading to tighter spreads relative to a year ago. Developed market bonds as a whole were essentially flat in 2013, while emerging market debt lost ground as investors found the asset space less attractive than in previous years.

# Asset Class Assumptions Update



	Total Return (%)			Risk (%)
	2013 ACA	Q3 2013	Change vs YE	2013 ACA
<u>Investment Categories:</u>				
U.S. Stocks	7.75	7.25	(0.50)	17.00
Dev ex-U.S. Stocks	7.75	7.25	(0.50)	18.00
Emerging Mkt Stocks	7.75	7.25	(0.50)	26.00
Global Stocks	8.00	7.50	(0.50)	17.30
Private Markets	10.75	10.35	(0.40)	27.50
Cash Equivalents	1.55	1.45	(0.10)	1.25
Core Bonds	3.25	3.90	0.65	5.00
LT Core Bonds	3.10	4.55	1.45	10.00
TIPS	2.60	3.60	1.00	6.00
High Yield Bonds	5.15	5.25	0.10	10.00
Non-U.S. Bonds (Hdg)	2.90	3.55	0.65	3.50
U.S. RE Securities	5.30	5.10	(0.20)	15.00
Private Real Estate	6.05	5.85	(0.20)	12.25
Commodities	4.55	4.20	(0.35)	13.00
Real Asset Basket	6.35	6.30	(0.05)	7.75
Inflation:	2.55	2.20	(0.35)	1.75
<u>Returns minus Inflation:</u>				
U.S. Stocks	5.20	5.05	(0.15)	
U.S. Bonds	0.70	1.70	1.00	
Cash Equivalents	(1.00)	(0.75)	0.25	
<u>Stocks minus Bonds:</u>	4.50	3.35	(1.15)	
<u>Bonds minus Cash:</u>	1.70	2.45	0.75	

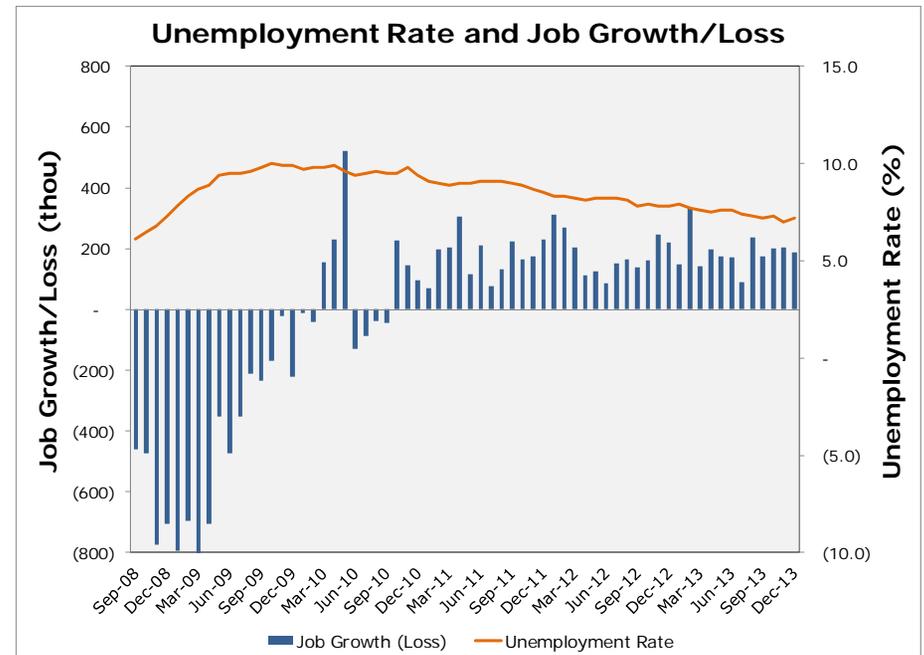
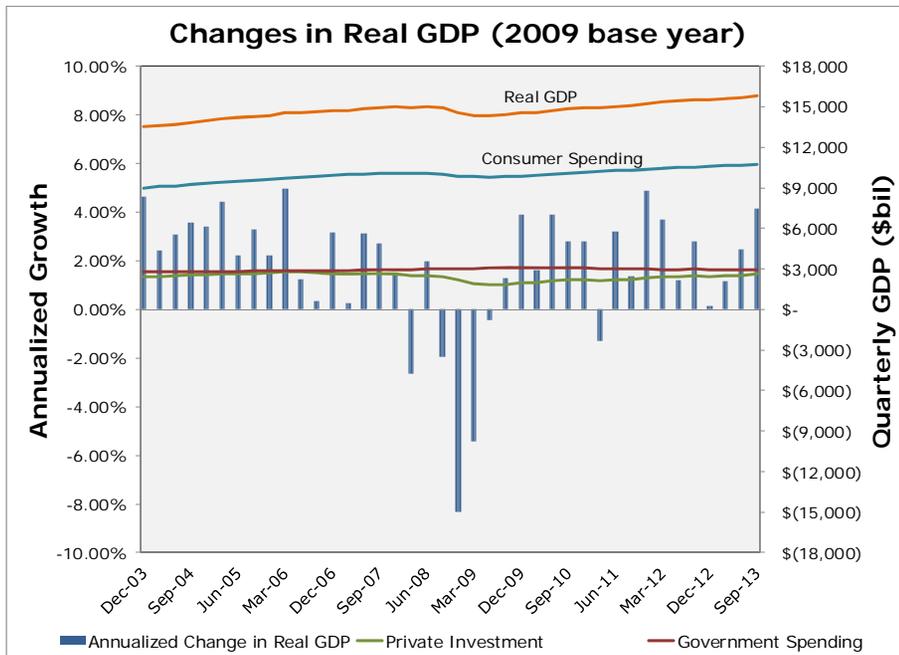
# Economic Review



December 31, 2013		Key Economic Indicators			
<b>CPI (all items)</b> Seasonally adjusted	Monthly Change		Cumulative Change		
	Dec-13	0.4	3-Month	0.4	
	Nov-13	0.0	12-Month	1.6	
	Oct-13	-0.1	10-Yr Annual	2.4	
Breakeven Inflation	10-Year	2.3			
<b>Consumer Sentiment</b> Unv. of Michigan Survey	Dec-13	82.5			
	Nov-13	75.1			
	1-Yr Ago	72.9	10-Yr Avg	78.2	
<b>Manufacturing</b> Inst. for Supply Mgmt Purchasing Mngrs' Idx	Dec-13	57.0	Change in Manufacturing Sector		
	Nov-13	57.3	>50	Expansion	
	1-Yr Avg	53.9	<50	Contraction	

Note: Seasonally adjusted CPI data is utilized to better reflect short-term pricing activity.

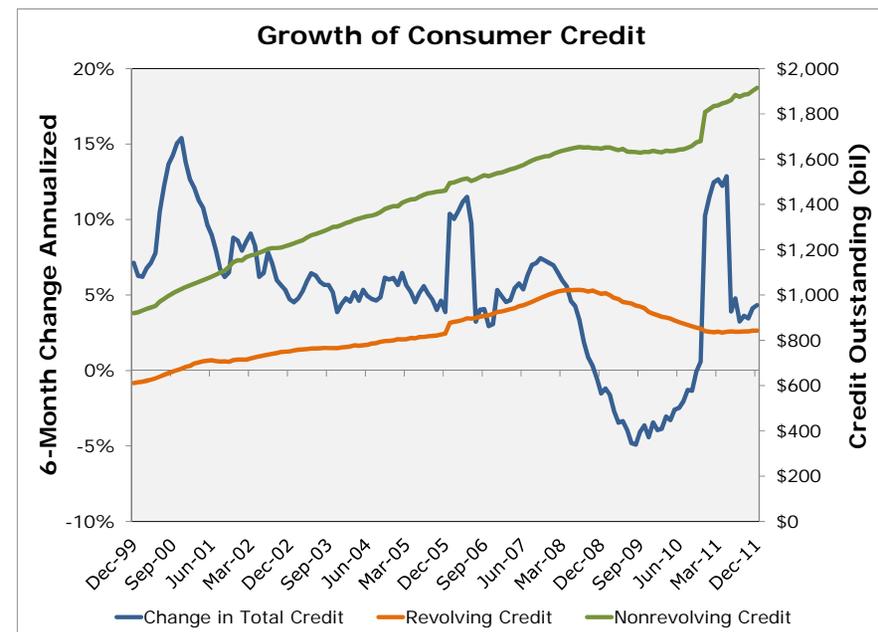
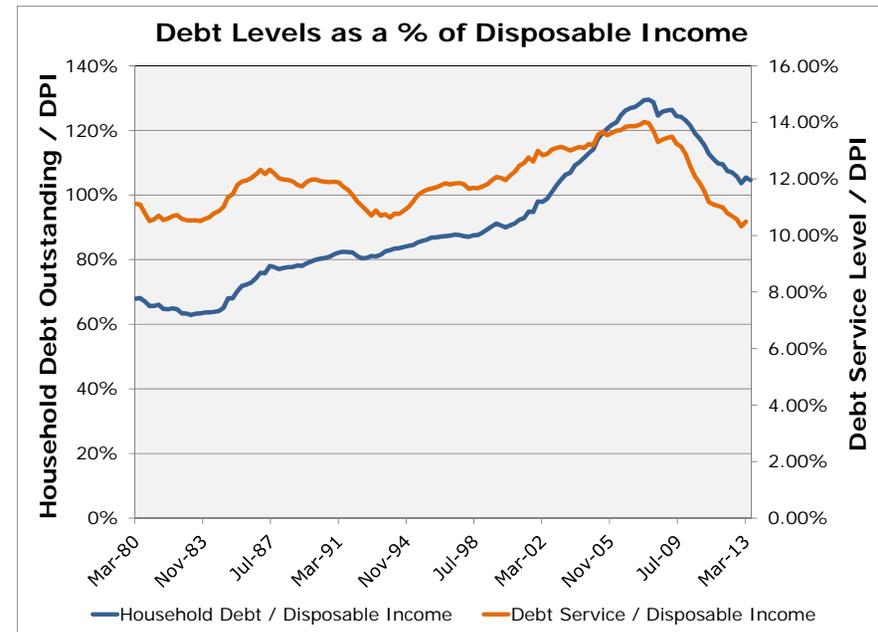
Dec/2013 CPI and Employment are based on Federal Reserve of Philadelphia Survey of Professional Forecasters



Data sources: Bureau of Economic Analysis, Bureau of Labor Statistics, Federal Reserve Bank of St. Louis, Barclays Capital

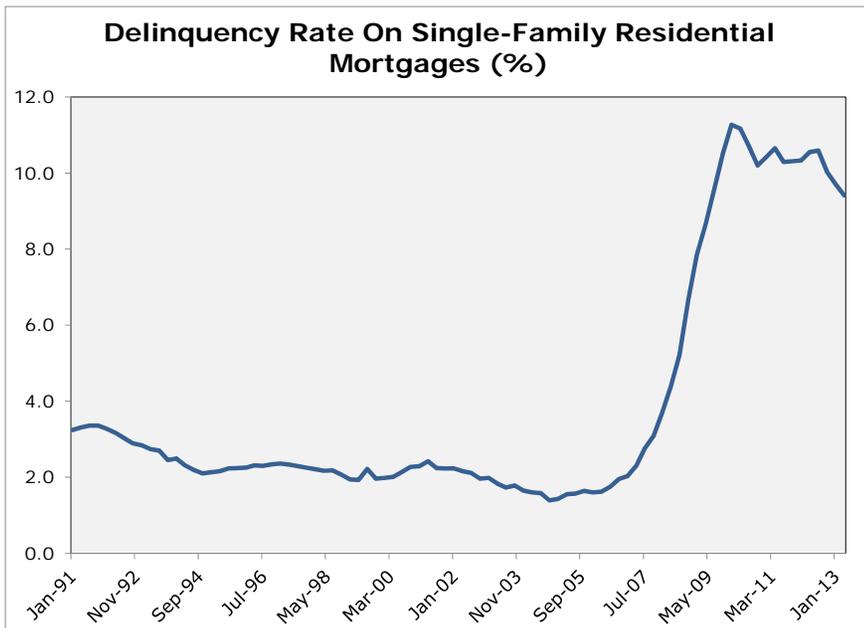
# Debt Outstanding

- While debt outstanding remains elevated, debt service payments have fallen to levels not seen since the 1970s due to re-financing at historically low rates
- Consumer credit continues to expand
  - Revolving credit (i.e. credit cards) has been growing slightly after a large decline
  - Non-revolving credit (i.e. autos, school loans) continues to push higher
  - The Federal Reserve revised the historical data to better reflect student loan debt outstanding

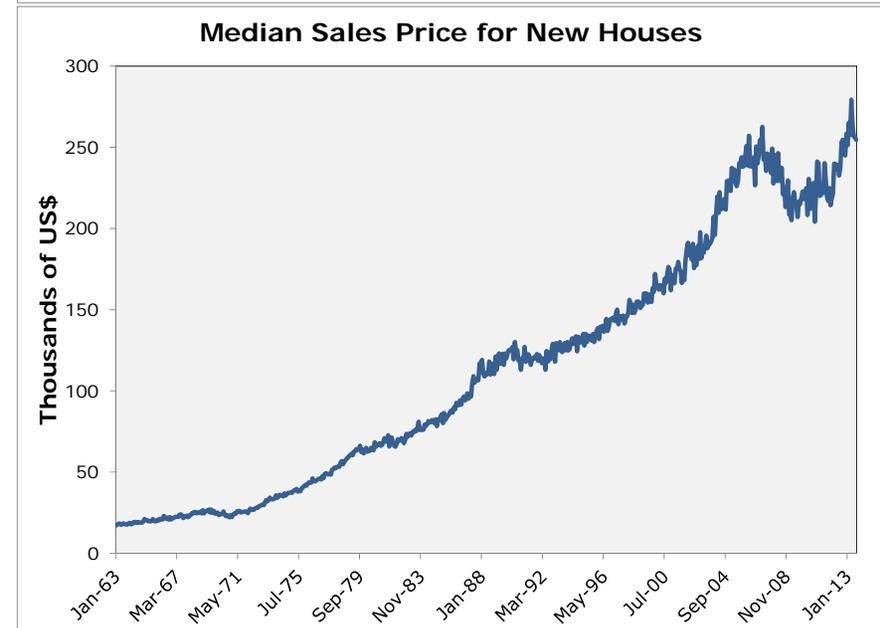


# Improvements in Housing

- Improvement in household balance sheets has contributed to the rebound in housing
- Housing starts are nearly double their previous low while median prices are near the previous high
- Delinquency rates, however, remain elevated



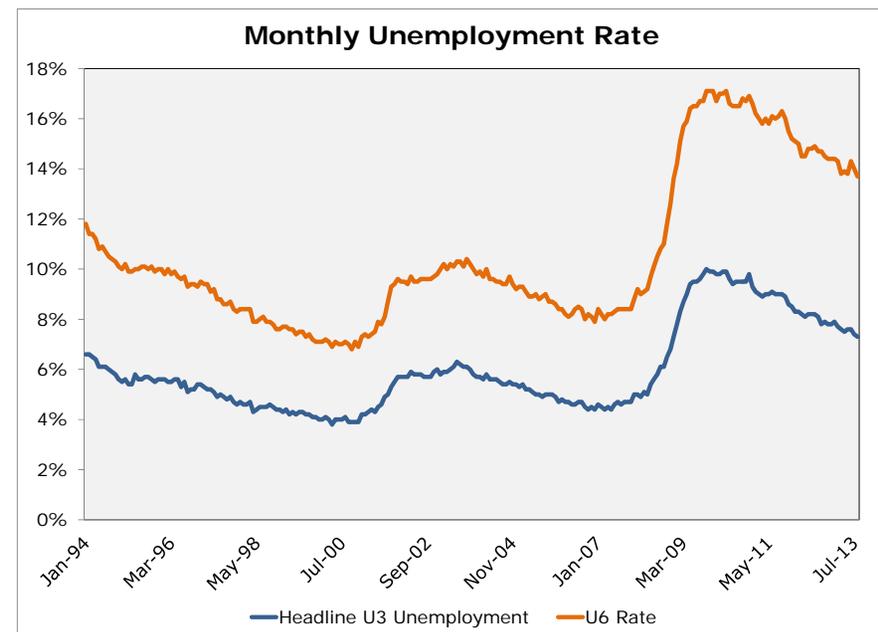
Source: U.S. Census Bureau, Federal Reserve



# Employment Conditions

- Employed part-time for economic reasons are those individuals who are unable to find full-time employment
- While this number typically increases during recession (shaded areas), the recent rise was dramatic and it remains stubbornly high
- U6 Unemployment contains the workers mentioned above plus those “marginally attached” – individuals who have looked but cannot find employment
- U6 stands at 13.7% and exhibits an unusually wide spread versus U3

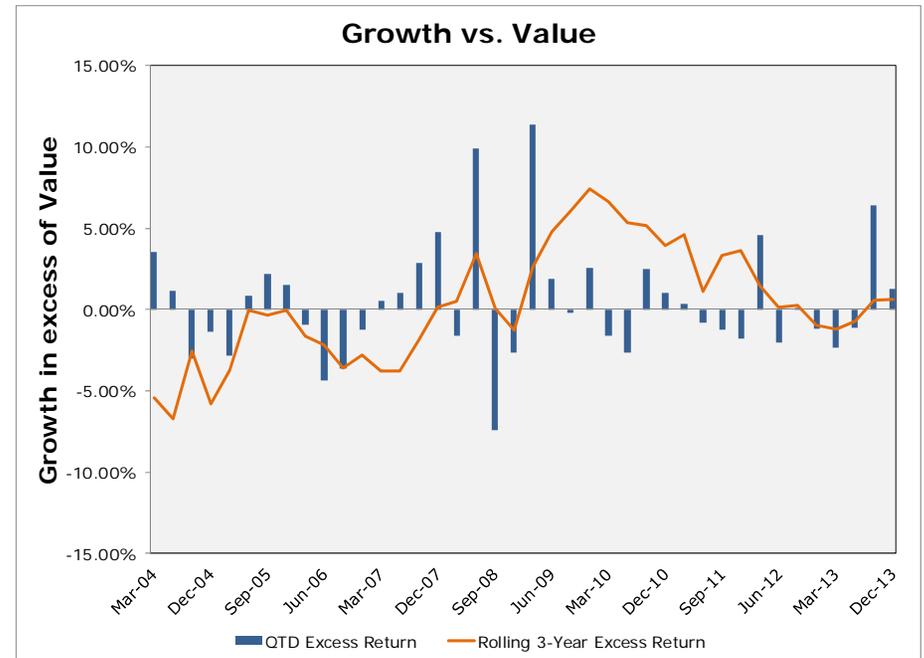
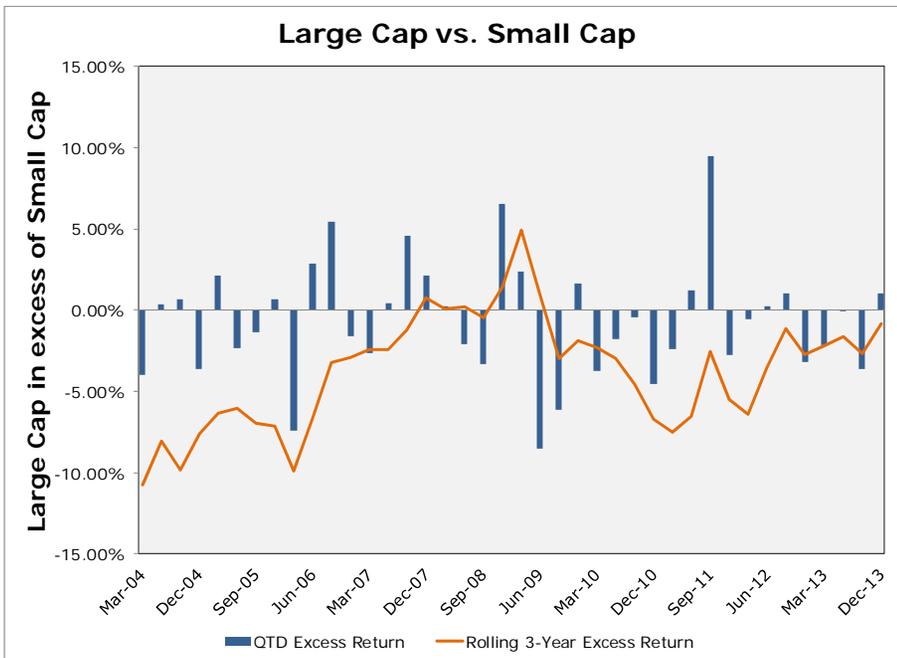
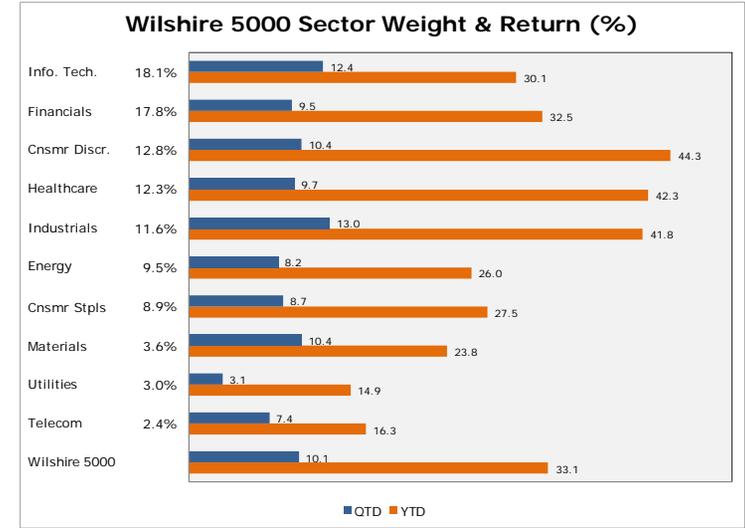
Source: Bureau of Labor Statistics



# U.S. Equity Market



December 31, 2013	Qtr	Ytd	1 Yr	3 Yr	5 Yr	10 Yr
Wilshire 5000	10.1	33.1	33.1	16.0	18.6	8.0
Wilshire U.S. Large Cap	10.2	32.3	32.3	15.9	18.0	7.7
Wilshire U.S. Small Cap	9.1	39.0	39.0	16.8	23.9	10.7
Wilshire U.S. Large Growth	11.1	35.0	35.0	16.2	19.8	8.2
Wilshire U.S. Large Value	9.5	30.2	30.2	15.7	16.1	7.1
Wilshire U.S. Small Growth	8.6	45.0	45.0	18.2	25.9	11.6
Wilshire U.S. Small Value	9.6	33.8	33.8	15.5	21.8	9.9
Wilshire REIT Index	-0.8	1.9	1.9	9.4	16.7	8.4
MSCI USA Minimum Volatility Index	7.3	24.4	24.4	15.3	15.5	7.5
FTSE RAFI U.S. 1000 Index	10.5	35.6	35.6	16.7	22.1	n.a.

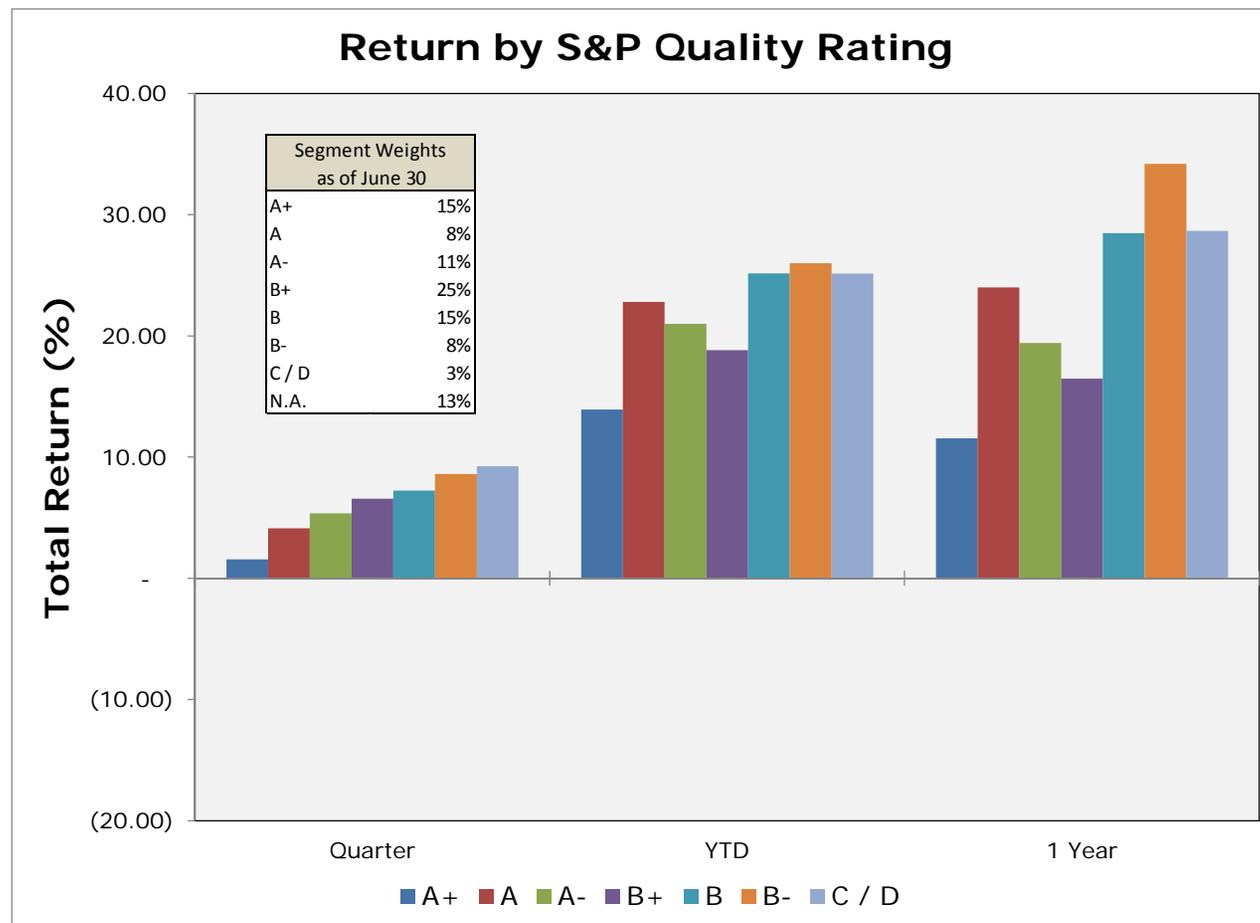


Data sources: Wilshire Compass, Wilshire Atlas

# Returns by Quality Segment



Lower quality names have performed well during the past quarter and for the last twelve months

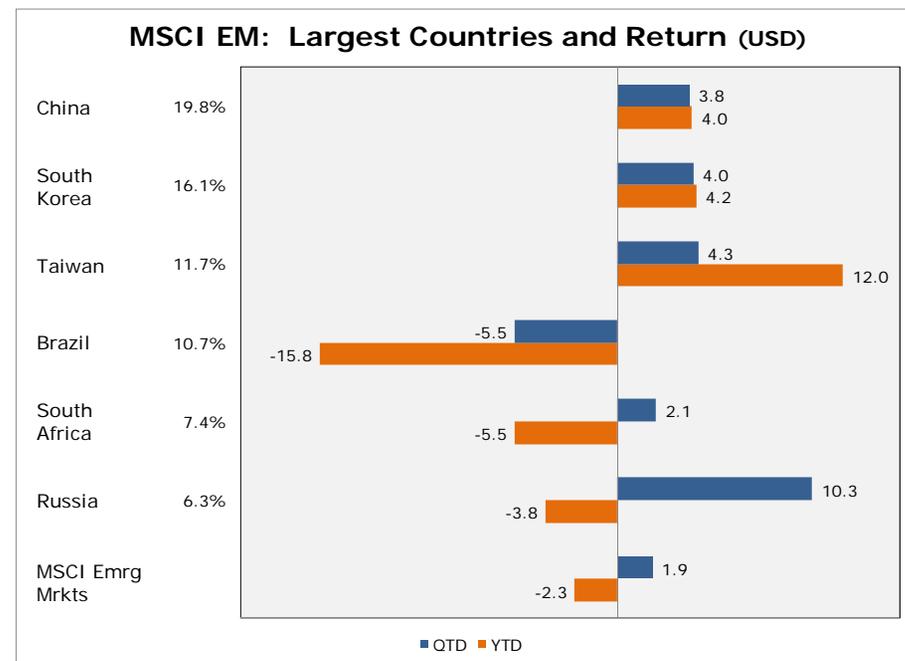
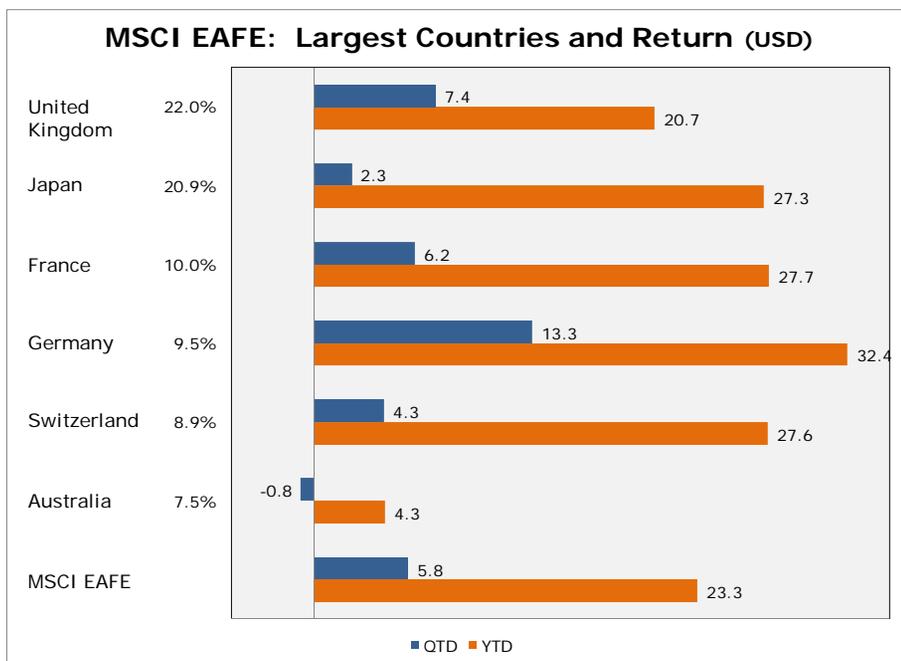


Data sources: Wilshire Atlas

# Non-U.S. Equity Market



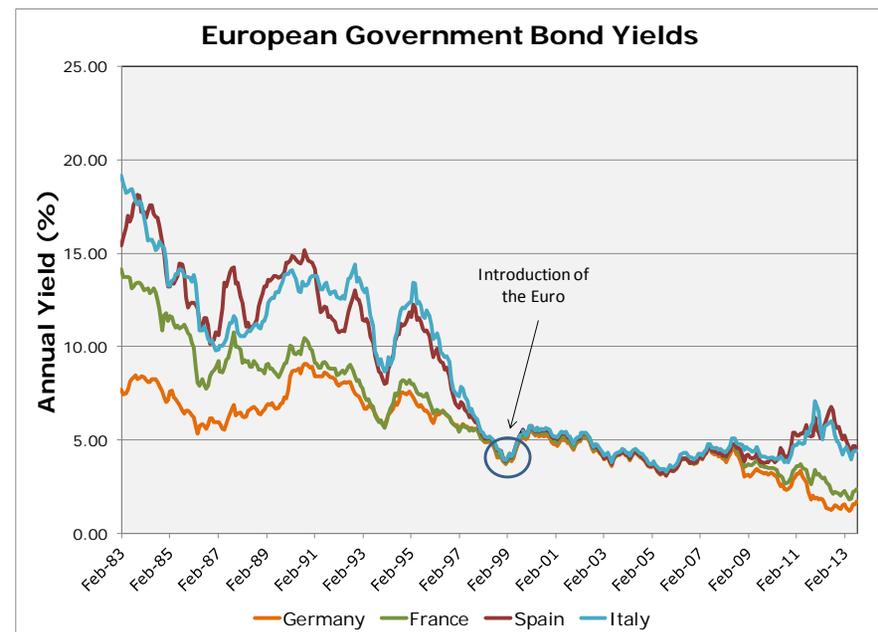
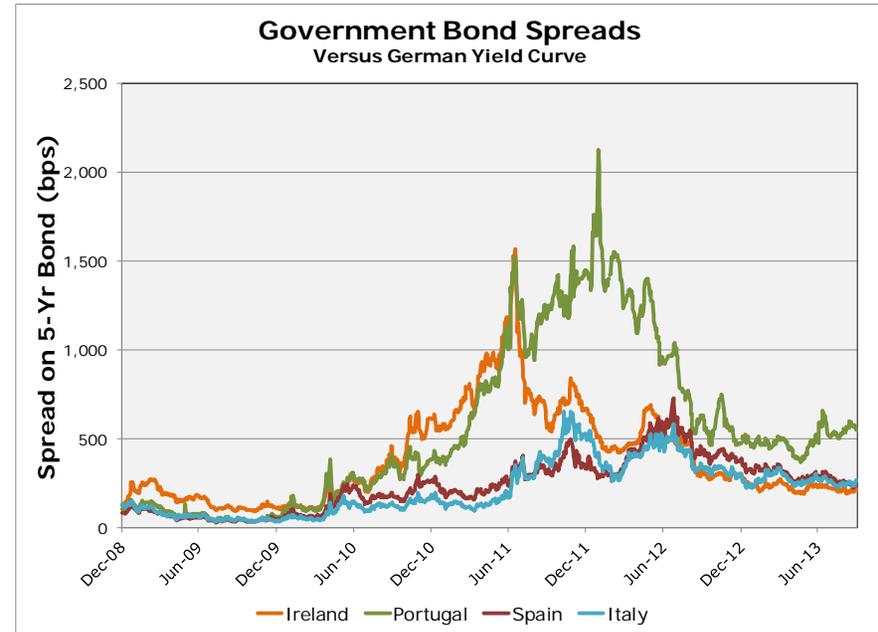
December 31, 2013	Qtr	Ytd	1 Yr	3 Yr	5 Yr	10 Yr
MSCI ACWI ex-US (\$g)	4.8	15.8	15.8	5.6	13.3	8.0
MSCI EAFE (\$g)	5.8	23.3	23.3	8.7	13.0	7.4
MSCI Emerging Markets (\$g)	1.9	-2.3	-2.3	-1.7	15.1	11.5
MSCI Frontier Markets (\$g)	6.6	26.3	26.3	4.0	10.0	7.3
MSCI ACWI ex-US Growth (\$g)	4.7	15.9	15.9	5.3	13.3	7.7
MSCI ACWI ex-US Value (\$g)	4.9	15.6	15.6	5.9	13.3	8.3
MSCI ACWI ex-US Small (\$g)	4.7	20.1	20.1	5.3	19.2	10.5
MSCI EAFE Minimum Volatility Idx	2.3	17.1	17.1	9.3	10.8	9.7
FTSE RAFI Developed ex-US Index	6.5	25.4	25.4	7.6	14.0	n.a.
MSCI EAFE LC (g)	6.4	27.5	27.5	9.9	11.8	6.5
MSCI Emerging Markets LC (g)	3.0	3.8	3.8	2.2	14.7	11.4



Data sources: Wilshire Compass, MSCI Barra

# European Debt Issues

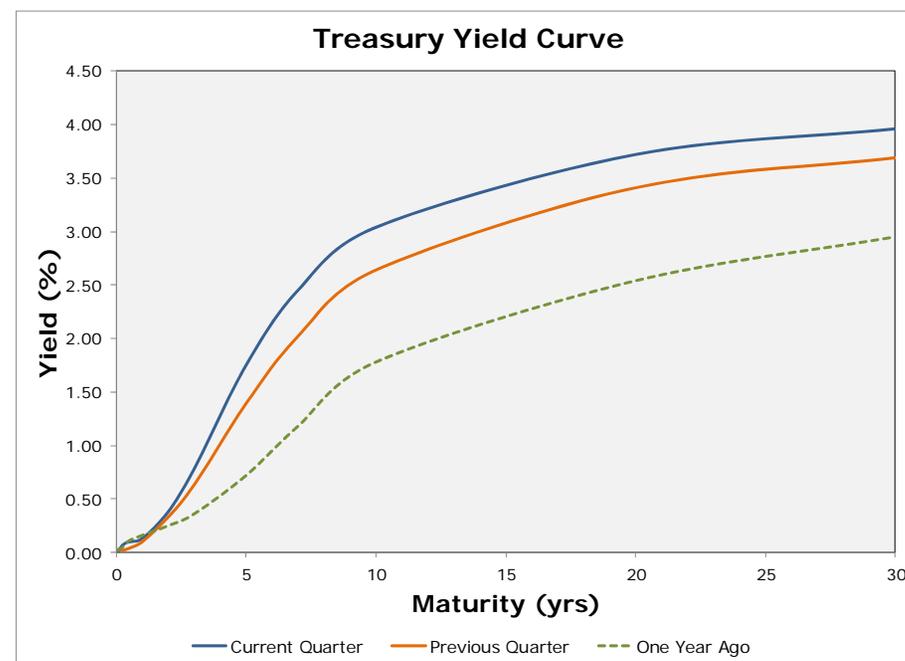
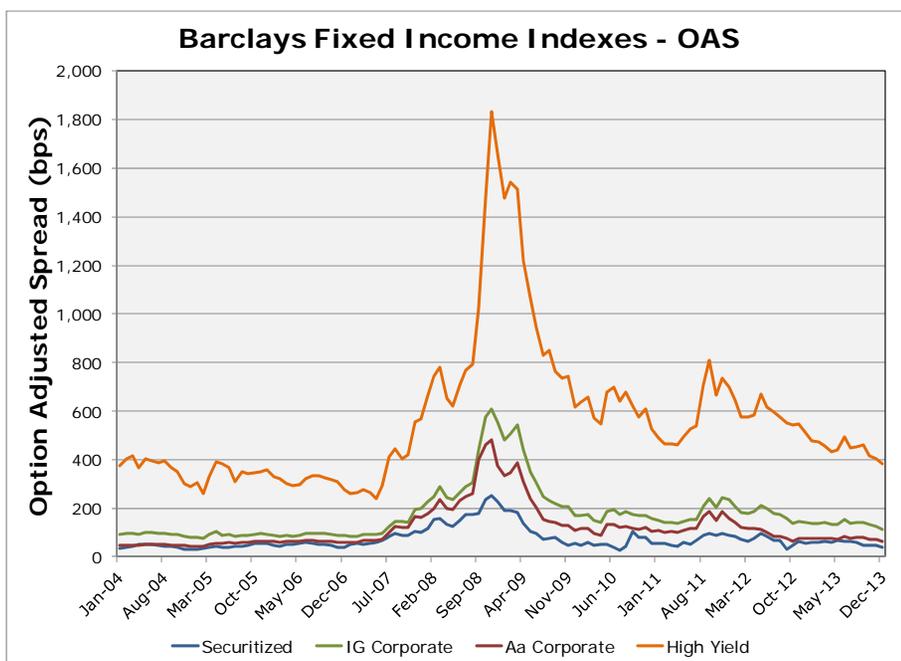
- As Portugal's three-year bailout comes to an end and the country continues to struggle with its finances, concerns about what to do next have pushed their government yields higher
- Yields on government bonds continue their downward trend as some spread has emerged between the relatively stable France and Germany, as both economies are growing however slightly



# U.S. Fixed Income Market



December 31, 2013	Qtr	Ytd	1 Yr	3 Yr	5 Yr	10 Yr
Barclays Aggregate Bond Index	-0.1	-2.0	-2.0	3.3	4.4	4.5
Barclays Treasury Index	-0.8	-2.8	-2.8	2.9	2.1	4.2
Barclays Govt-Related Index	0.0	-2.7	-2.7	2.9	3.2	4.3
Barclays Securitized Index	-0.4	-1.3	-1.3	2.6	4.4	4.5
Barclays Corporate IG Index	1.1	-1.5	-1.5	5.4	8.6	5.3
Barclays LT Govt/Credit Index	-0.1	-8.8	-8.8	6.7	6.4	6.4
Barclays LT Treasury Index	-3.1	-12.7	-12.7	5.5	2.3	5.9
Barclays LT Govt-Related Index	-0.1	-9.8	-9.8	7.1	5.8	6.8
Barclays LT Corporate IG Index	1.9	-5.7	-5.7	7.1	10.3	6.4
Barclays U.S. TIPS Index	-2.0	-8.6	-8.6	3.6	5.6	4.8
Barclays High Yield Index	3.6	7.4	7.4	9.3	18.9	8.6
Treasury Bills	0.0	0.1	0.1	0.1	0.1	1.7



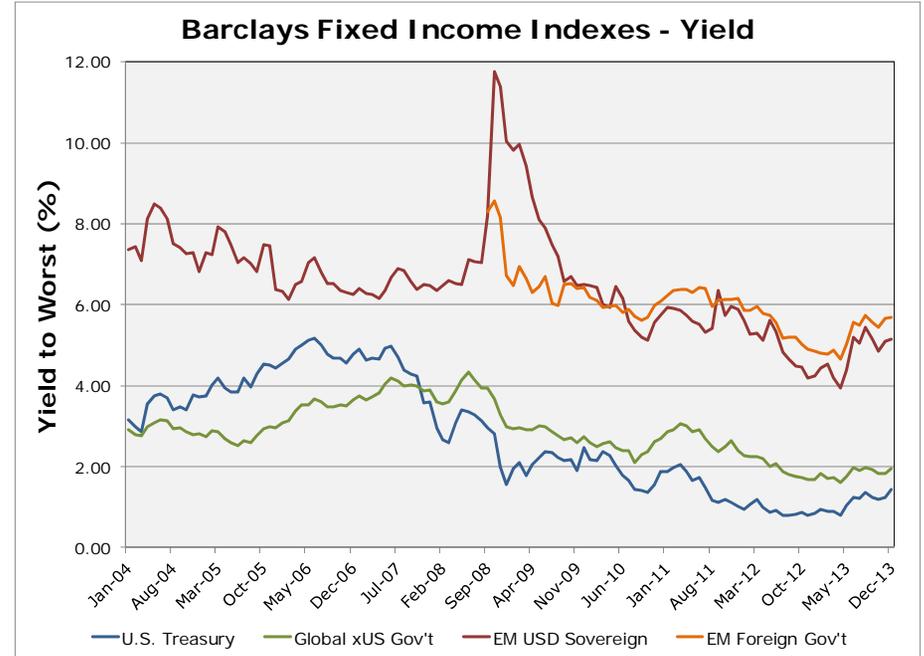
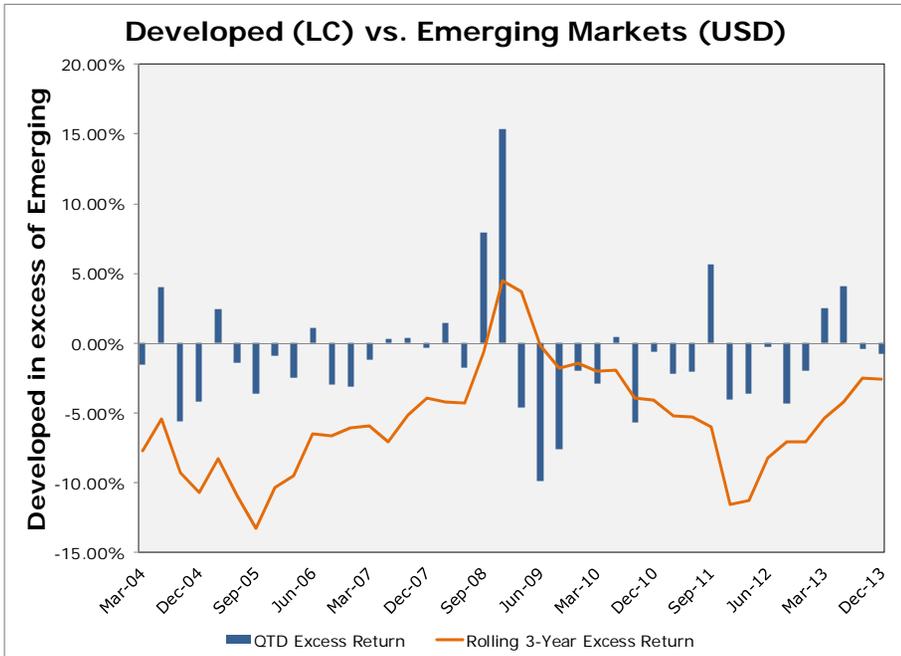
Data sources: Wilshire Compass, Barclays Capital, U.S. Treasury

# Non-U.S. Fixed Income Market



December 31, 2013	Qtr	Ytd	1 Yr	3 Yr	5 Yr	10 Yr
<i>Developed Markets</i>						
Barclays Global Aggregate xUS	-0.7	-3.1	-3.1	1.7	3.5	4.4
Barclays Global Aggregate xUS *	0.4	1.2	1.2	3.8	3.8	4.3
Barclays Wrld Govt xUS IL Bond	0.6	-0.8	-0.8	4.8	6.2	5.6
Barclays Wrld Govt xUS IL Bond *	-0.7	-1.8	-1.8	4.2	5.0	5.0
<i>Emerging Mkts (Hard Currency)</i>						
Barclays EM USD Aggregate	1.2	-4.1	-4.1	6.5	12.9	8.5
<i>Emerging Mkts (Foreign Currency)</i>						
Barclays EM Local Currency Govt	-0.3	-4.3	-4.3	3.4	7.8	n.a.
Barclays EM Local Currency Govt *	-0.3	-2.5	-2.5	2.9	3.6	n.a.
Euro vs. Dollar	1.8	4.5	4.5	0.9	-0.2	0.8
Yen vs. Dollar	-6.6	-17.7	-17.7	-8.3	-2.9	0.2
Pound vs. Dollar	2.3	1.9	1.9	1.9	2.9	-0.8

\* Returns are reported in terms of local market investors, which removes currency effects.

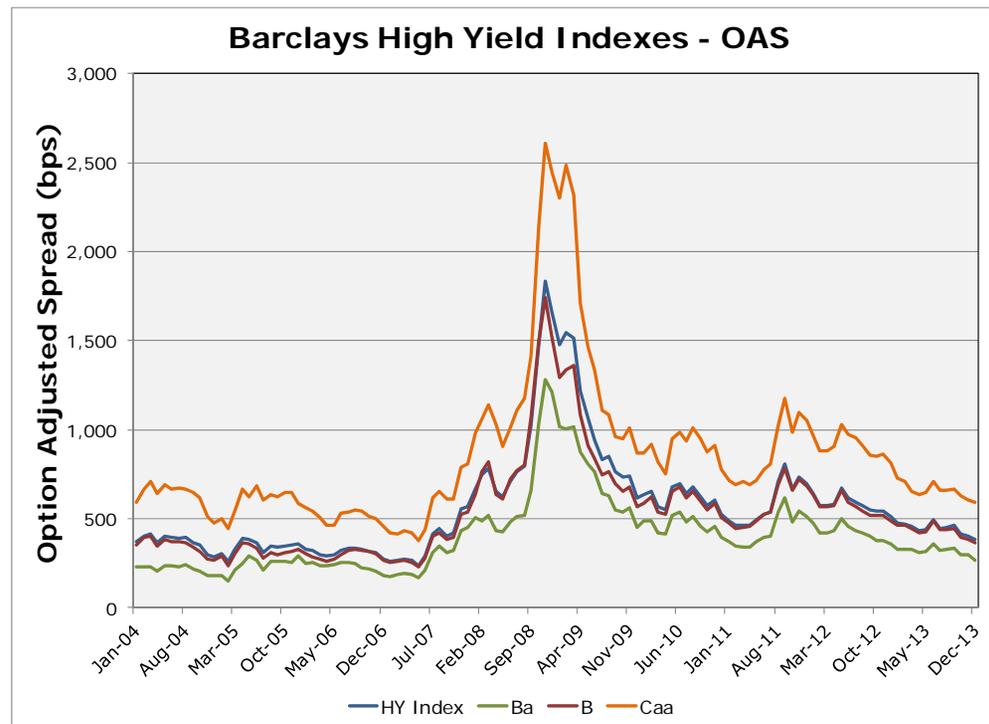


Data sources: Wilshire Compass, Barclays Capital

# High Yield Bond Market



December 31, 2013	Weight	Qtr	Ytd	1 Yr	3 Yr
Barclays High Yield Index	100%	3.6	7.4	7.4	9.3
Quality Distribution					
Ba U.S. High Yield	41.0%	3.2	5.0	5.0	8.7
B U.S. High Yield	40.1%	3.6	7.3	7.3	9.3
Caa U.S. High Yield	18.1%	4.3	13.8	13.8	10.9
Ca to D U.S. High Yield	0.6%	10.2	5.0	5.0	6.1
Non-Rated U.S. High Yield	0.2%	3.9	8.2	8.2	12.2



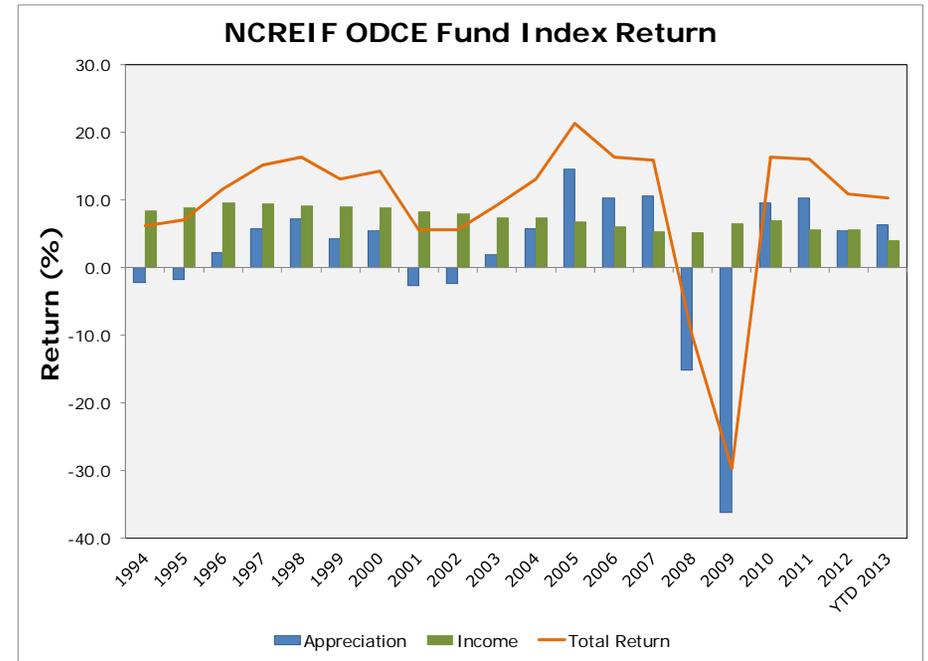
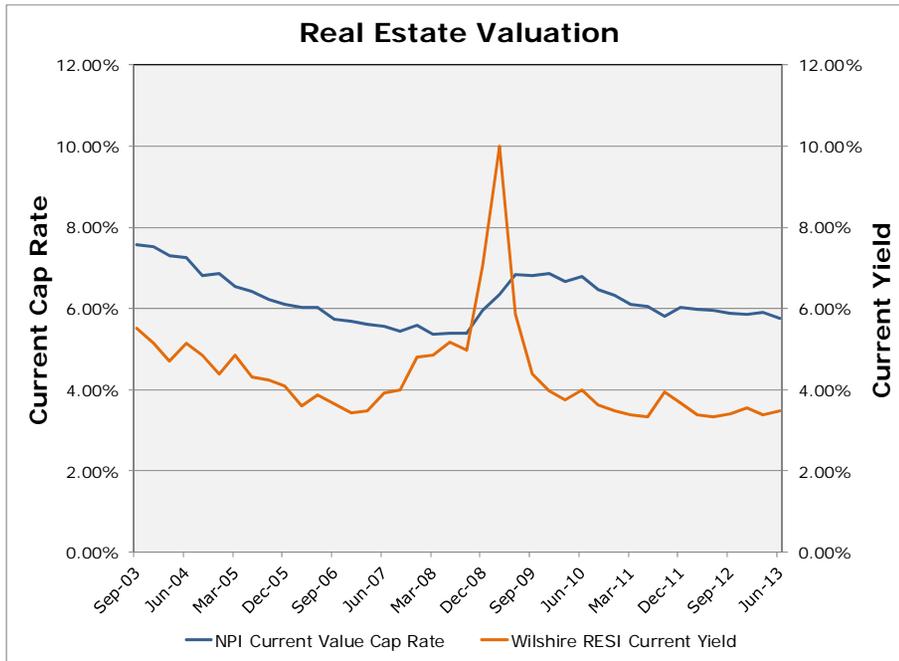
Data sources: Barclays Capital

# Real Assets



September 30, 2013	Qtr	Ytd	1 Yr	3 Yr	5 Yr	10 Yr
Barclays U.S. TIPS Index	0.7	-6.7	-6.1	4.0	5.3	5.2
Dow Jones UBS Commodity Index	2.1	-8.6	-14.3	-3.2	-5.3	2.1
Global Public Real Estate*	-0.1	2.9	6.8	12.2	6.7	10.1
NCREIF ODCE Fund Index	3.5	10.4	13.0	14.2	0.7	7.1
NCREIF Timberland Index	1.1	3.6	9.7	4.0	2.1	8.1
Alerian MLP Index (Oil & Gas)	-0.7	21.2	17.0	16.5	22.5	15.7

\* Wilshire Global Real Estate Securities from December 2003 to December 2004. Wilshire Global REITs from 2004 to present.



Data sources: Wilshire Compass, National Council of Real Estate Investment Fiduciaries

# Asset Class Performance



**Annual Asset Class Returns - Best to Worst**

2009	2010	2011	2012	2013
Emrg Mrkts 79.0%	REITs 28.6%	U.S. TIPS 13.6%	Emrg Mrkts 18.6%	U.S. Equity 33.1%
High Yield 58.2%	Emrg Mrkts 19.2%	REITs 9.2%	Developed 17.9%	Developed 23.3%
Developed 32.5%	U.S. Equity 17.2%	Core Bond 7.8%	REITs 17.6%	High Yield 7.4%
REITs 28.6%	Commodities 16.8%	High Yield 5.0%	U.S. Equity 16.1%	REITs 1.9%
U.S. Equity 28.3%	High Yield 15.1%	U.S. Equity 1.0%	High Yield 15.8%	T-Bills 0.1%
Commodities 18.9%	Developed 8.2%	T-Bills 0.1%	U.S. TIPS 7.0%	Core Bond -2.0%
U.S. TIPS 11.4%	Core Bond 6.5%	Developed -11.7%	Core Bond 4.2%	Emrg Mrkts -2.3%
Core Bond 5.9%	U.S. TIPS 6.3%	Commodities -13.3%	T-Bills 0.1%	Commodities -8.6%
T-Bills 0.2%	T-Bills 0.1%	Emrg Mrkts -18.2%	Commodities -1.0%	U.S. TIPS -8.6%

Annualized  
5-Year

2009-2013
High Yield 18.9%
U.S. Equity 18.6%
REITs 16.7%
Emrg Mrkts 15.1%
Developed 13.0%
U.S. TIPS 5.6%
Core Bond 4.4%
T-Bills 0.1%
Commodities -5.3%

Data sources: Wilshire Compass

Note: Developed asset class is developed markets ex-U.S., ex-Canada.

---

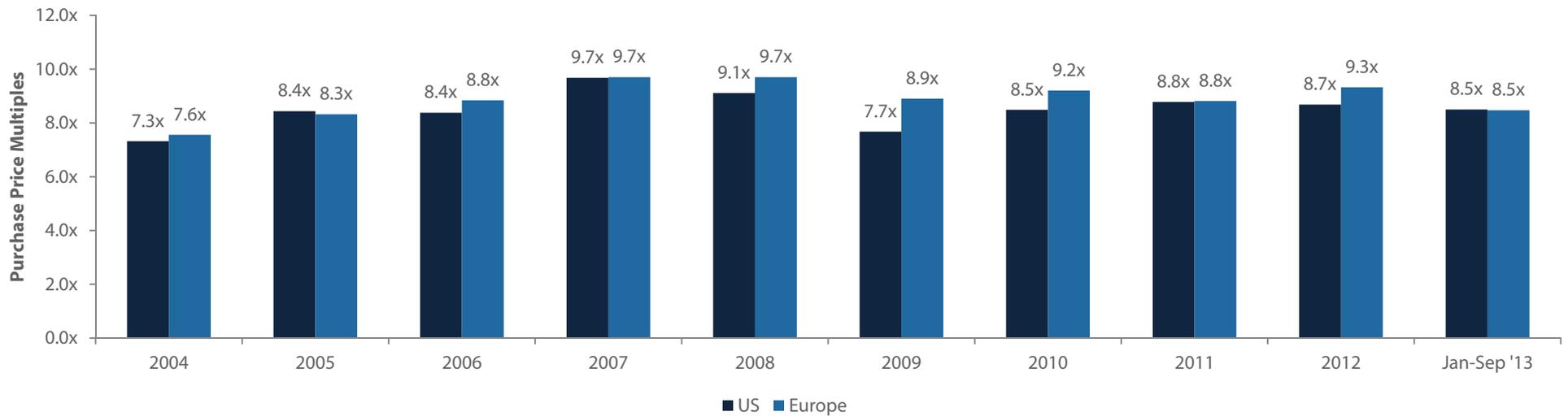
# *Appendix: Private Markets Update*

---

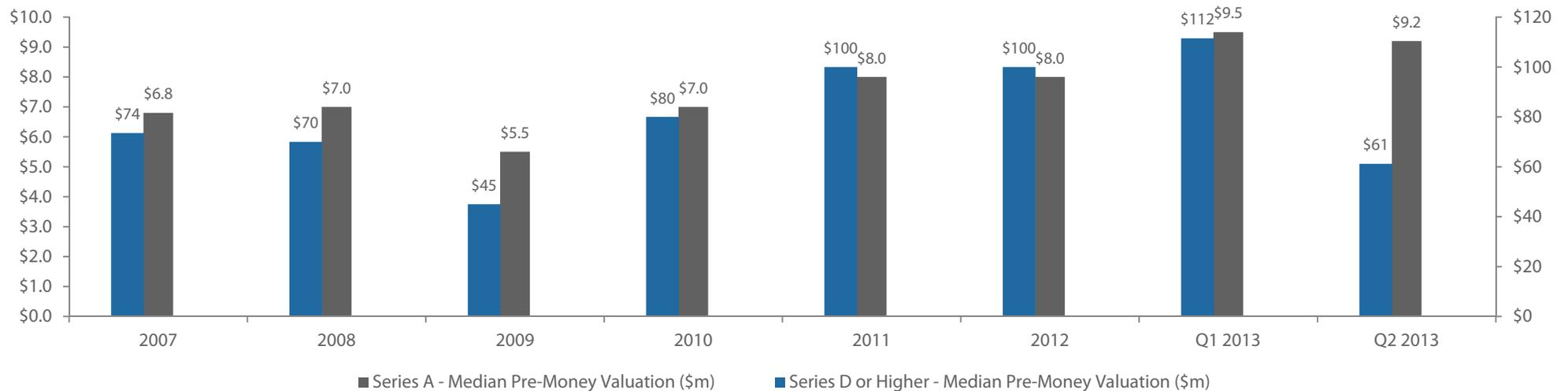
# Private Equity Environment – Pricing



### Global LBO Multiples (2004 – Q3 2013)



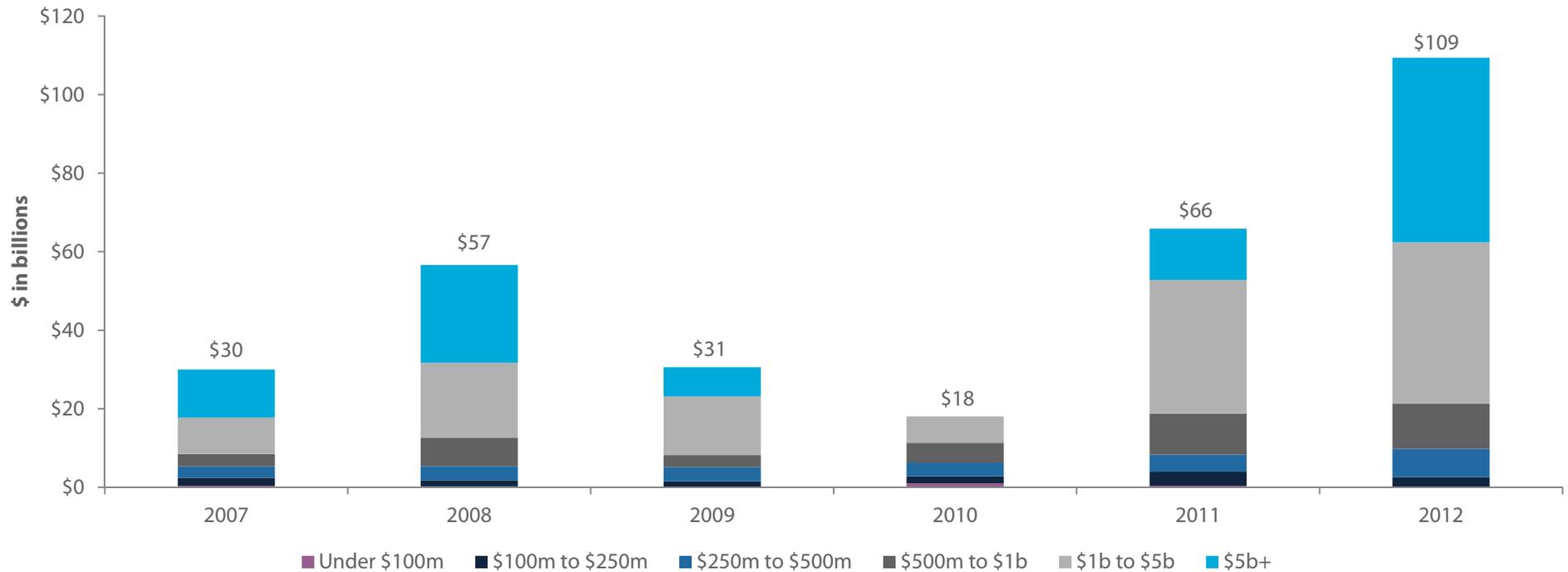
### Venture Capital Valuations (2007 – Q2 2013)



# North American Private Equity Overhang

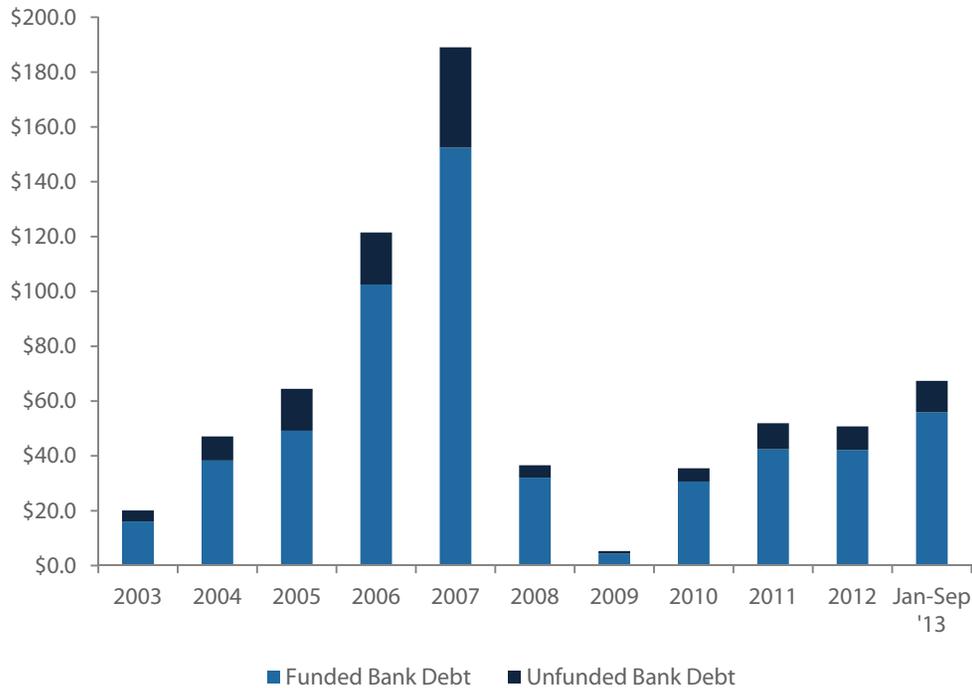


## Vintage Year Overhang

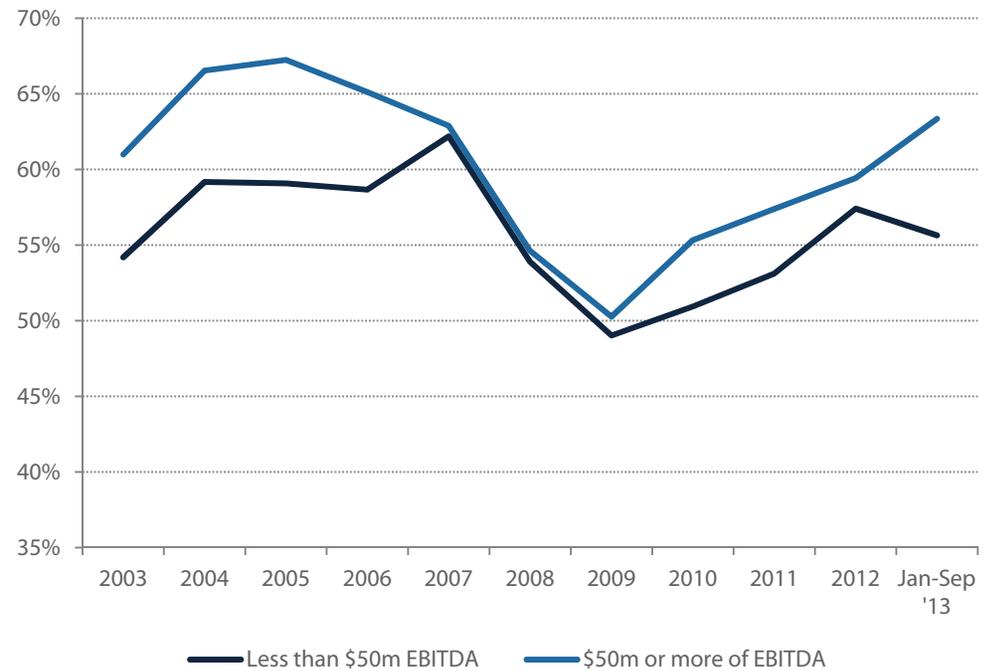


- Total private equity overhang significantly grew to over \$500 billion during the run-up to the financial crisis
- While the total private equity overhang has decreased to approximately \$328 billion, there still remains a large amount of capital to be deployed

### Total U.S. Leveraged Buyout Loan Volume (\$b)



### Percentage of Debt Used in Buyouts

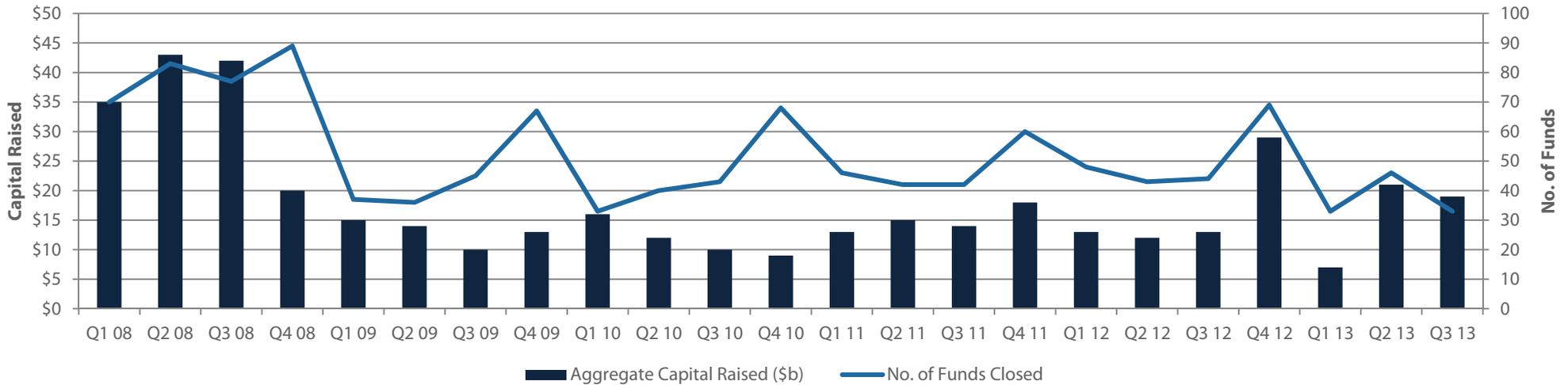


- The amount of capital available for leverage has gone down significantly since its peak volume in 2007, but continues to climb from the historically low levels in 2009
- Transactions with less than \$50m of EBITDA continue to apply less leverage than those of larger deals by a meaningful percentage

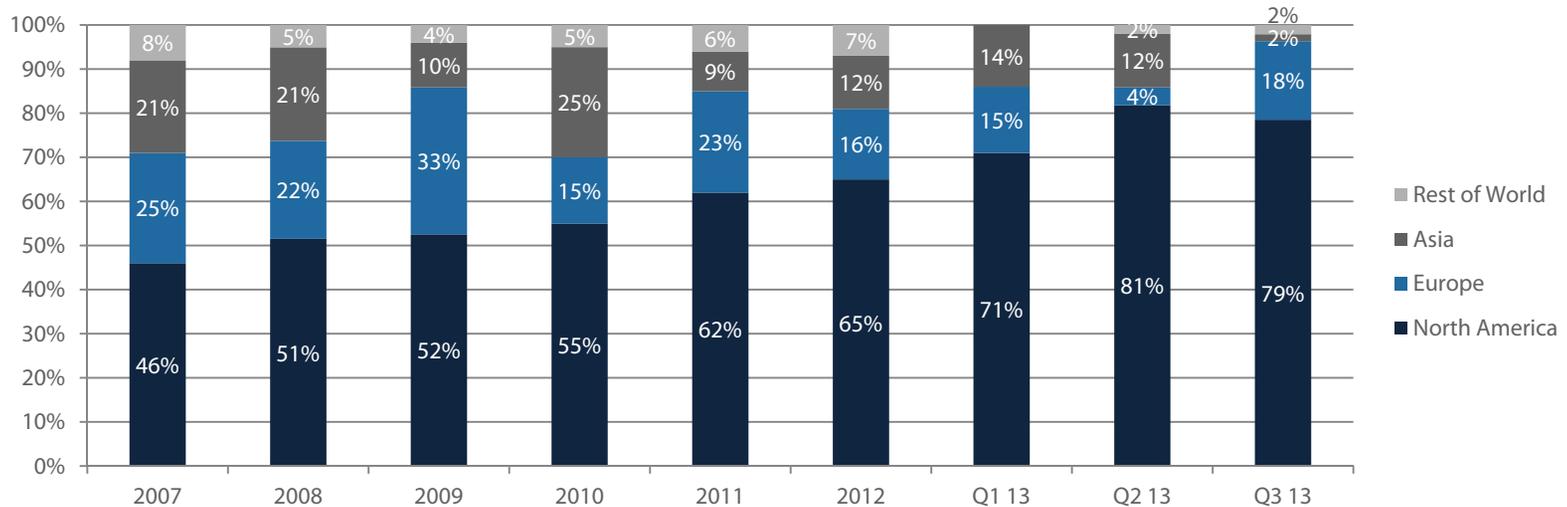
# Real Estate Fundraising



Quarterly Closed-End Private Real Estate Fundraising (Q1 2008 – Q3 2013)

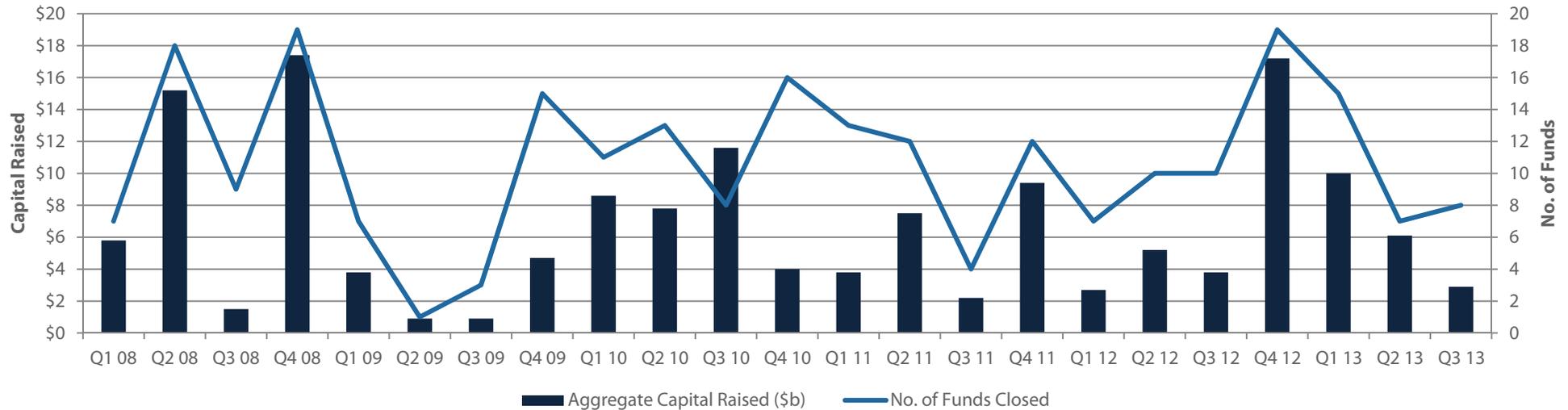


Proportion of Aggregate Capital Raised by Closed-End Private Real Estate Funds by Fund Geographic Focus (2007 – Q3 2013)

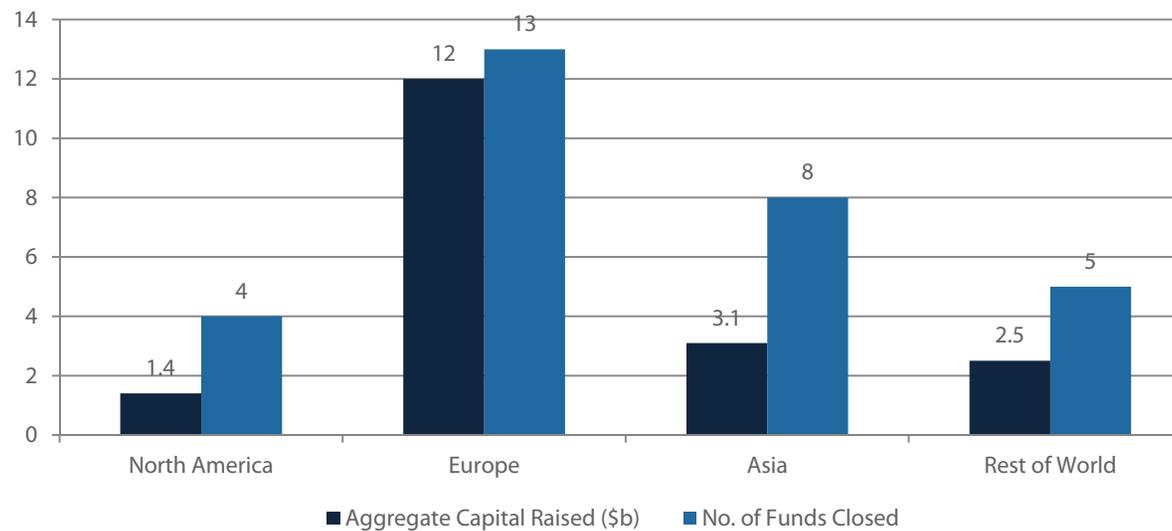


Source: Preqin.

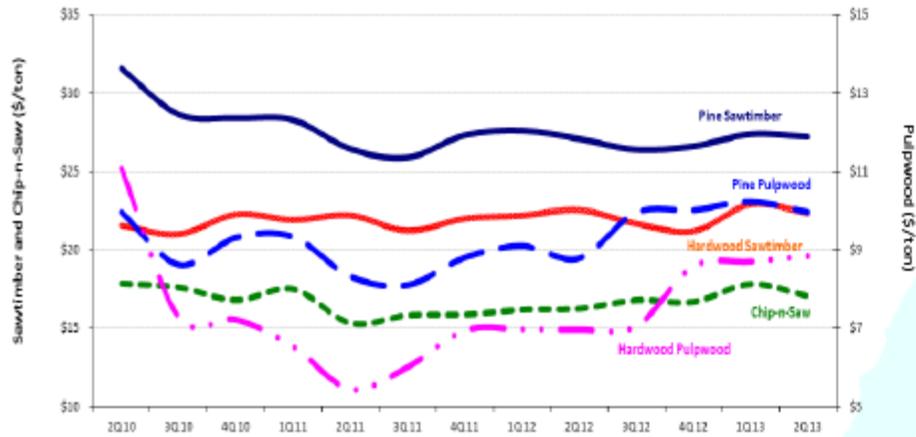
### Unlisted Infrastructure Fundraising (Q1 2008 – Q3 2013)



### Unlisted Infrastructure Fundraising by Primary Geographic Focus (January - September 2013)

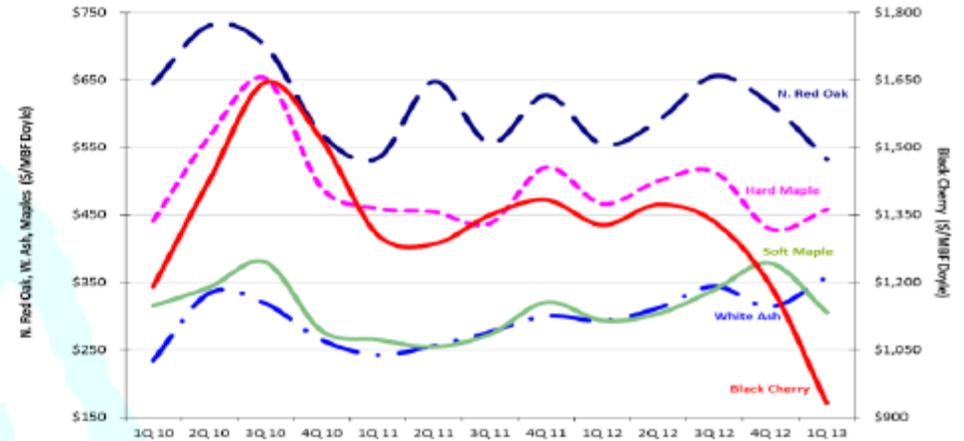


## Southeastern Timber Prices



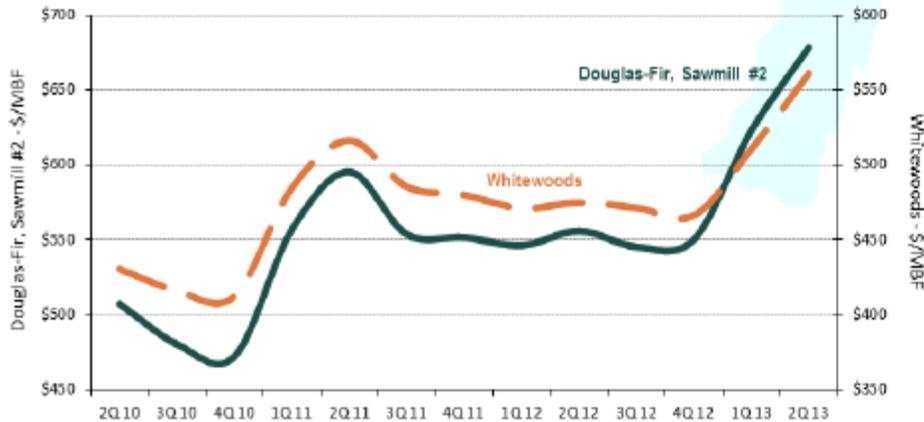
Source: Forest2Market®

## Northeastern Hardwood Timber Prices



Source: Pennsylvania Woodlands Timber Market Report - Northwest Region

## Pacific Northwest Timber Prices



Source: Log Lines®

## Inflation (CPI)

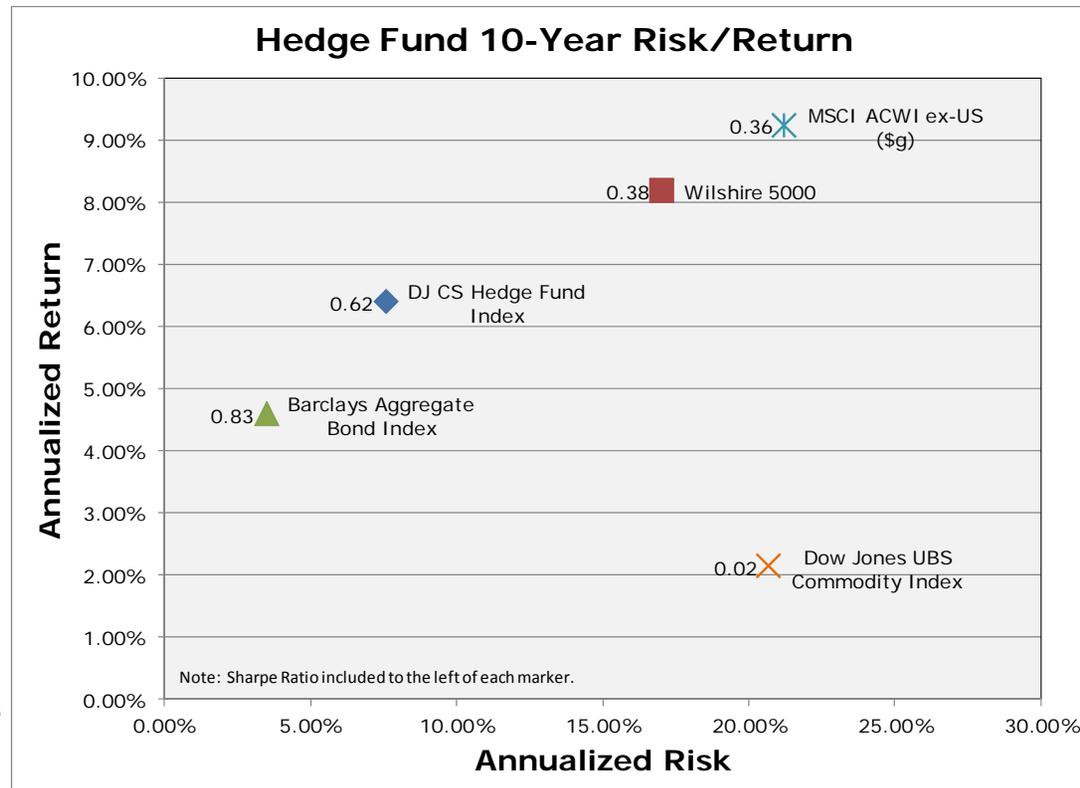


Source: <http://www.bls.gov/cpi/home.htm>

# Hedge Fund Performance



September 30, 2013	Qtr	Ytd	1 Yr	3 Yr	5 Yr	10 Yr
DJ CS Hedge Fund Index	1.6	5.4	7.4	5.0	5.5	6.4
Event Driven Index	2.9	10.2	13.7	5.5	6.4	7.7
Global Macro Index	0.2	1.5	2.8	5.4	6.8	8.2
Long/Short Equity Index	3.5	10.7	13.1	5.6	6.0	7.0
Multi-Strategy Index	2.7	6.6	9.5	7.9	7.5	6.7
Wilshire 5000	6.0	20.9	21.0	16.5	10.4	8.2
MSCI ACWI ex-US (\$g)	10.2	10.5	17.0	6.4	6.7	9.2
Barclays Aggregate Bond Index	0.6	-1.9	-1.7	2.9	5.4	4.6
Dow Jones UBS Commodity Index	2.1	-8.6	-14.3	-3.2	-5.3	2.1



Data sources: Wilshire Compass

# Core Fixed Income – Alpha Persistence



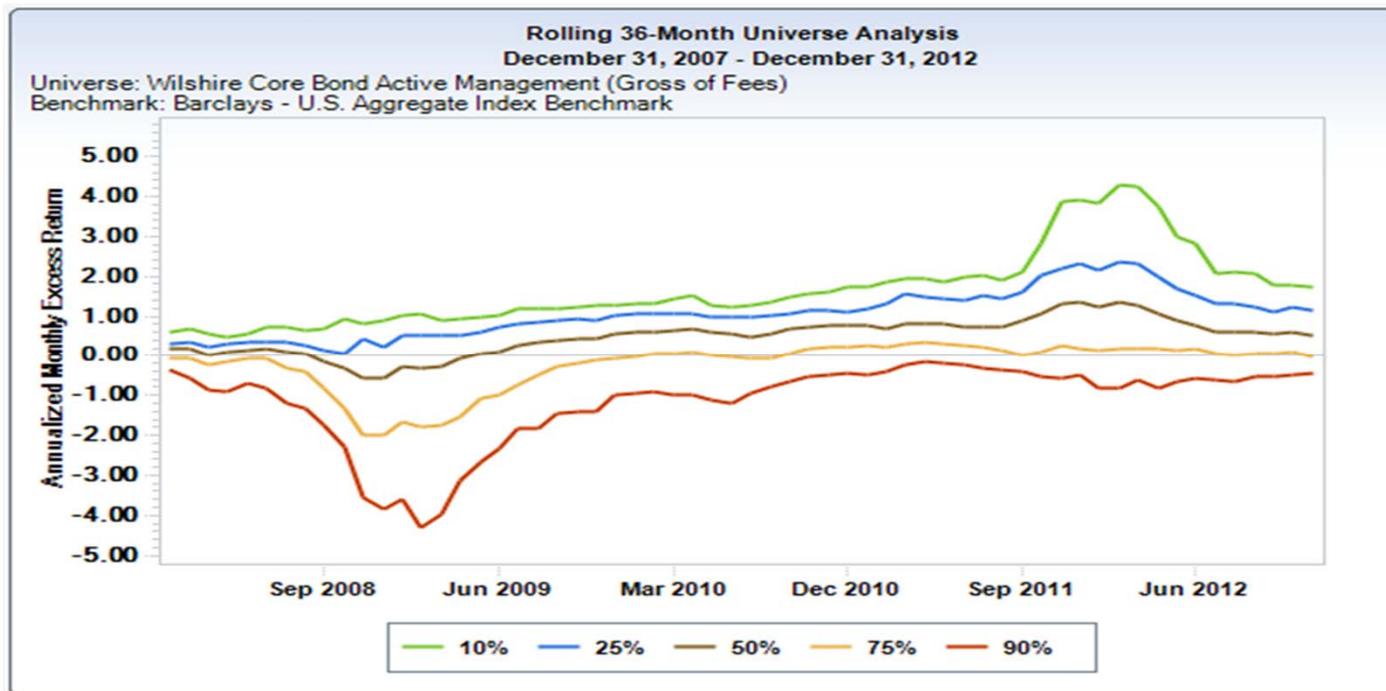
## Universe Statistics

As of 12/31/2011	1 Year	3 Years	5 Years	10 Years
Index Ranking	90	75	80	76
Number of Products	68	67	65	62
Average Excess Return	1.43	0.62	0.53	0.34
Median Excess Return	1.31	0.50	0.58	0.32
Average IR	2.35	0.77	0.37	0.29
Median IR	2.24	0.89	0.33	0.27

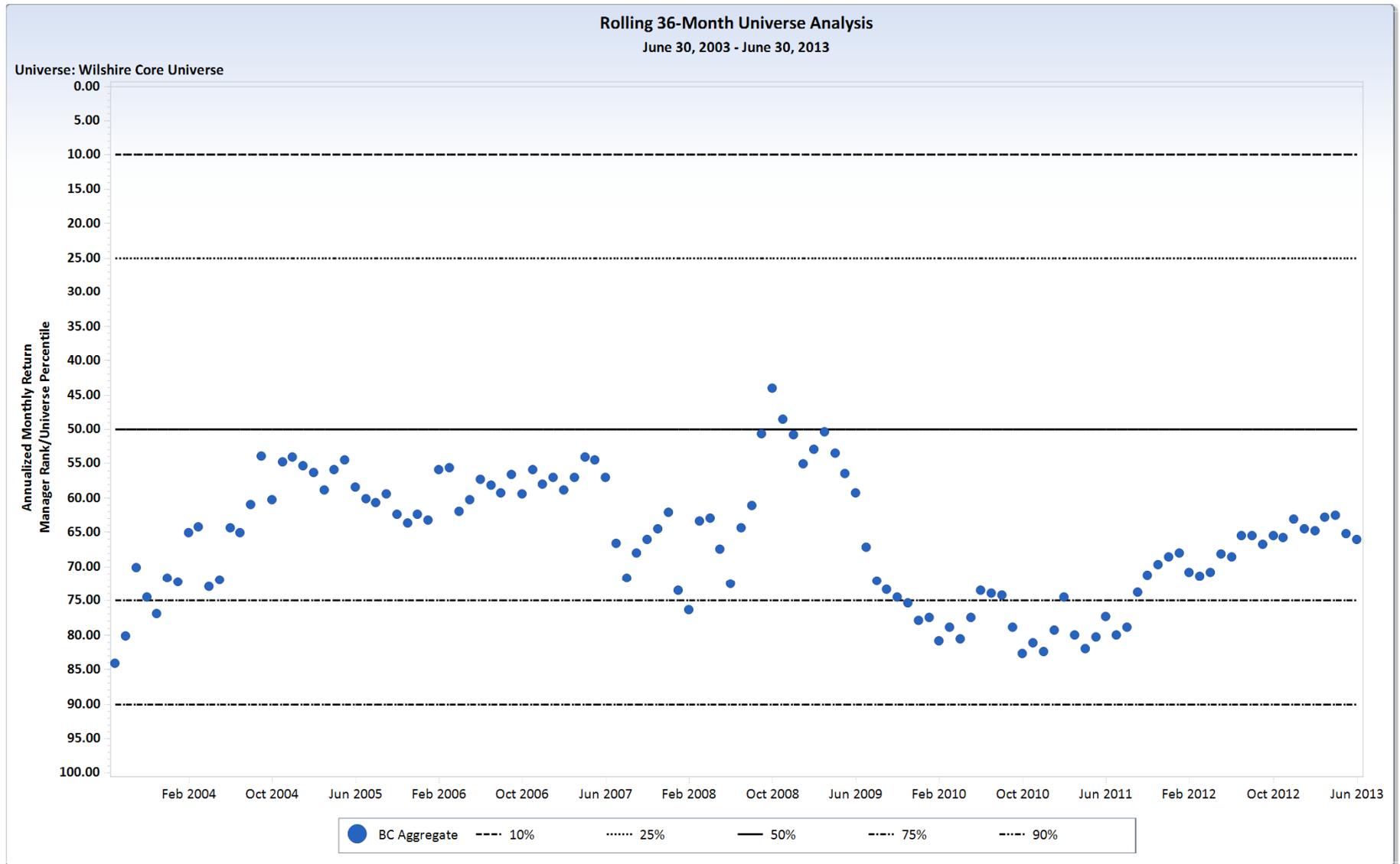
## Manager Consistency

### Annualized Quarterly Excess Returns

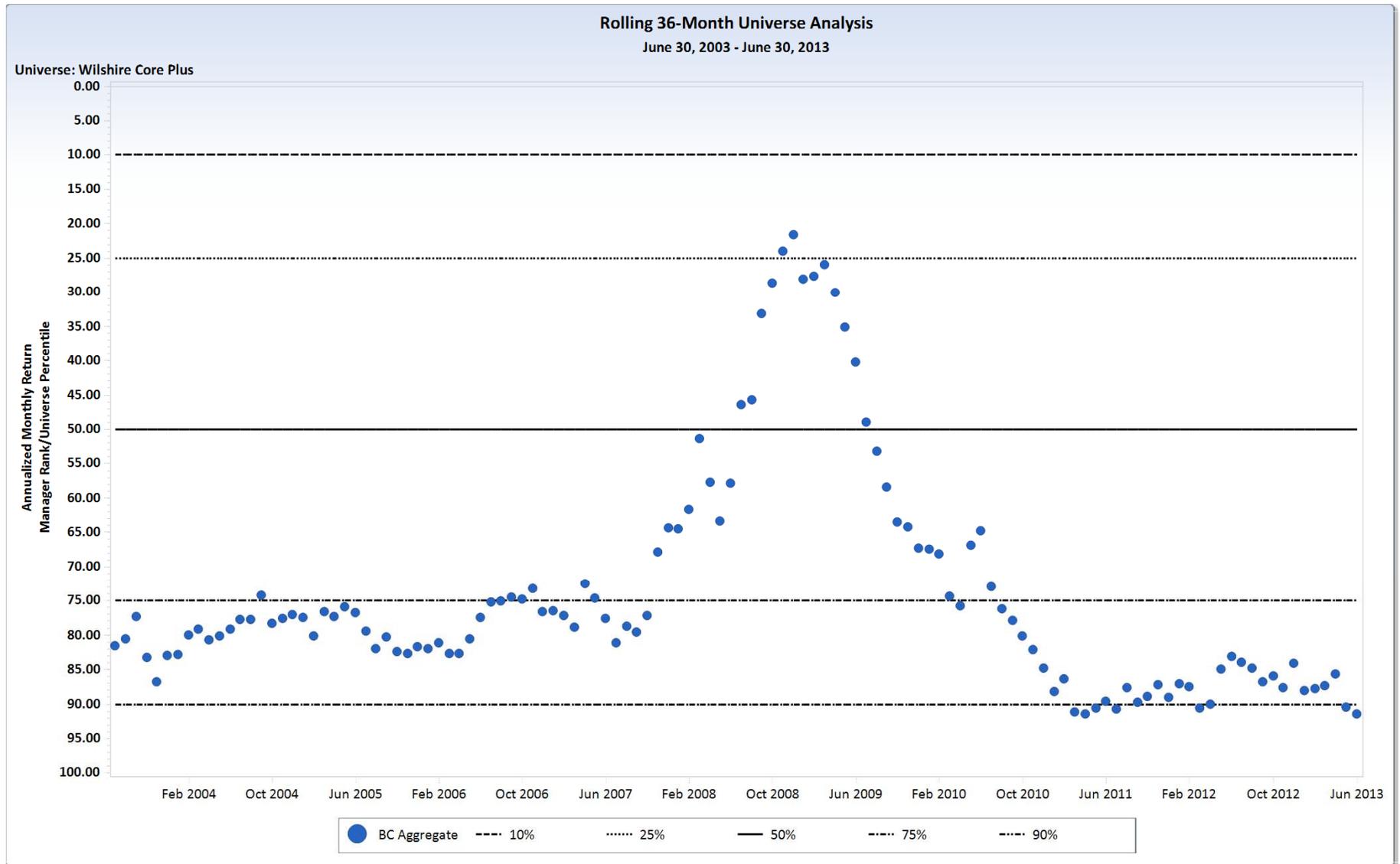
3 Year Quartile Rank 2009	3 Year Quartile Rank 2012				
	1 <sup>st</sup>	2 <sup>nd</sup>	3 <sup>rd</sup>	4 <sup>th</sup>	Total
1 <sup>st</sup>	29%	12%	29%	24%	94%
2 <sup>nd</sup>	18%	18%	41%	18%	94%
3 <sup>rd</sup>	12%	35%	6%	47%	100%
4 <sup>th</sup>	29%	29%	24%	12%	94%
No Data	100%	0%	0%	0%	100%



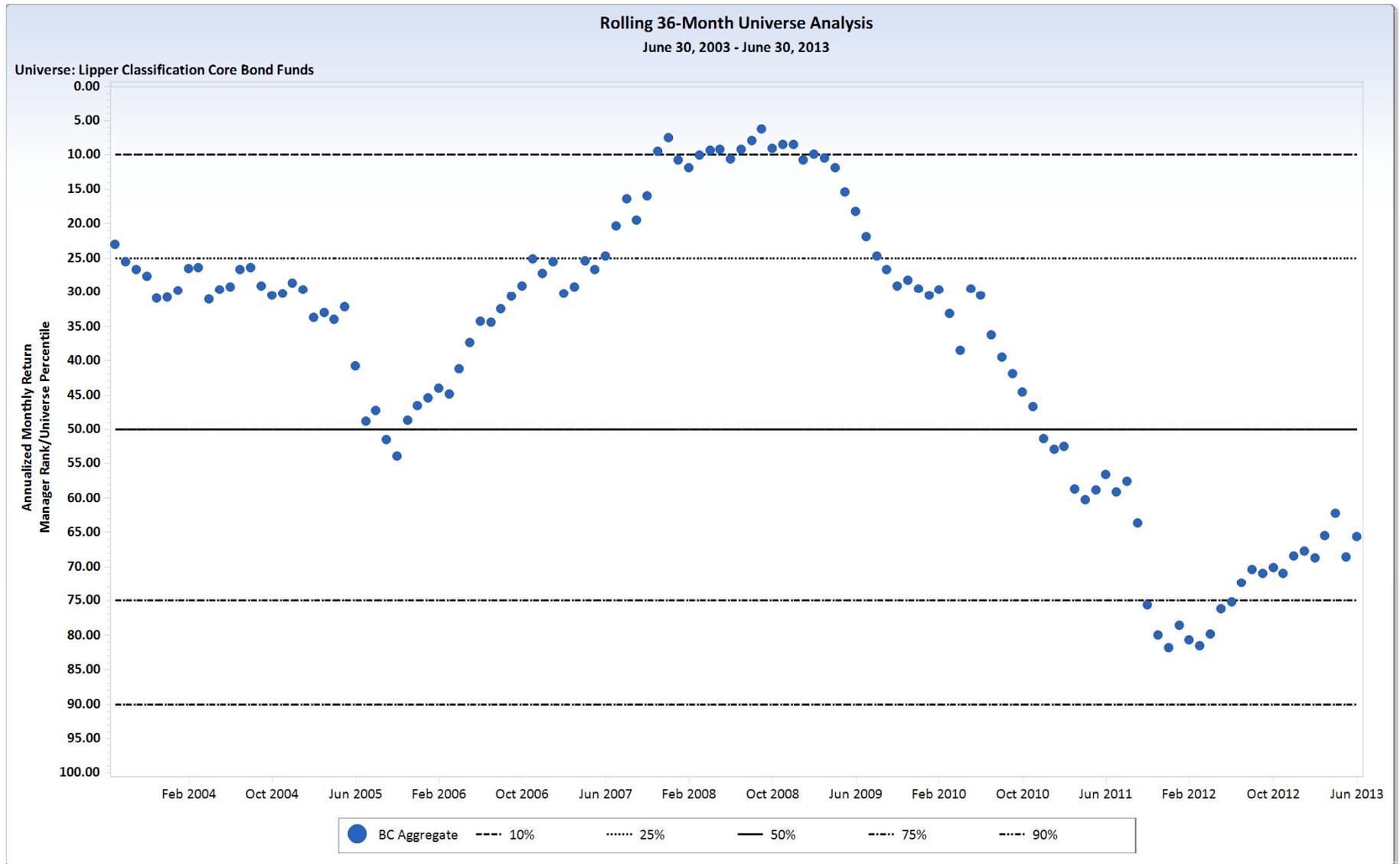
# Institutional Core Fixed Income Universe



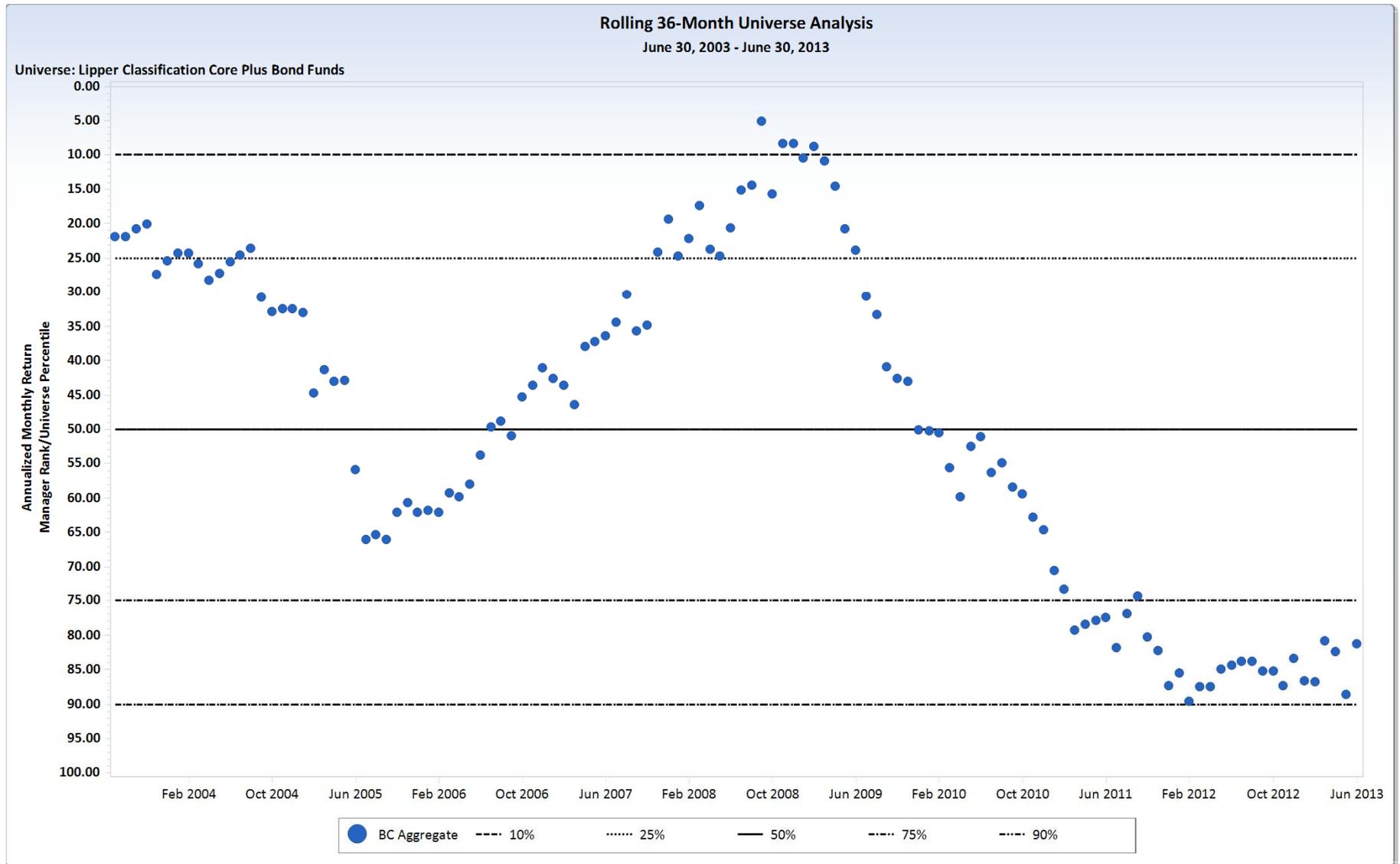
# Institutional Core Plus Fixed Income Universe



# Core Fixed Income Mutual Funds



# Core Plus Fixed Income Mutual Funds



# *Important Information*



This material contains confidential and proprietary information of Wilshire Consulting, and is intended for the exclusive use of the person to whom it is provided. It may not be modified, sold or otherwise provided, in whole or in part, to any other person or entity without prior written permission from Wilshire Consulting. The information contained herein has been obtained from sources believed to be reliable. Wilshire Consulting gives no representations or warranties as to the accuracy of such information, and accepts no responsibility or liability (including for indirect, consequential or incidental damages) for any error, omission or inaccuracy in such information and for results obtained from its use. Information and opinions are as of the date indicated, and are subject to change without notice.

This material is intended for informational purposes only and should not be construed as legal, accounting, tax, investment, or other professional advice.

This presentation represents the current opinion of the firm based on sources deemed reliable. The information and statistical data contained herein are based on sources believed to be reliable. Wilshire does not represent that it is accurate and should not be relied on as such or be the basis for an investment decision. This Presentation is for information purposes only. Past performance is no guarantee of future results.

Any opinions expressed in this Presentation are current only as of the time made and are subject to change without notice. Wilshire assumes no duty to update any such statements. Any holdings of a particular company or security discussed herein are under periodic review by the author and are subject to change at any time, without notice.

This report may include estimates, projections and other "forward-looking statements." Due to numerous factors, actual events may differ substantially from those presented.

This presentation is not to be used or considered as an offer to sell, or a solicitation to an offer to buy, any security. Nothing contained herein should be considered a recommendation or advice to purchase or sell any security. Wilshire, its officers, directors, employees or clients may have positions in securities or investments mentioned in this publication, which positions may change at any time, without notice.

Wilshire® is a registered service mark of Wilshire Associates Incorporated, Santa Monica, California. All other trade names, trademarks, and/or service marks are the property of their respective holders.

Copyright © 2013 Wilshire Associates Incorporated. All rights reserved.