

NORTH CAROLINA
DEPARTMENT OF STATE TREASURER



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INVESTMENT MANAGEMENT DIVISION

Investment Grade Fixed Income Review

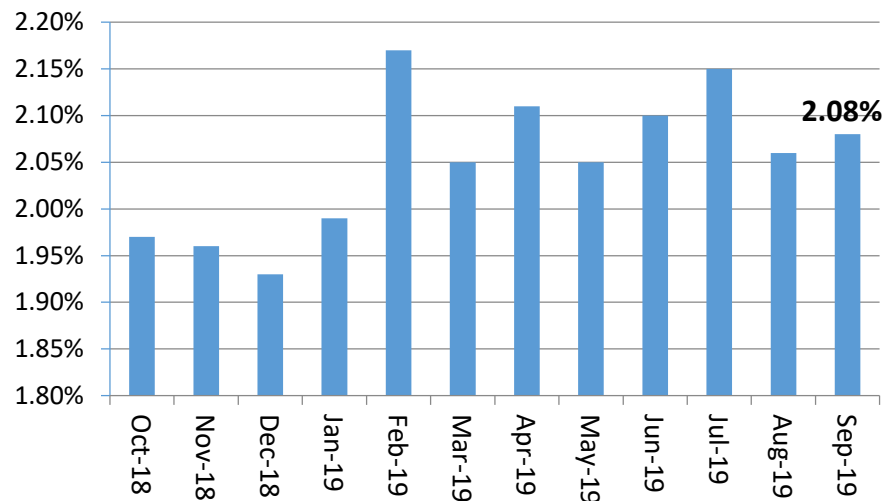
November 20, 2019



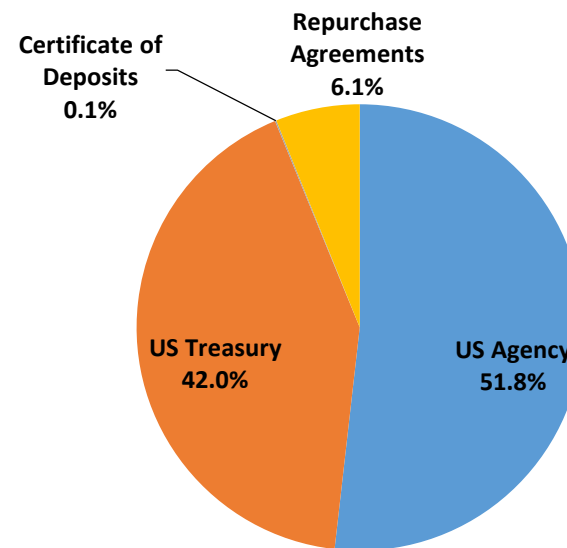
North Carolina Short Term Portfolio (STIF)

September 30, 2019

Historical Annualized Net Cash Return



STIF Allocation

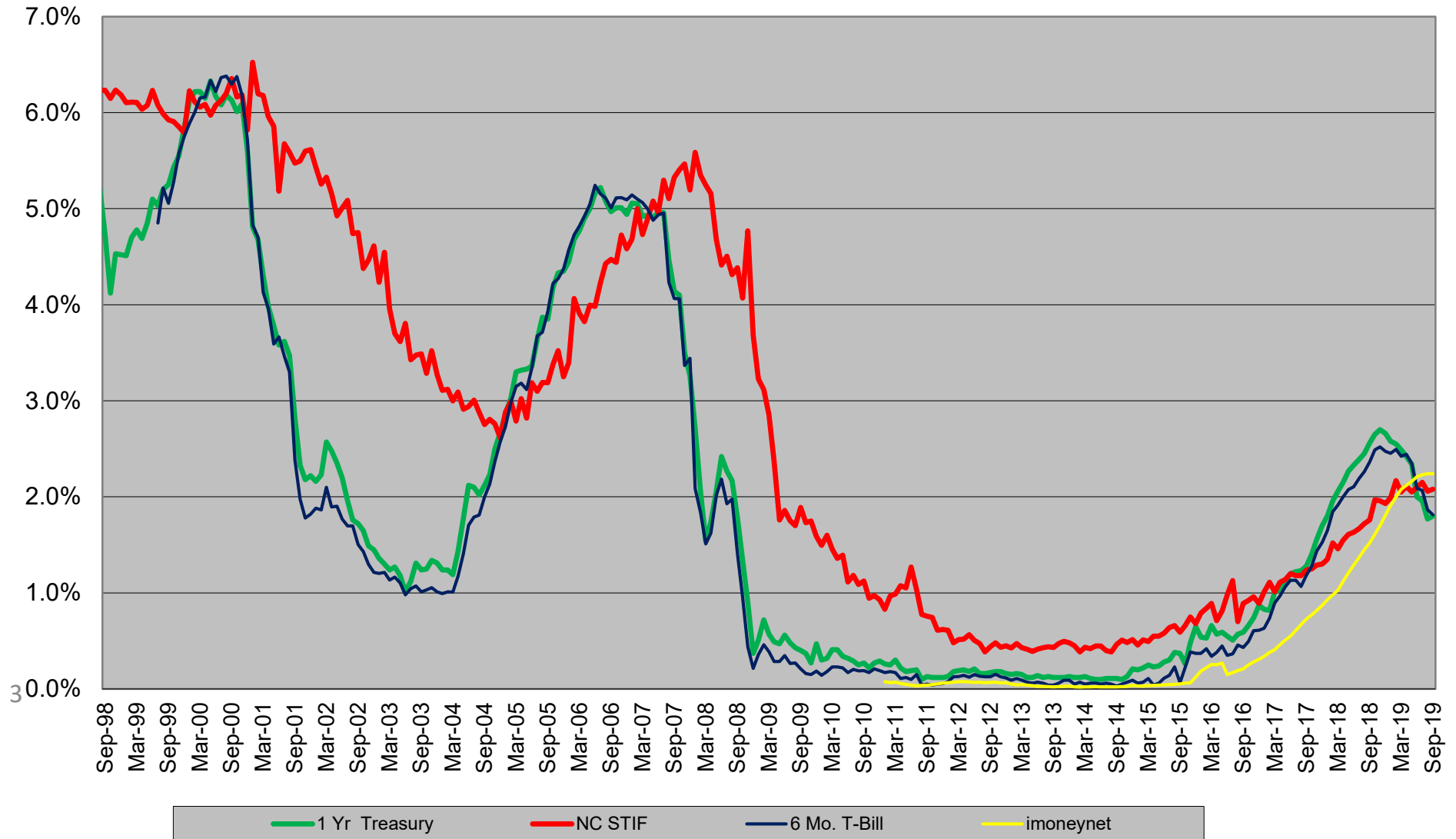


Portfolio Characteristics	Month ending 9/30/19
Current Annualized Net Cash Return	2.08%
Effective Duration	.60
Average Maturity (Yrs)	1.5
Average Credit Rating (Moody's)	AAA
Average Price	99.89
Average Coupon	1.79%



Short Term Portfolio (STIF) Rate History

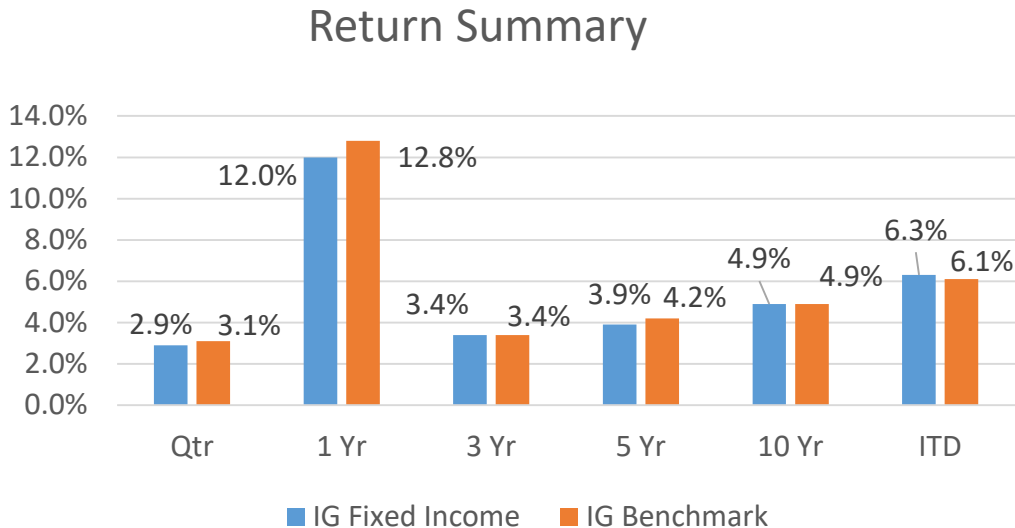
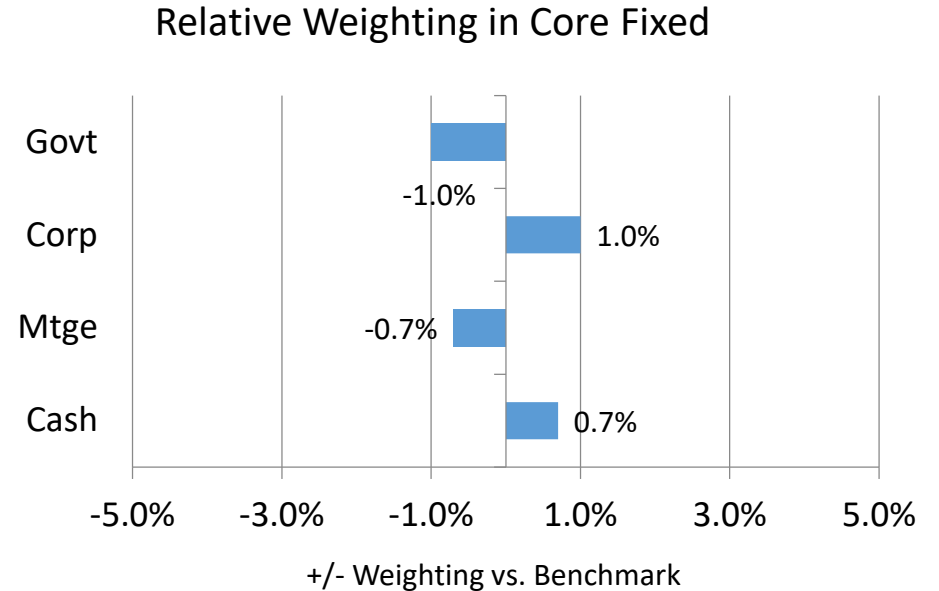
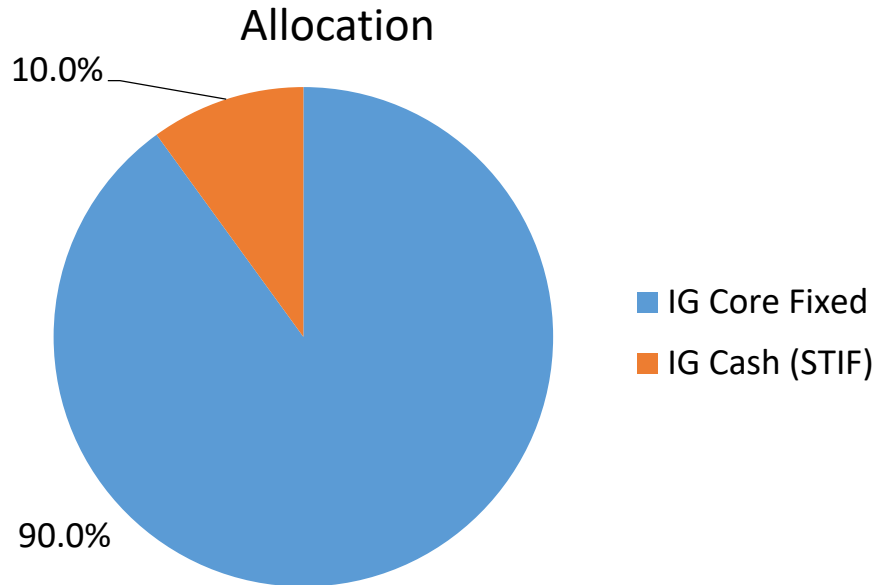
\$27.2 Billion AUM as of 9/30/19





Investment Grade Fixed Income Profile

As of September 30, 2019



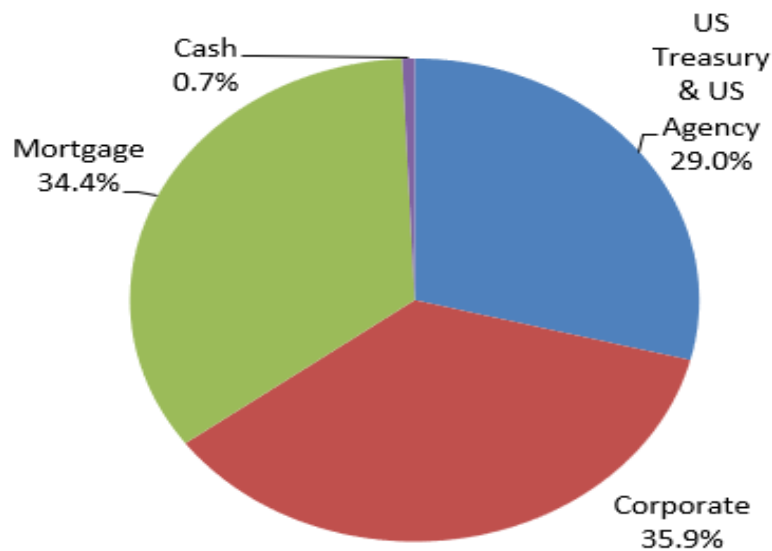
- We narrowed the short duration gap in core fixed income relative to our benchmark from the prior year, 7.9 vs. 8.4
- While the portfolio earned a 12% return, it lagged the benchmark due to lower relative interest rate risk in the declining rate environment



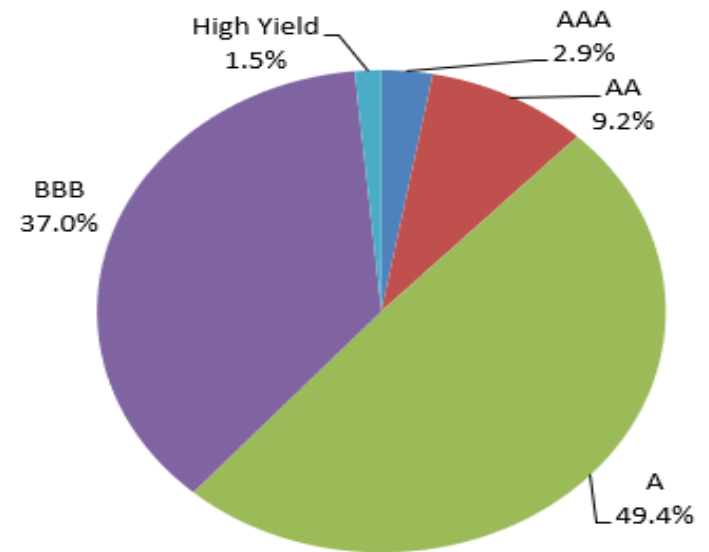
Core Fixed Income Long Term Portfolio (LTIP)

September 30, 2019

LTIP Allocation



Corporate Allocation by Quality



Portfolio Characteristics (ex cash)	As of 9/30/19
Yield to Maturity	2.55%
Duration	7.9
Average Maturity (Yrs)	11.3
Average Credit Rating	AA
Average Coupon	4.07%

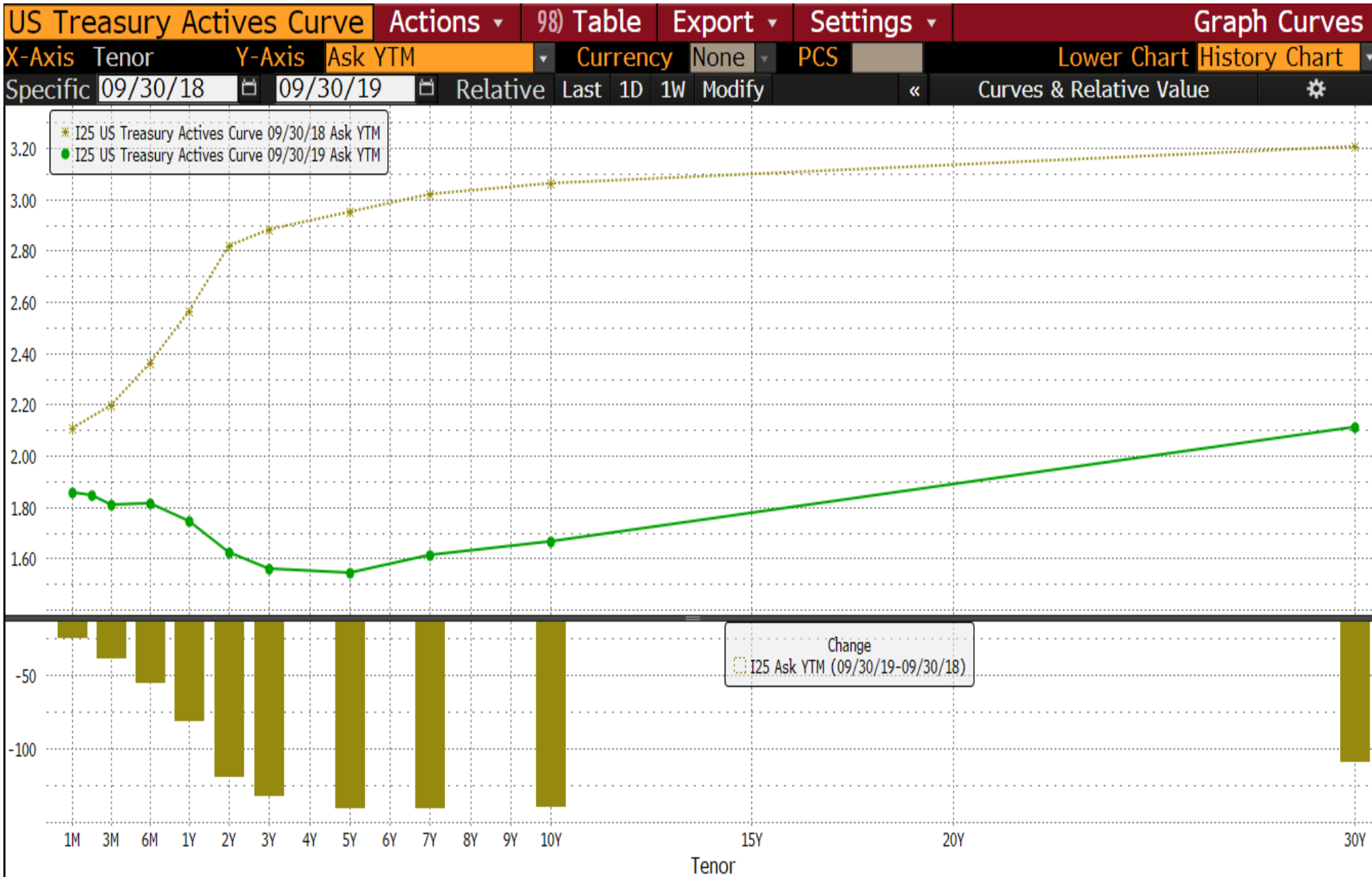
* BOAML Custom Fixed Income Benchmark



10 year and 30 Year UST Yield History

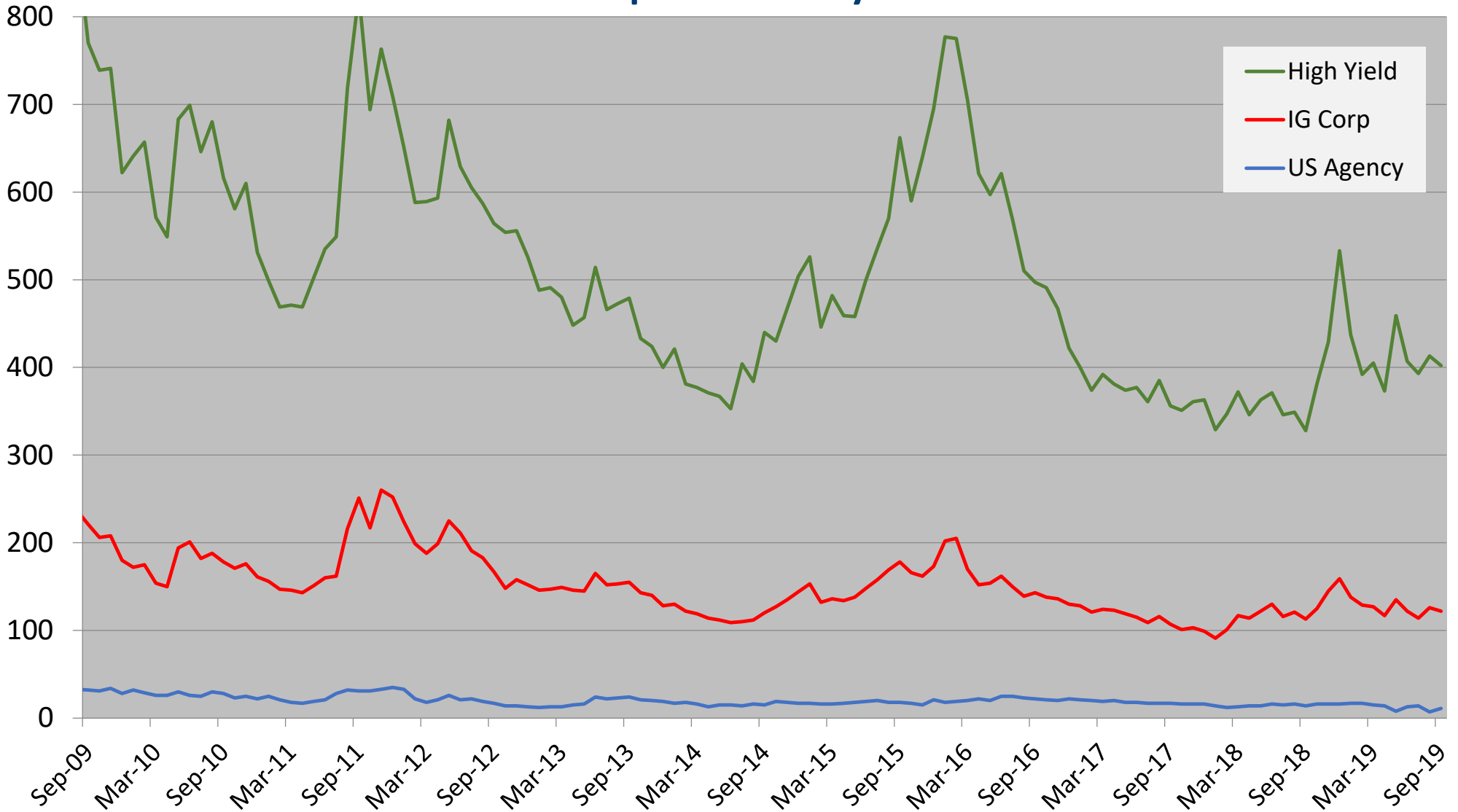


Source: Bloomberg





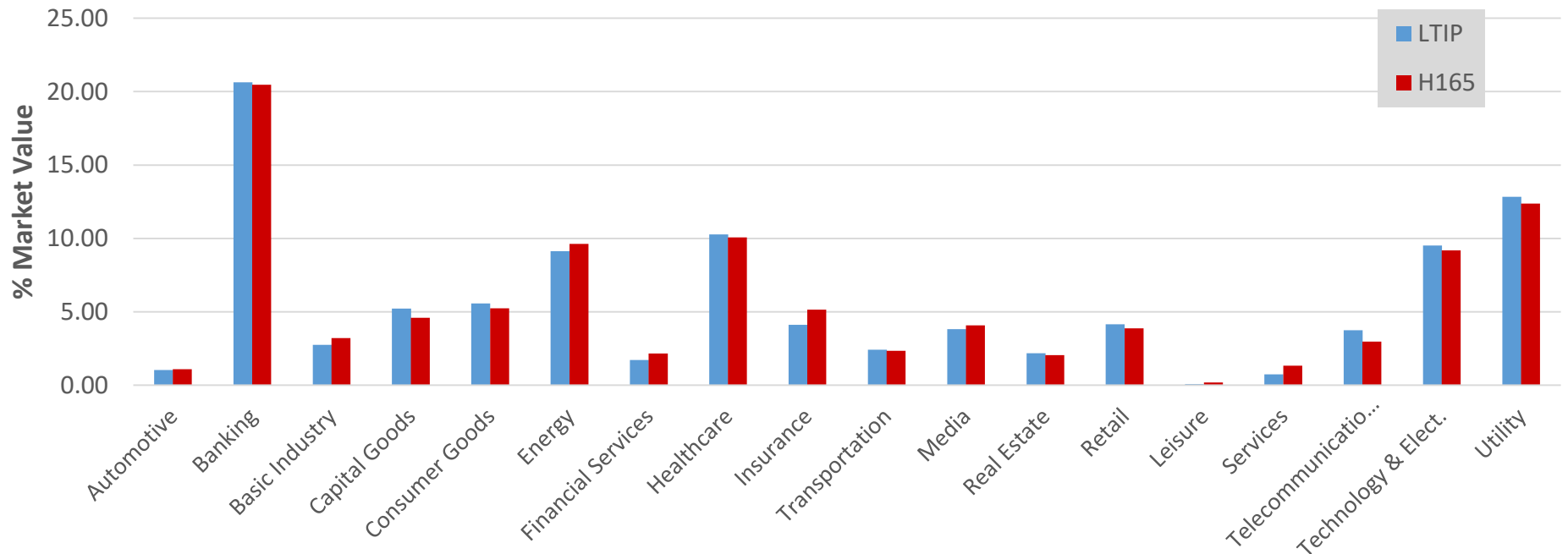
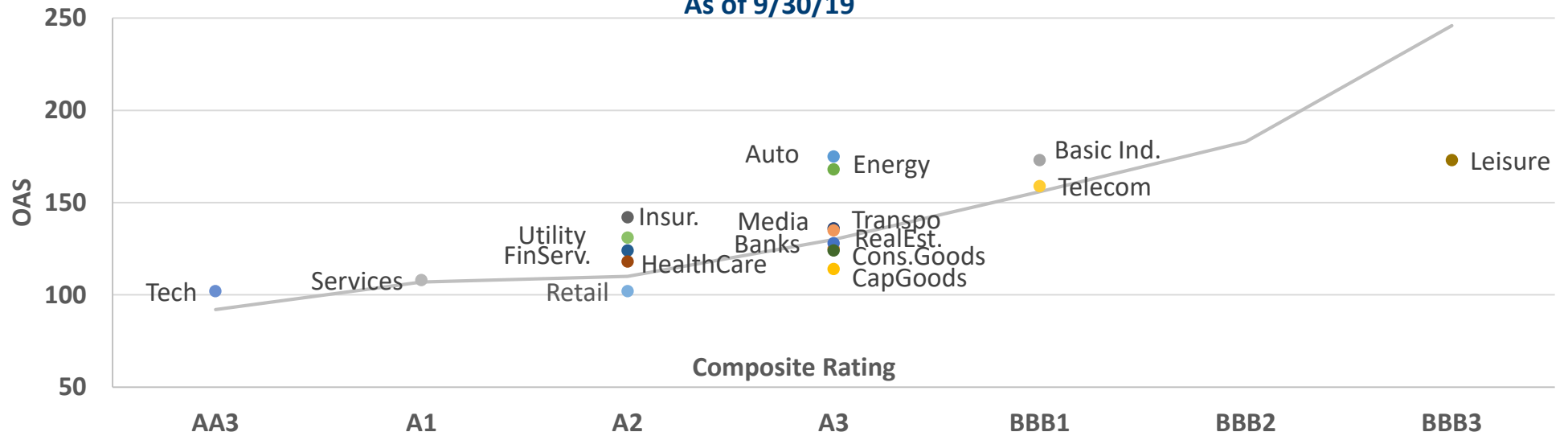
Fixed Income Credit Markets Spread History





Corporate Relative Value and LTIP Allocation by Sector

As of 9/30/19



Source: BofAML, used with permission. See disclaimer on last page.



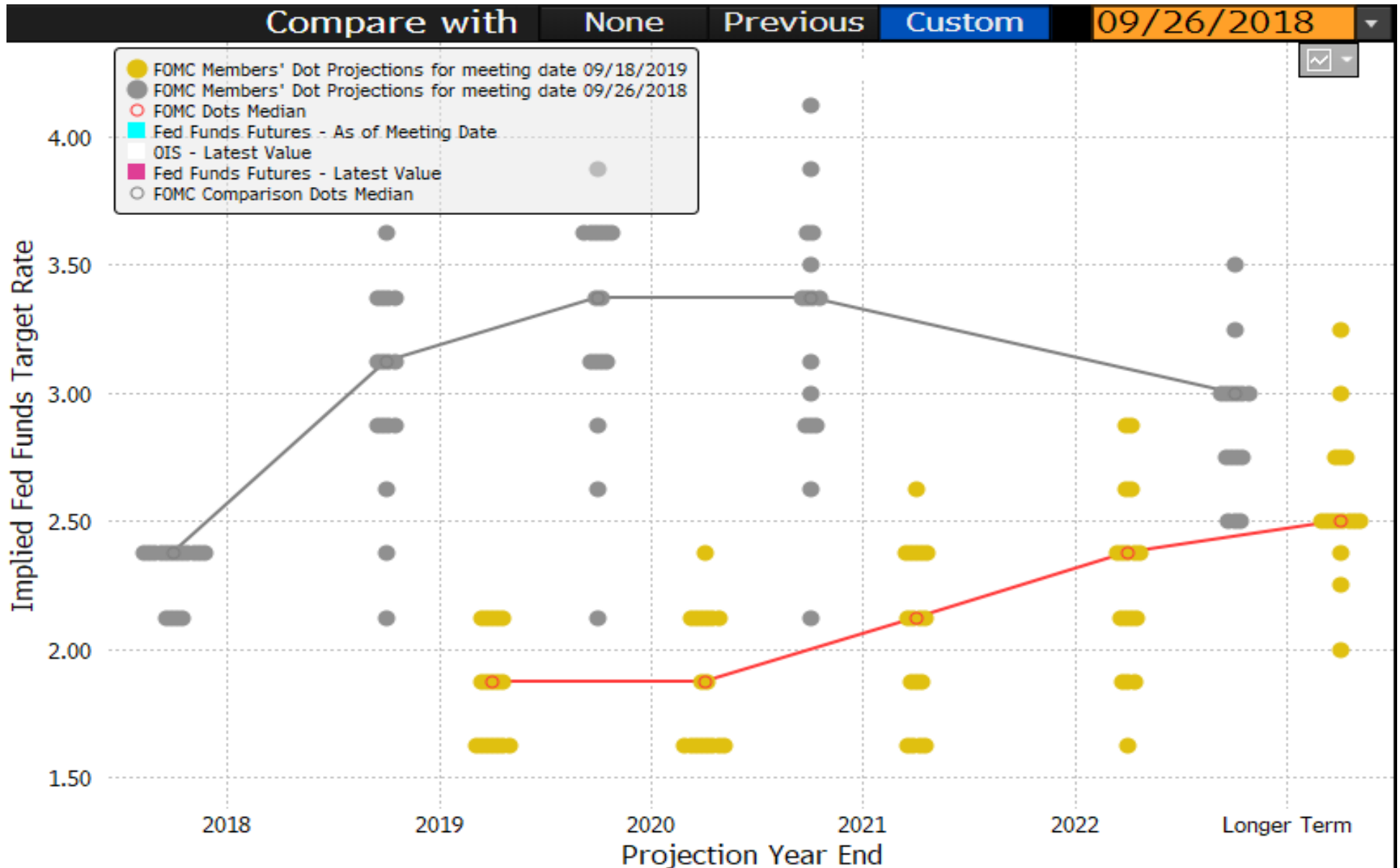
FOMC Projections

Table 1. Economic projections of Federal Reserve Board members and Federal Reserve Bank presidents, under their individual assumptions of projected appropriate monetary policy, September 2019

Advance release of table 1 of the Summary of Economic Projections to be released with the FOMC minutes

Percent															
Variable	Median ¹					Central Tendency ²					Range ³				
	2019	2020	2021	2022	Longer run	2019	2020	2021	2022	Longer run	2019	2020	2021	2022	Longer run
Change in real GDP	2.2	2.0	1.9	1.8	1.9	2.1-2.3	1.8-2.1	1.8-2.0	1.7-2.0	1.8-2.0	2.1-2.4	1.7-2.3	1.7-2.1	1.6-2.1	1.7-2.1
June projection	2.1	2.0	1.8		1.9	2.0-2.2	1.8-2.2	1.8-2.0		1.8-2.0	2.0-2.4	1.5-2.3	1.5-2.1		1.7-2.1
Unemployment rate	3.7	3.7	3.8	3.9	4.2	3.6-3.7	3.6-3.8	3.6-3.9	3.7-4.0	4.0-4.3	3.5-3.8	3.3-4.0	3.3-4.1	3.3-4.2	3.6-4.5
June projection	3.6	3.7	3.8		4.2	3.6-3.7	3.5-3.9	3.6-4.0		4.0-4.4	3.5-3.8	3.3-4.0	3.3-4.2		3.6-4.5
PCE inflation	1.5	1.9	2.0	2.0	2.0	1.5-1.6	1.8-2.0	2.0	2.0-2.2	2.0	1.4-1.7	1.7-2.1	1.8-2.3	1.8-2.2	2.0
June projection	1.5	1.9	2.0		2.0	1.5-1.6	1.9-2.0	2.0-2.1		2.0	1.4-1.7	1.8-2.1	1.9-2.2		2.0
Core PCE inflation ⁴	1.8	1.9	2.0	2.0		1.7-1.8	1.9-2.0	2.0	2.0-2.2		1.6-1.8	1.7-2.1	1.8-2.3	1.8-2.2	
June projection	1.8	1.9	2.0			1.7-1.8	1.9-2.0	2.0-2.1			1.4-1.8	1.8-2.1	1.8-2.2		
Memo: Projected appropriate policy path															
Federal funds rate	1.9	1.9	2.1	2.4	2.5	1.6-2.1	1.6-2.1	1.6-2.4	1.9-2.6	2.5-2.8	1.6-2.1	1.6-2.4	1.6-2.6	1.6-2.9	2.0-3.3
June projection	2.4	2.1	2.4		2.5	1.9-2.4	1.9-2.4	1.9-2.6		2.5-3.0	1.9-2.6	1.9-3.1	1.9-3.1		2.4-3.3

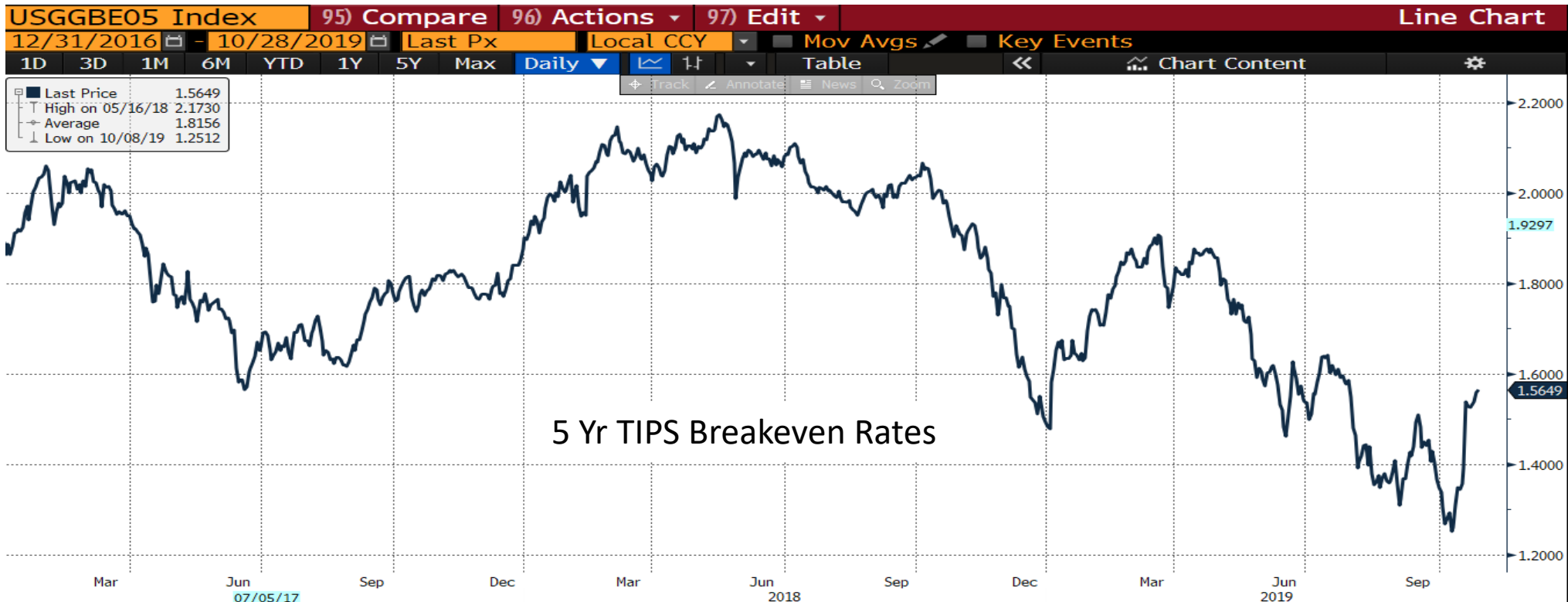
Fed Dot Plot





Modest Rate Increases Expected in the Near Term

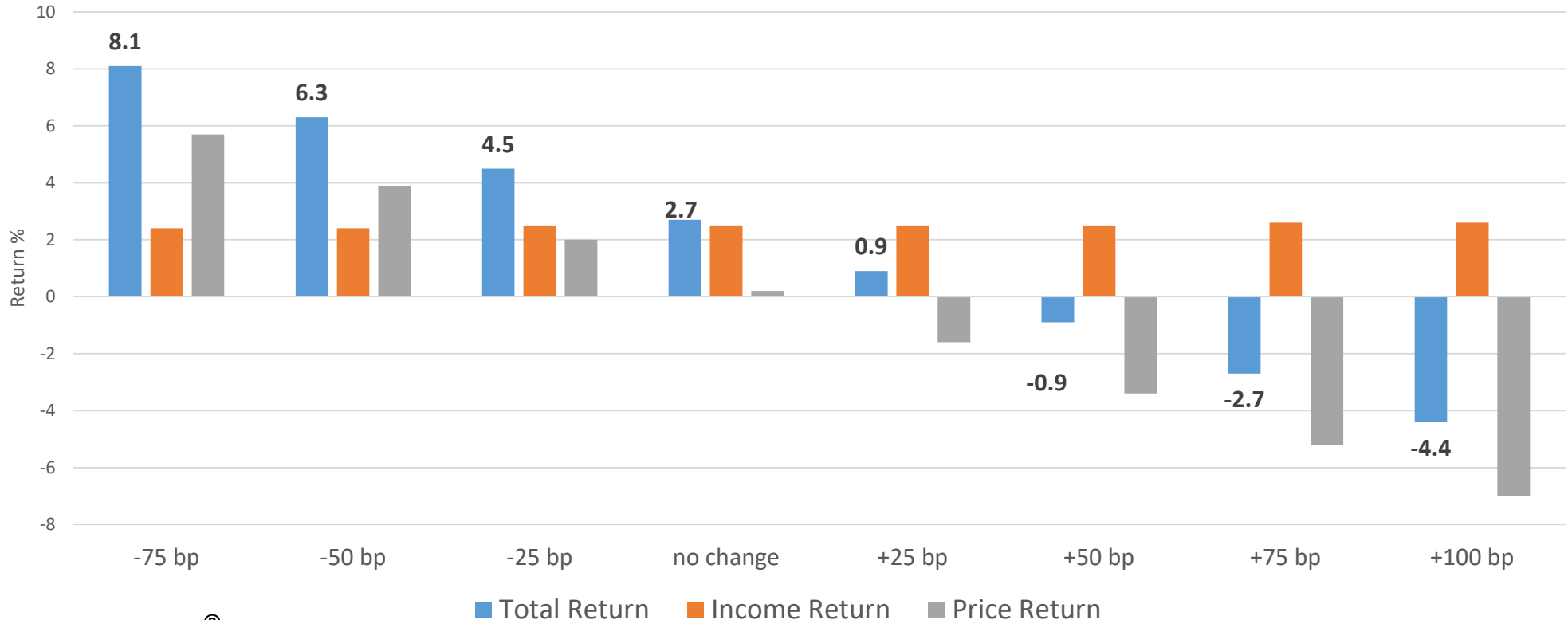
Rate	Market Yld	Q4 19	Q1 20	Q2 20	Q3 20	Q4 20	Q1 21	Q2 21	Q3 21	Q4 21
United States										
US 30-Year	2.34	2.04	2.11	2.20	2.26	2.32	2.40	2.47	2.57	2.61
US 10-Year	1.85	1.62	1.68	1.77	1.83	1.86	1.95	2.04	2.12	2.16
US 5-Year	1.68	1.45	1.48	1.57	1.64	1.69	1.74	1.82	1.89	1.93
US 2-Year	1.66	1.52	1.52	1.54	1.57	1.60	1.64	1.72	1.78	1.82
US 3-Month Libor	1.93	1.83	1.76	1.70	1.70	1.72	1.73	1.75	1.83	1.86
Fed Funds Rate - Upper Bound	2.00	1.75	1.60	1.55	1.50	1.50	1.55	1.60	1.60	1.65
Fed Funds Rate - Lower Bound	1.75	1.51	1.36	1.28	1.27	1.26	1.30	1.33	1.35	1.38
2 Year - 10 Year Spread	0.19	0.09	0.16	0.23	0.26	0.26	0.31	0.33	0.34	0.35





Fixed Income Return Expectations

1 Year Core Fixed Income Return Simulation (Parallel Shift) as of 9/30/19



Source: BondEdge[®]

- Expectations are for rates to rise modestly in 2020
- The TIPS markets shows no material inflation concerns in the near term
- Return expectations over the next five years have fallen to 2% - 4% on the decline in rates



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