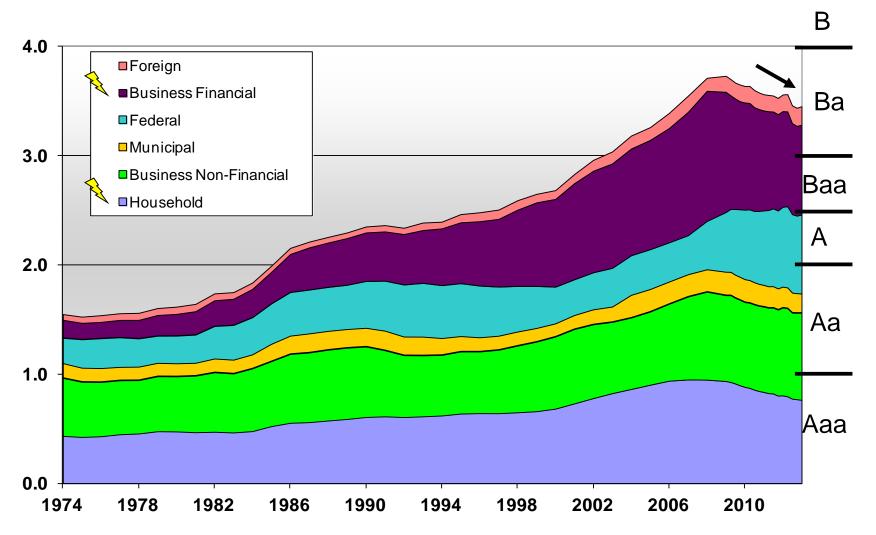
MBS Market Update: Reconsidering the Fed

Walt Schmidt, CFA March, 2014

Four Main Themes (While We Wait for Future)

- The Fed has BEGUN to unwind extraordinary assistance.
- Certainty about Fed tapering has REDUCED VOLATILITY.
- Curve in 2014 will likely remain STEEP, but next BIG MOVE is for a FLATTER CURVE.
- CONVEXITY and ROLLDOWN now, wider windows for 2015 and beyond.

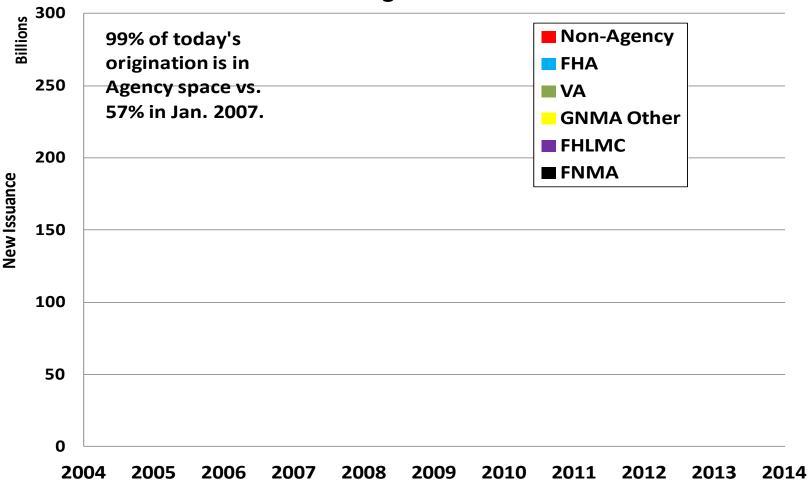
It Takes More Than a 1/2 Decade to Work off this Debt Debt to GDP in the U.S. Economy (Through Q4 for 2013)



Source: Bloomberg, Federal Reserve, US Treasury Dept.

And Over 99% of New Issue Flows

Securitized Mortgage Market Origination

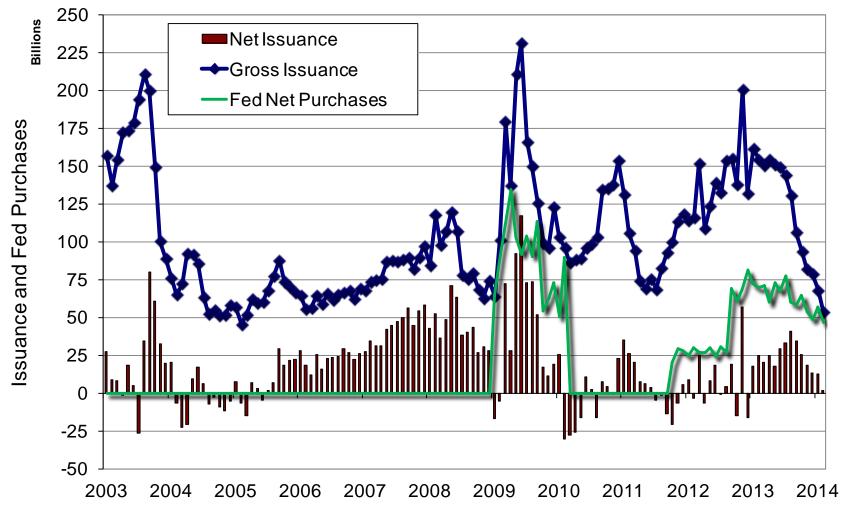


Source: Bloomberg, Federal Reserve, US Treasury Dept.

Supply Starting to Retreat with Purchases

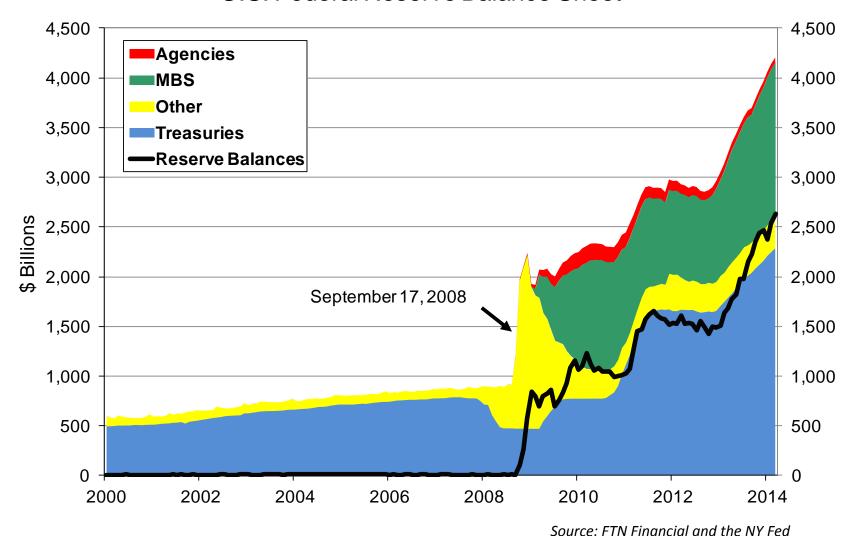
Agency Fixed Rate Securitized Issuance

Gross Issuance (Lines) Net Issuance (Bars)



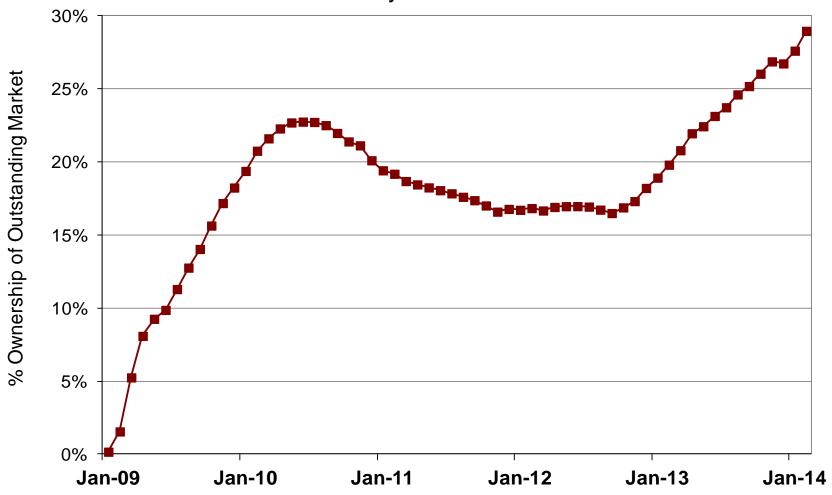
Fed's Balance Sheet Continues to Grow Outright...

U.S. Federal Reserve Balance Sheet



...And As a Percentage of Overall MBS Market

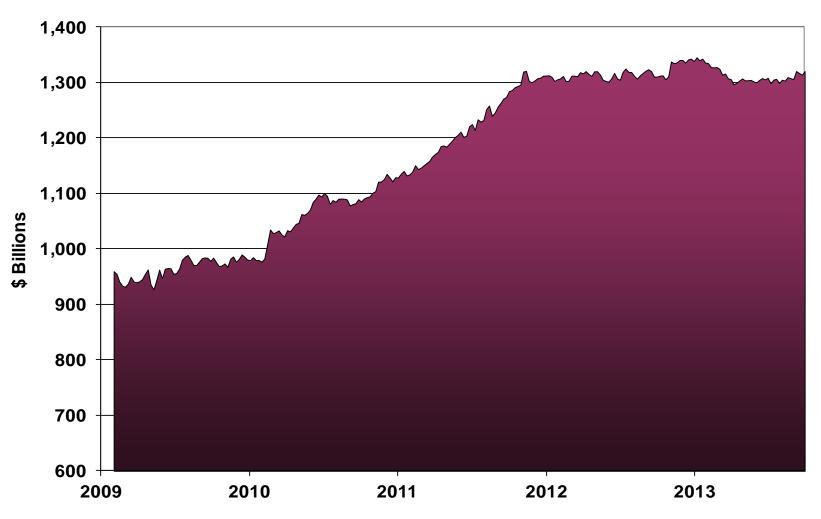
Fed Ownership of Outstanding Fixed MBS Market January 2009 - Current



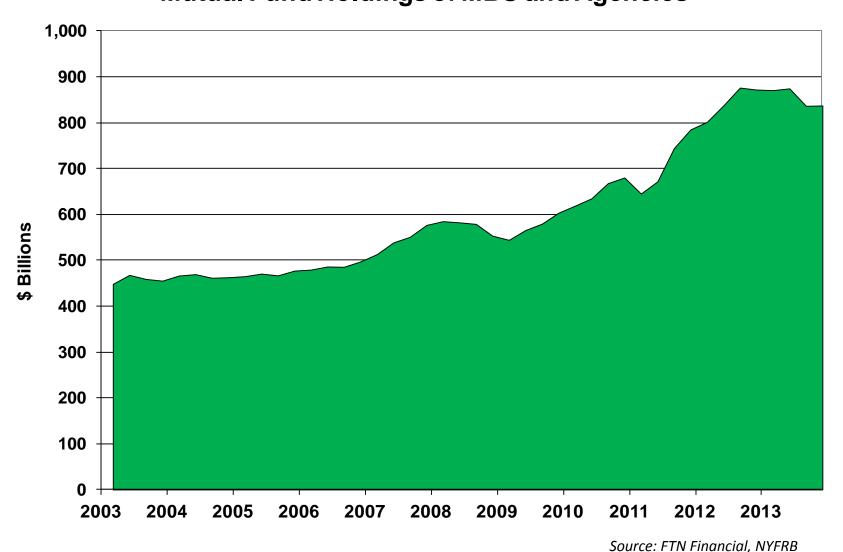
Source: FTN Financial, NY Fed and KDS Global

Bank Holdings Have Flat-Lined Since 2012

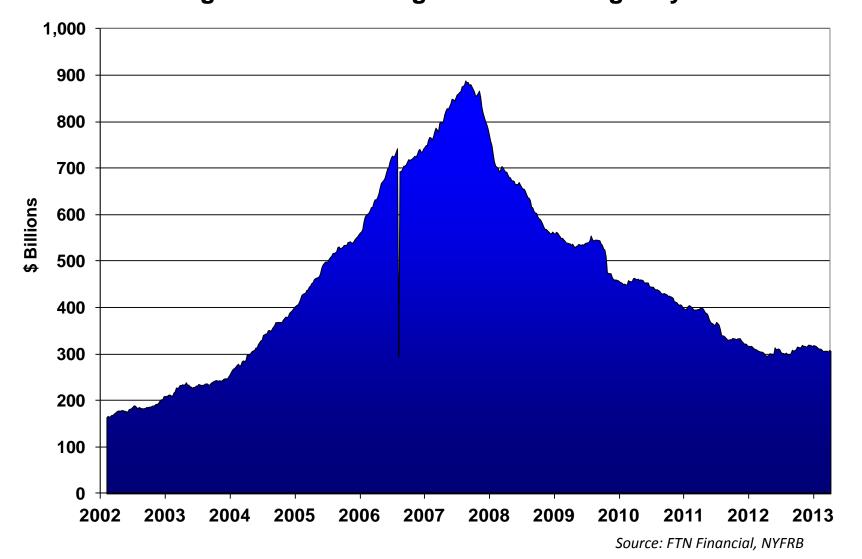
U.S. Commercial Bank Agency MBS Holdings



Money Managers Turned Cautious in 2013 Mutual Fund Holdings of MBS and Agencies



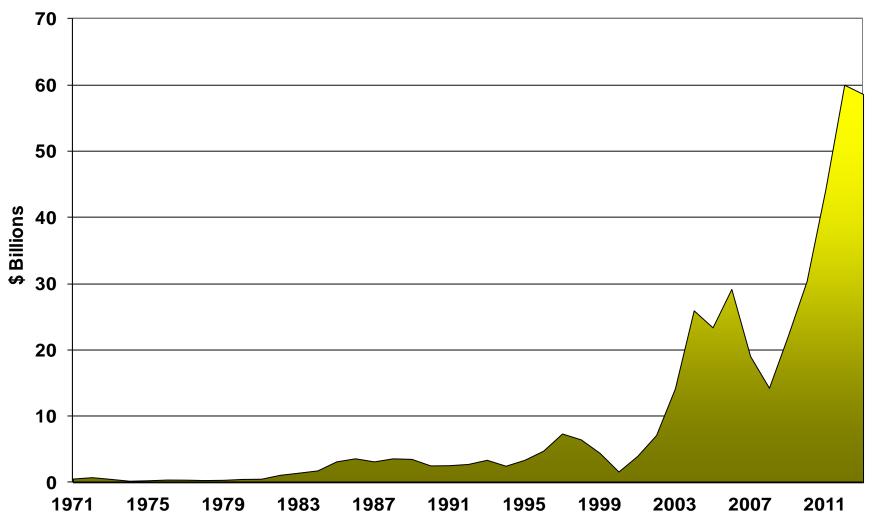
Foreign Holdings Have Flat-Lined, As Well Foreign Official Holdings of MBS and Agency Securities





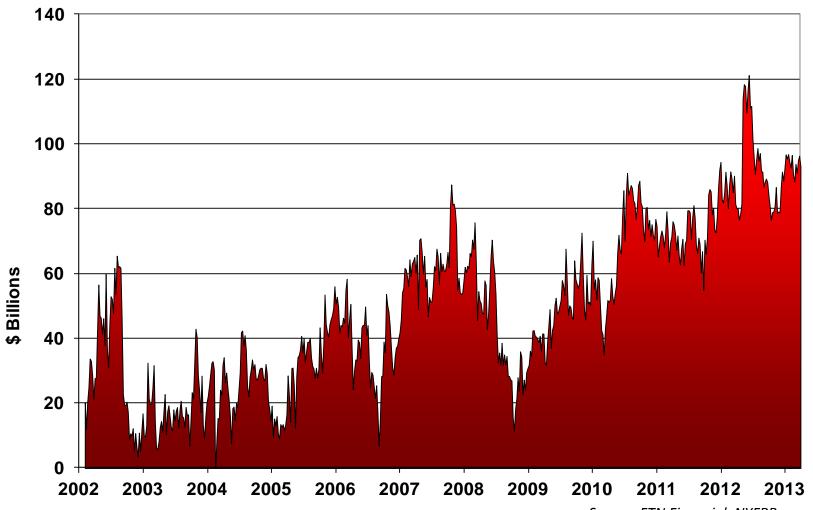
Growth in REITs Looks To Be Over

Mortgage REIT Market Capitalization



Dealers Are Very Involved Currently - Steep Curve

Dealer Holdings of MBS Securities



Source: FTN Financial, NYFRB

MBS Spreads Now "Fair"?

FNCL MBS Static Spreads

30yr Current Coupon vs 5/10 UST Blend 15yr Curent Coupon vs 2/5 UST Blend

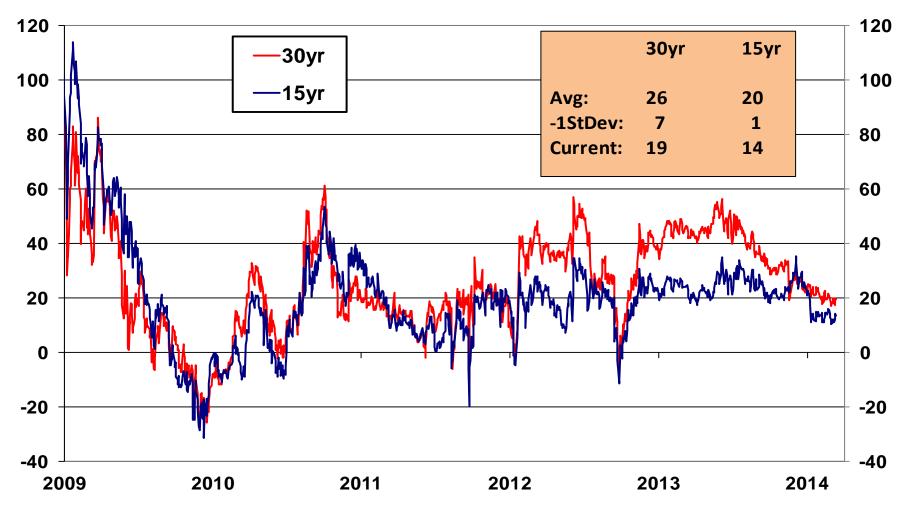


Source: FTN Financial and Bloomberg

LOAS Levels Very Close to QE Averages

MBS LOAS Since 2009

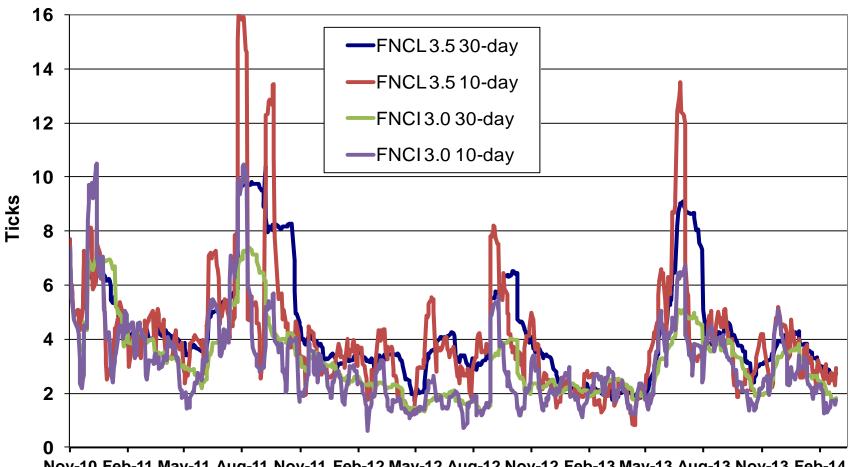
FNCL30yrand15yrLOAS



Vol Has Plummeted In Light of Fed Clarity

Standard Deviation of MBS Performance

FNCL 3.5 and FNCI 3.0 vs 2/5/10 UST Curve

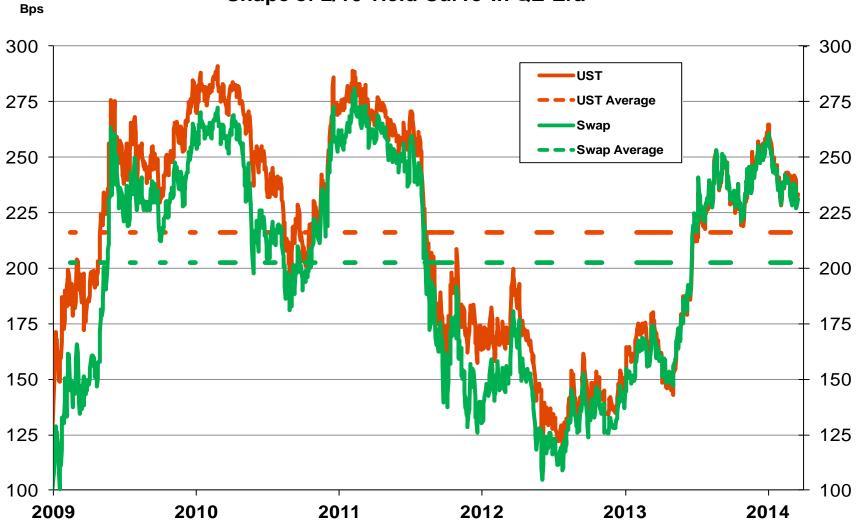


Nov-10 Feb-11 May-11 Aug-11 Nov-11 Feb-12 May-12 Aug-12 Nov-12 Feb-13 May-13 Aug-13 Nov-13 Feb-14

Source: FTN Financial and TradeWeb

Curve Still VERY Steep

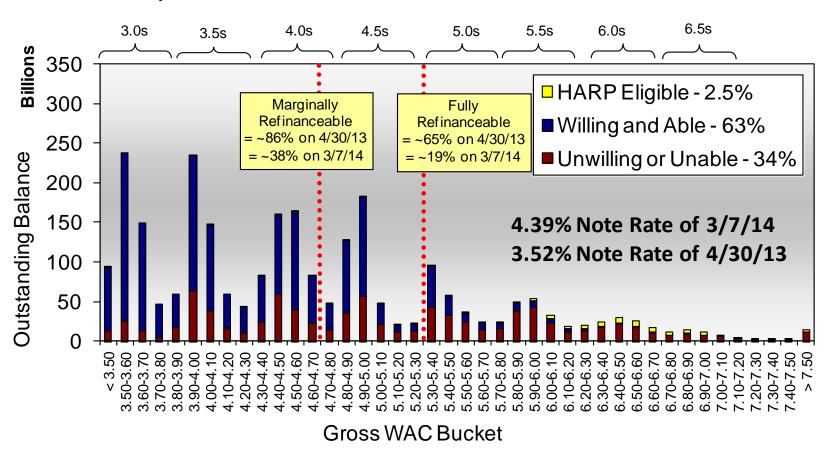
Shape of 2/10 Yield Curve In QE Era



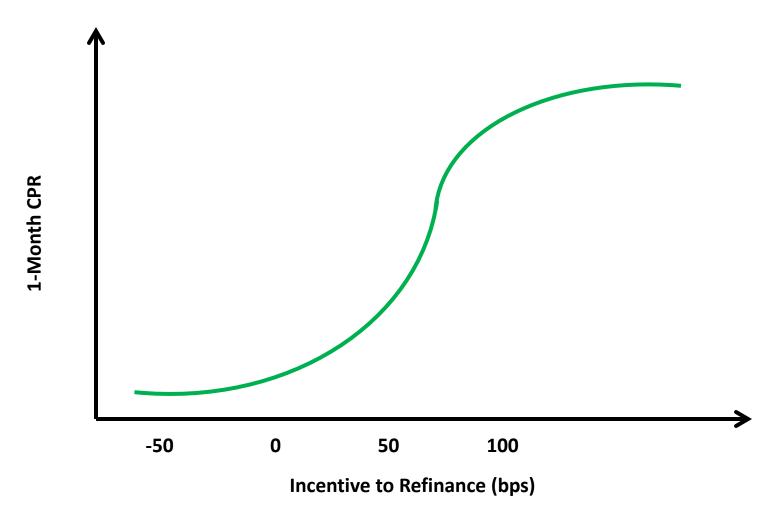
Source: FTN Financial and Bloomberg

"Money-Ness" Of the MBS Market Has Changed

30yr Conventional Fixed Thresholds: 80 LTV, 720 FICO, and 150k LB



The "S" Curve: Essential View of Prepayments



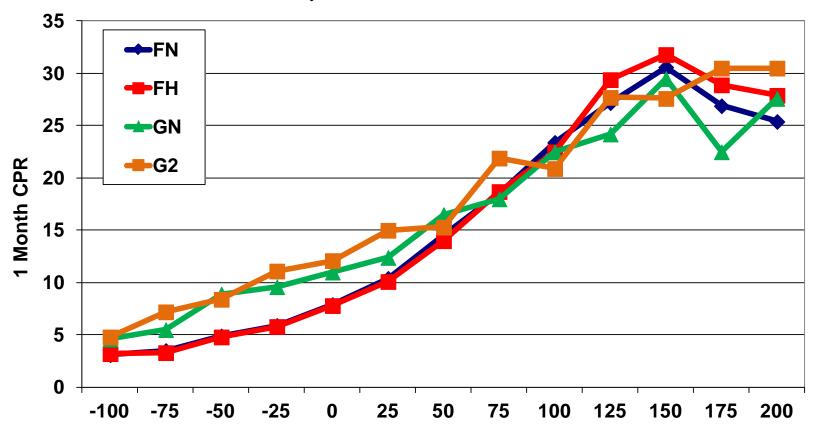
Source: FTN Financial

18

Baseline S-Curves for 30vr Fixed Product

S-Curve Analysis | Last 12 Months

30yr Fixed MBS, 12-48 WALA

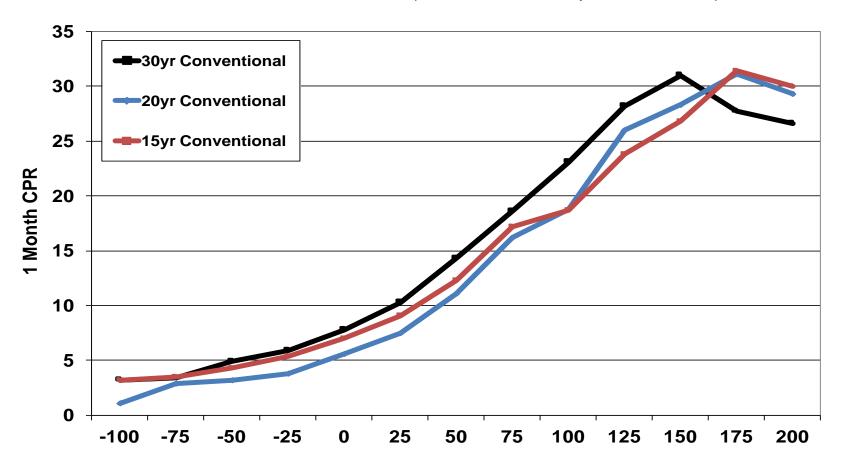


Refinancing Incentive (WAC less Current Rate)

Baseline S-Curves for Conventional by Am Schedule

S-Curve Analysis | Last 12 Months

Conventional Fixed MBS (12-48 WALA Except "New WALA")

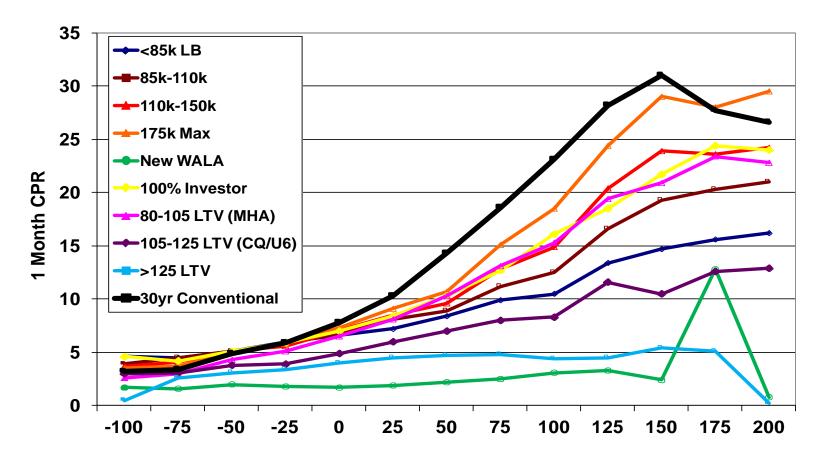


Refinancing Incentive (WAC less Current Rate)

The Flatter the S-Curve, the Better the Convexity

S-Curve Analysis | Last 12 Months

30yr Conventional Fixed MBS (12-48 WALA Except "New WALA")

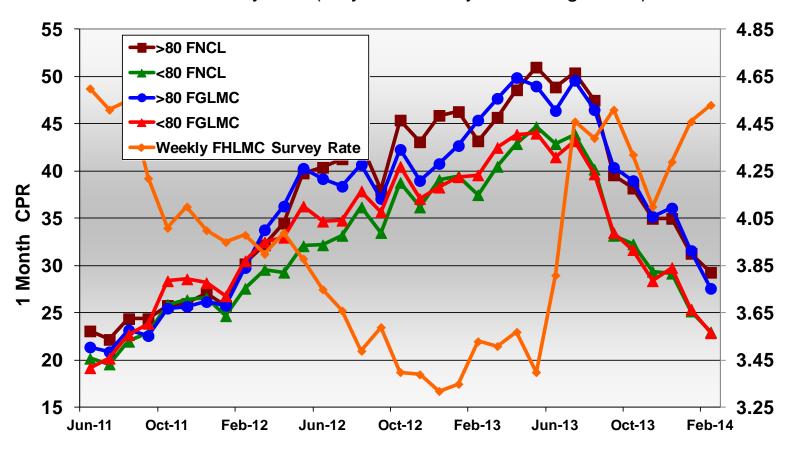


Refinancing Incentive (WAC less Current Rate)



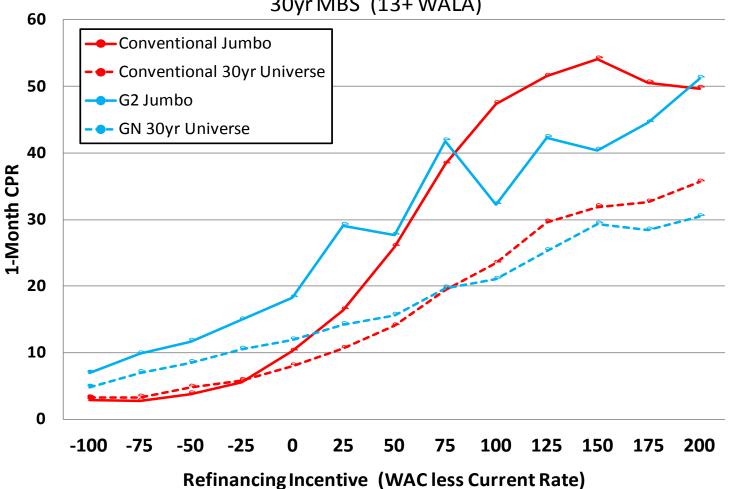
HARP-Eligible Still Faster Despite Slowdown

All Conventional 5.0s thru 6.5s 1mo CPR by LTV (May 2005 - May 2009 Origination)



Conforming Jumbo Negatively Convex

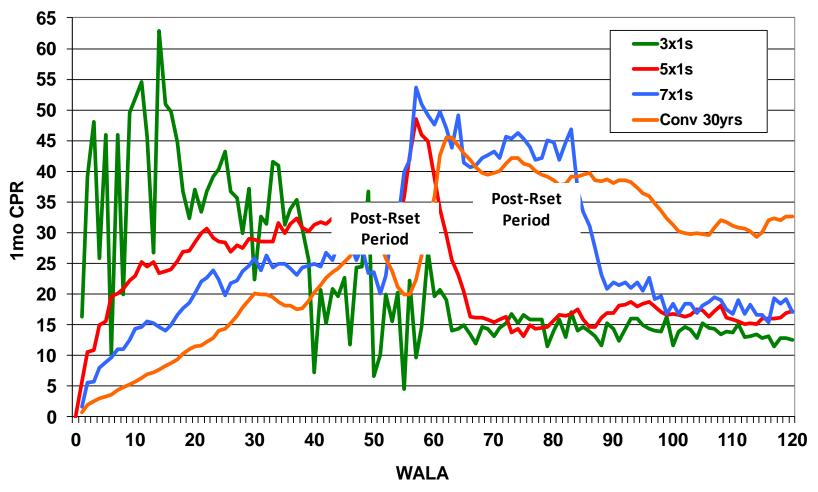
S-Curve Analysis | Last 12 Months 30yr MBS (13+ WALA)



Post-Reset Hybrid ARMs Very Slow

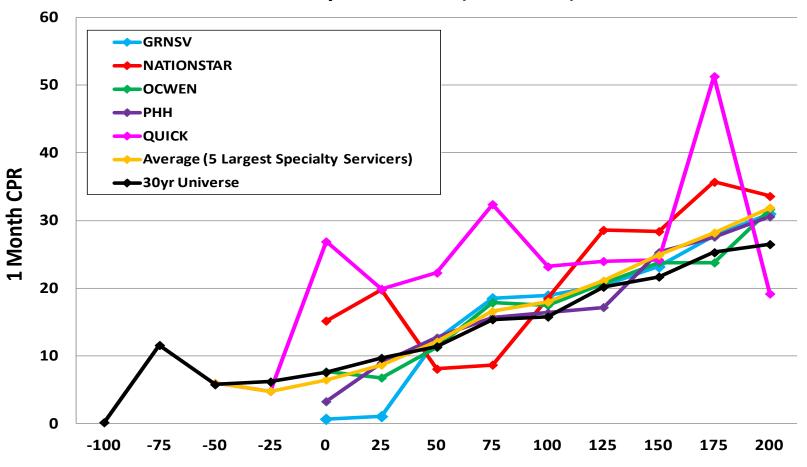
Aging Curve Analysis | Last 12 Months

Conventional Hybrid ARMs and 30yrs



Specialty Servicers Volatile for <2010 Vintage

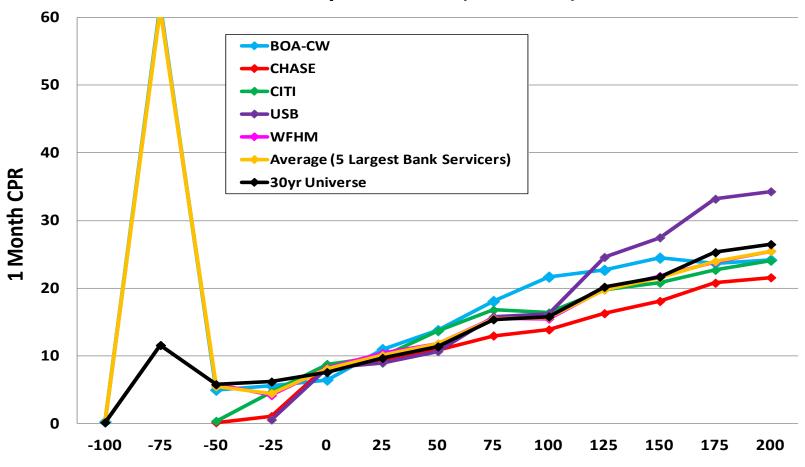
S-Curve Analysis | Last 3 Months 30yr Fixed MBS (49+ WALA)



Refinancing Incentive (WAC less Current Rate)

Bank Servicers More Consistent

S-Curve Analysis | Last 3 Months 30yr Fixed MBS (49+ WALA)



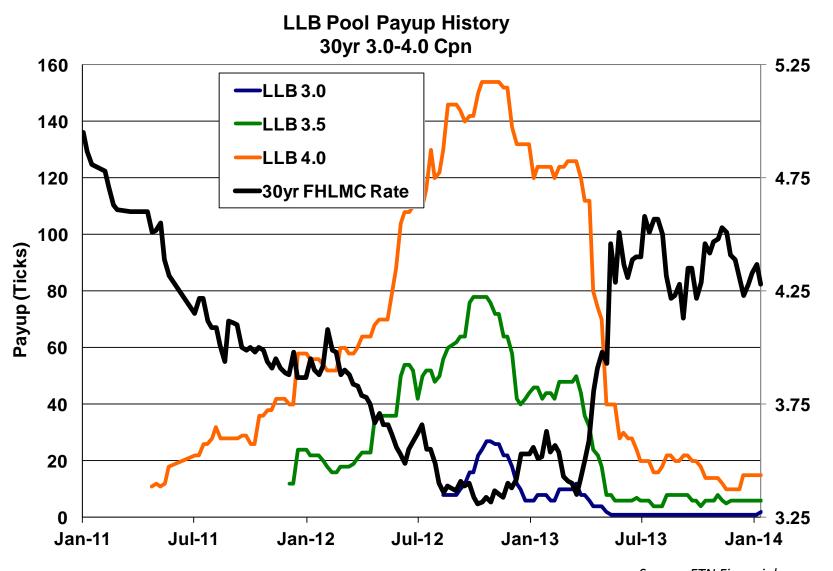
Refinancing Incentive (WAC less Current Rate)

Low FICO and LLB Provide Best Turnover

	Incentive Less	Than -50bps	Incentive -50	Incentive -50bps to 0bps					
FICO	5/99-5/01	5/04-12/08	5/99-5/01	5/04-12/08					
0-680	9.17	10.39	10.75	13.98					
681-720	7.23	9.96	9.72	12.09					
721-760	6.50	7.94	9.55	10.51					
760+	8.17	6.89	10.65	9.24					
	Incentive Less	Than -50bps	Incentive -50	Incentive -50bps to 0bps					
<u>CLTV</u>	5/99-5/01	5/04-12/08	5/99-5/01	5/04-12/08					
0-60	7.86	8.43	10.43	11.88					
61-80	7.02	7.60	9.58	9.52					
81-105	6.85	7.39	8.22	8.03					
105+	n/a	0.52	n/a	2.98					
	Incentive Less	Than -50bps	Incentive -50	Incentive -50bps to 0bps					
<u>LNSZ</u>	5/99-5/01	5/04-12/08	5/99-5/01	5/04-12/08					
0-85	8.27	9.90	10.83	10.94					
86-110	8.74	9.55	10.23	11.06					
111-150	6.89	9.37	9.51	11.45					
150+	5.97	7.98	9.34	10.92					



Payups Have Collapsed - Convexity is Cheap



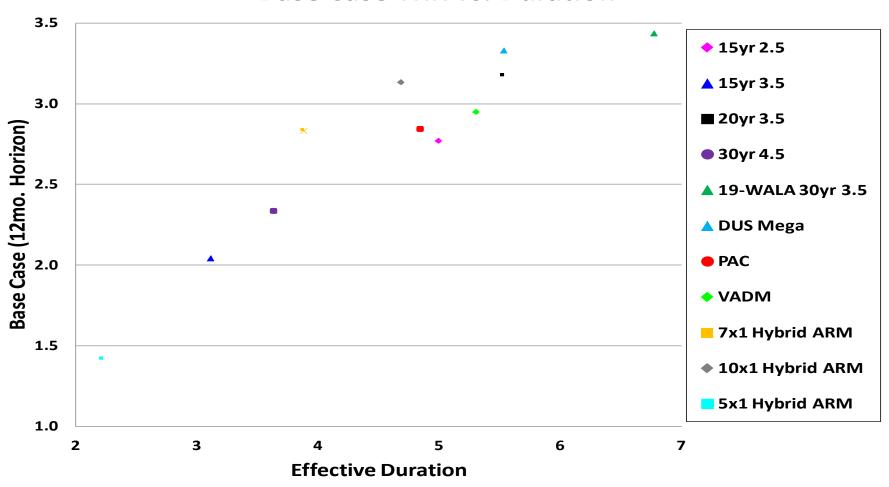
Main Relative Value Choices in Mortgage Space

						Libor	Opt	Libor	Eff	Eff
Security	Description	Coupon	Price	YTM	WAL	Z-sprd	Cost	OAS	Dura	Convx
FN AV9481	5x1 Hybrid ARM	2.07	103.81	1.01	4.73	32.5	22.9	9.5	2.22	-0.84
FN AL1121	15yr 3.5	3.50	105.28	1.94	3.73	19.3	11.8	7.5	3.11	-1.17
FN 932669	30yr 4.5, Low TPO	4.50	106.97	2.49	3.96	60.6	42.0	18.6	3.63	-2.72
FH 2B2236	New Issue 7x1	3.10	104.00	1.98	5.31	44.2	22.8	21.4	3.88	-1.38
FH 849257	New Issue 10x1	3.42	104.13	2.43	6.55	41.9	22.9	19.0	4.68	-2.17
FHR 4029 MC	5yr PAC, 175k Max 4.0% Collat	2.00	96.98	2.66	4.98	45.4	19.7	25.7	4.84	-0.17
FN MA1528	15yr 2.5	2.50	100.50	2.37	5.29	17.7	6.8	10.9	4.99	0.12
FHR 4301 UV	5yr SEQ, High LTV 4.0% Collat	3.50	105.86	2.41	5.95	15.7	1.2	14.5	5.30	0.40
FN MA1829	20yr 3.5	3.50	103.38	2.83	5.97	37.4	21.7	15.7	5.53	-1.11
FN AL4762	Multi Family	3.32	106.89	2.14	6.13			0.7	5.53	0.35
FN AB6086	Slightly Seasoned 3.5 30yr, 19 WALA	3.50	101.25	3.30	8.37	48.0	23.0	25.0	6.77	-0.61

Source: FTN Financial

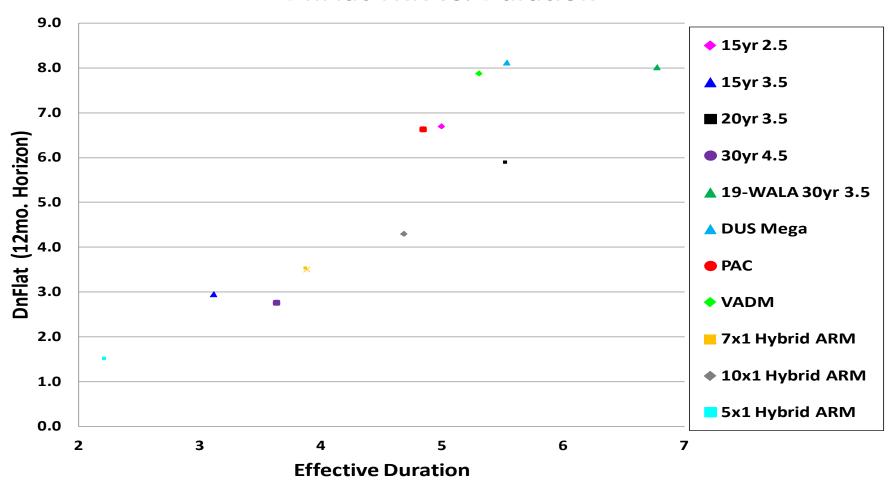
Hybrid ARMs, ACMBS and 20yr Roll Down Well

Base Case TRR vs. Duration



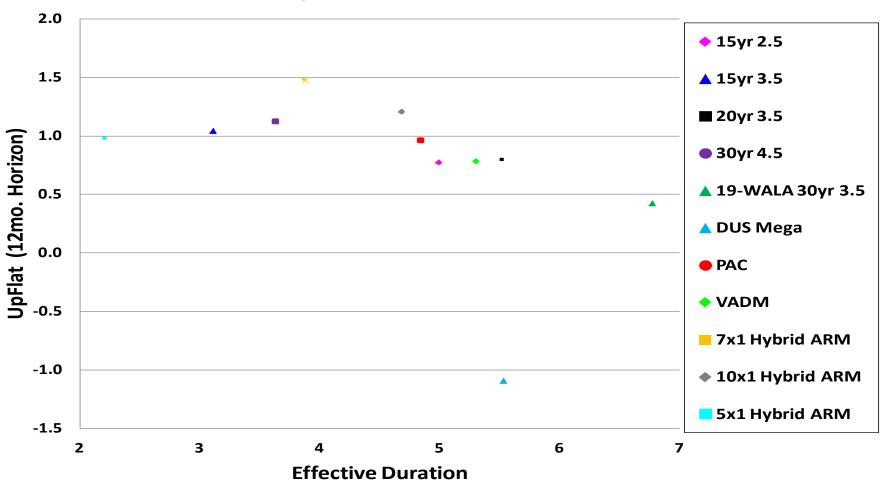
Need Convexity to Perform Well in a Rally

DnFlat TRR vs. Duration



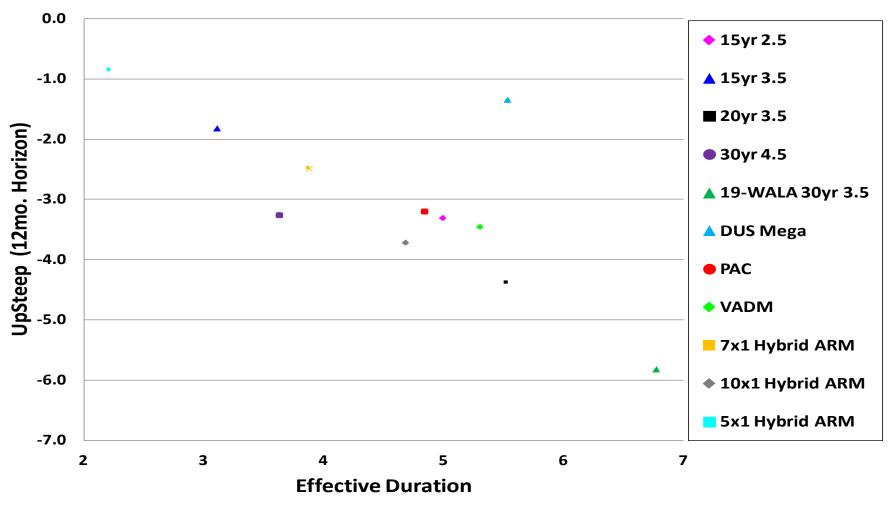
Wider Windows for Bear Flattener

UpFlat TRR vs. Duration



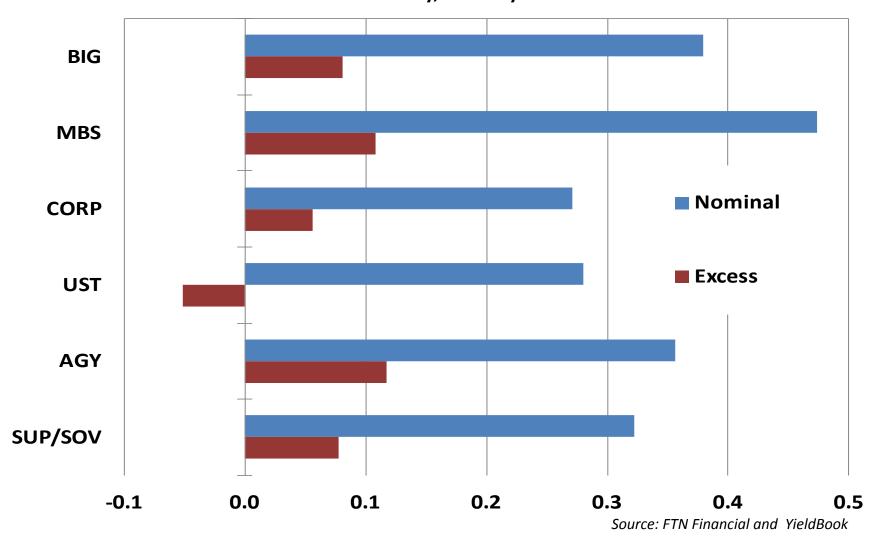
Must Have Tighter Window for Any Steepener

UpSteep TRR vs. Duration



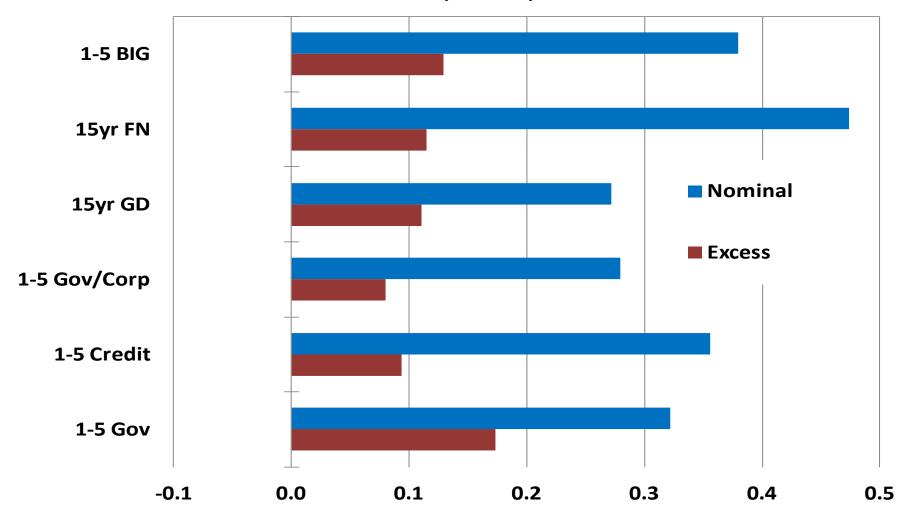
MBS Hold Value Over LONG Periods

Sharpe Ratios - Citigroup BIG and Major Components
10-Year History, Monthly Data



MBS Also Do Well in Short Duration Space

Sharpe Ratios- Short Duration Index Constituents
10-Year History, Monthly Data



Favorite Investment Themes in MBS

- Current & UIC 30yr Spec Pools for BEAR FLATTENER
- 12-WALA 7X1s and New Issue 10X1s
- Agency and 2011-2014 Vintage CMBS
- VADMs and other very well-structured CMOs
- Middle Coupon Coupon 20yr
- Cheap Forms of Call Protection in MBS and CMO
- Post-Reset Hybrid ARM for Short Duration \$

Four Main Themes (While We Wait for Future)

- The Fed has BEGUN to unwind extraordinary assistance.
- Certainty about Fed tapering has REDUCED VOLATILITY.
- Curve in 2014 will likely remain STEEP, but next BIG MOVE is for a FLATTER CURVE.
- CONVEXITY and ROLLDOWN now, wider windows for 2015 and beyond.