IVR Invesco Mortgage Capital Inc.

The Expertise. The Resources. Each step of the way.

2018 First Quarter Earnings Call
May 4, 2018

John Anzalone
Chief Executive Officer

Kevin Collins
President

Lee Phegley
Chief Financial Officer

David Lyle
Chief Operating Officer

Invesco

Cautionary Notice Regarding Forward-Looking Statements

This presentation and comments made in the associated conference call, may include statements and information that constitute "forward-looking statements" within the meaning of the U.S. securities laws as defined in the Private Securities Litigation Reform Act of 1995, and such statements are intended to be covered by the safe harbor provided by the same. Forward-looking statements include our views on the risk positioning of our portfolio, domestic and global market conditions (including the residential and commercial real estate market), the market for our target assets, our financial performance, including our core earnings, economic return, comprehensive income and changes in our book value, our ability to continue performance trends, the stability of portfolio yields, interest rates, credit spreads, prepayment trends, financing sources, cost of funds, our leverage and equity allocation. In addition, words such as "believes," "expects," "anticipates," "intends," "plans," "estimates," "projects," "forecasts," and future or conditional verbs such as "will," "may," "could," "should," and "would" as well as any other statement that necessarily depends on future events, are intended to identify forward-looking statements.

Forward-looking statements are not guarantees, and they involve risks, uncertainties and assumptions. There can be no assurance that actual results will not differ materially from our expectations. We caution investors not to rely unduly on any forward-looking statements and urge you to carefully consider the risks identified under the captions "Risk Factors," "Forward-Looking Statements" and "Management's Discussion and Analysis of Financial Condition and Results of Operations" in our annual report on Form 10-K and quarterly reports on Form 10-Q, which are available on the Securities and Exchange Commission's website at www.sec.gov.

All written or oral forward-looking statements that we make, or that are attributable to us, are expressly qualified by this cautionary notice. We expressly disclaim any obligation to update the information in any public disclosure if any forward-looking statement later turns out to be inaccurate.

Overview

Q1 2018 Financial Summary	
Basic EPS	$0.37
Core EPS (1)	$0.45
Book value per diluted common share (2)	$17.16
Dividend per common share	$0.42
Economic return (3)	(4.2)%

Equity allocation remains diversified

- 44% Agency RMBS
- 36% Commercial Credit
- 20% Residential Credit

- Core EPS of $0.45 for Q1 2018 compared to $0.47 for Q4 2017
  - Core EPS decreased primarily due to higher effective cost of funds
- Book value per diluted common share decreased by $1.19 or 6.5% to $17.16 in Q1 2018
- Q1 2018 portfolio highlights
  - Purchases continue to be concentrated in 30 year fixed-rate Agency RMBS and CMBS
  - Asset seasoning and improved real estate valuations continue to enhance credit quality

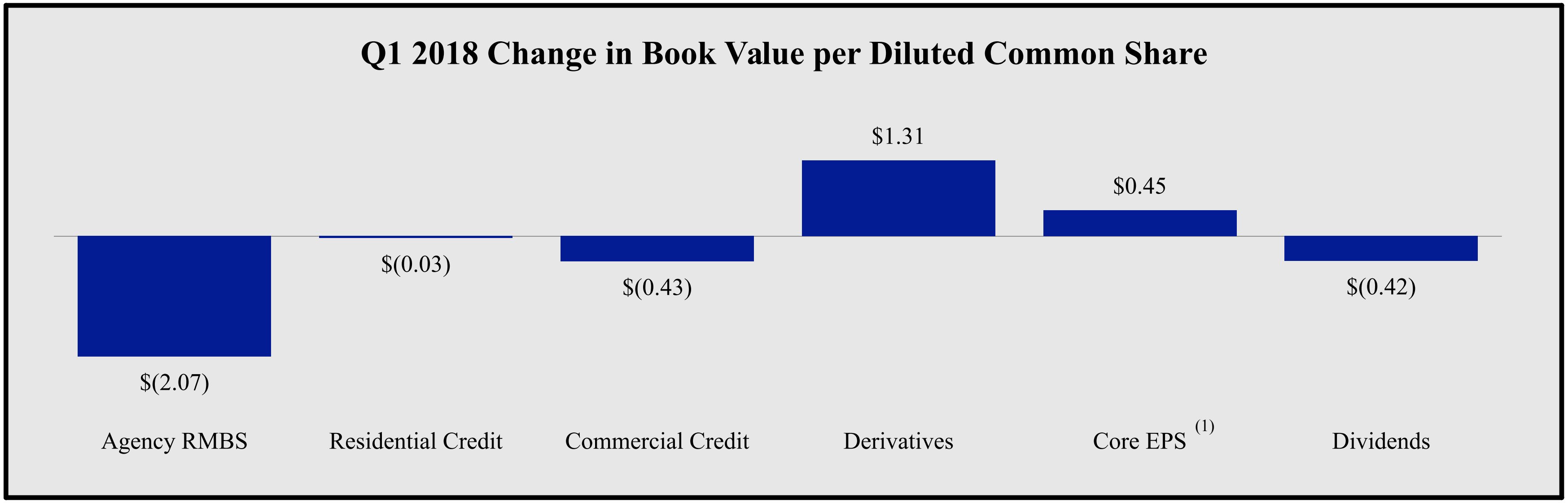
(1) Core EPS is a non-GAAP financial measure. See Slide 13 for non-GAAP reconciliation

(2) Book value per diluted common share is calculated as total equity less the liquidation preference of our Series A Preferred Stock ($140.0 million), Series B Preferred Stock ($155.0 million) and Series C Preferred Stock ($287.5 million); divided by total common shares outstanding plus Operating Partnership Units convertible into shares of common stock (1,425,000 shares)

(3) Economic return for the three months ended March 31, 2018 is defined as the change in book value per diluted common share from December 31, 2017 to March 31, 2018 of ($1.19); plus dividends declared of $0.42 per common share; divided by December 31, 2017 book value per diluted common share of $18.35.

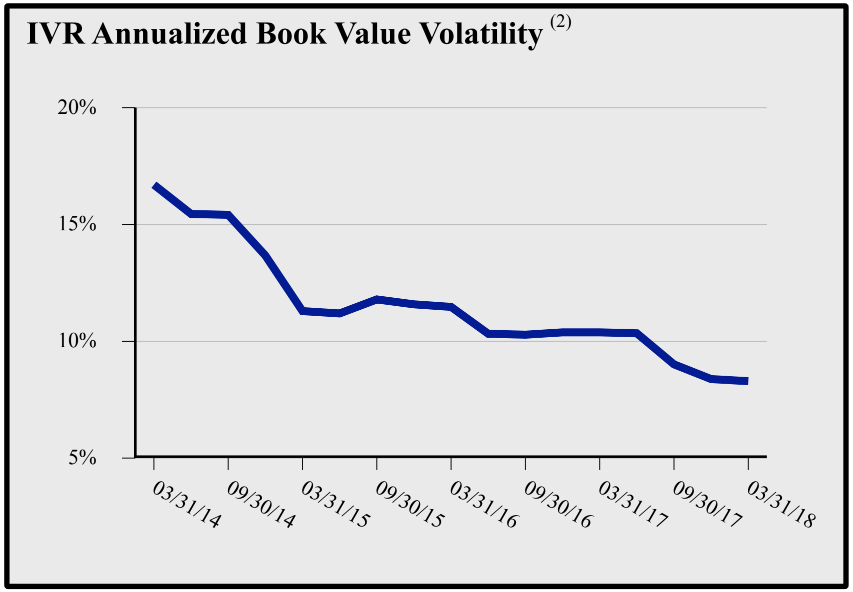
Past performance is not a guarantee of future results.

Book Value Performance



We seek to provide stockholders with attractive income and long term book value stability

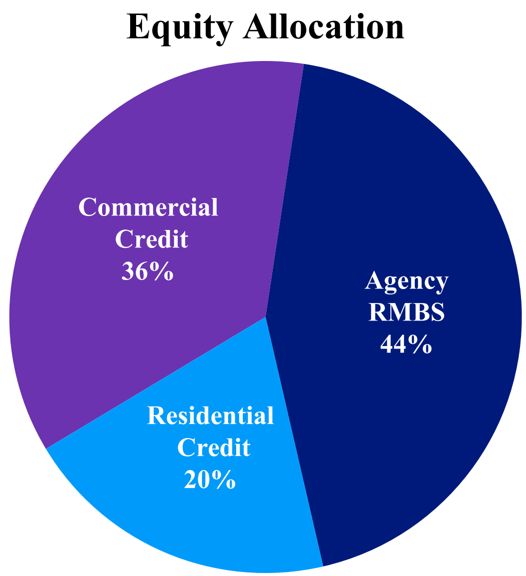
- Q1 2018 book value per diluted common share ("BVPS") decreased to $17.16, down $1.19 or 6.5% from Q4 2017
- Our BVPS declined in Q1 2018 primarily due to rising interest rates driving a decrease in the valuations of our mortgage-backed securities portfolio that exceeded the increase in the valuations of our interest rate hedges

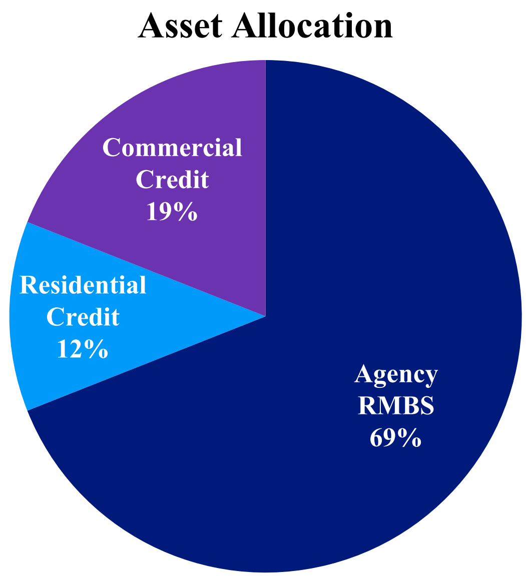


(1) Core EPS is a non-GAAP financial measure. See Slide 13 for non-GAAP reconciliation
(2) Book value volatility is based on the rolling 3 year standard deviation of quarterly book value results

The IVR Portfolio

Q1 2018 Portfolio Update

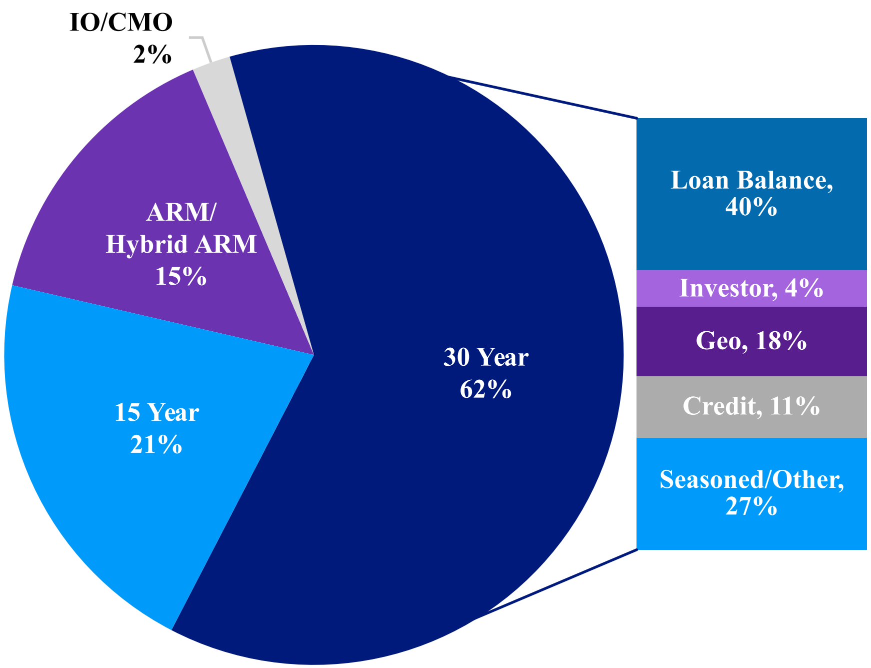




Highlights:

- Continued to purchase 30 year fixed-rate Agency RMBS and CMBS as these sectors offered the most attractive return profiles
- 56% of equity and 31% of assets are allocated to credit
    - Both residential and commercial credit fundamentals remain strong
    - Credit assets exhibit significantly less convexity risk than Agency RMBS

Agency RMBS



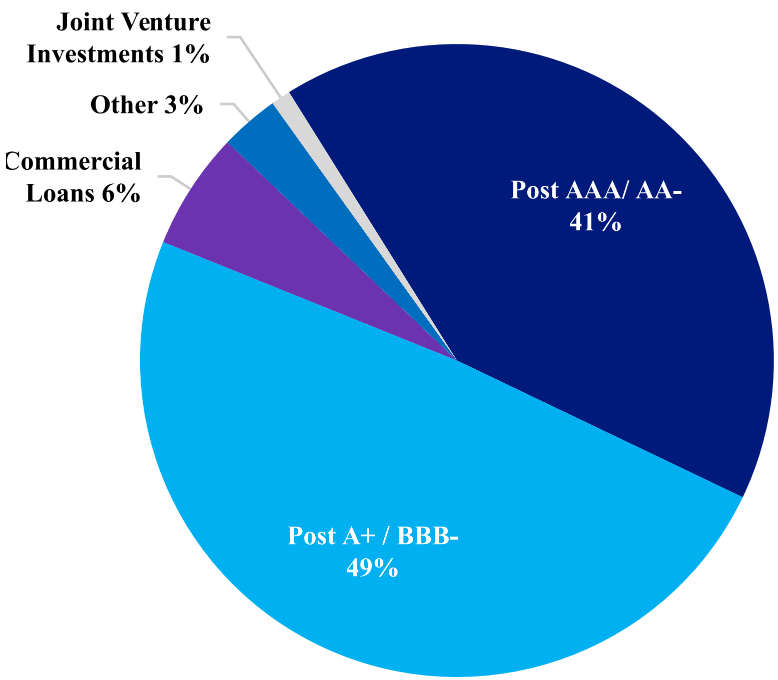
Highlights:

- Added $381.5 million of 30 year specified pools
- Hedged ROE on 30 year fixed rate paper remains attractive at over 15%
- Agency RMBS portfolio yield should benefit from slower refinancing activities as rates rise, tempering the effect of increased seasonal housing activity

	CPR (1)	Net Wtd. Avg Coupon (2)	Period-end Wtd. Avg Yield (3)
15 Year	9.2	3.08%	2.22%
30 Year	7.1	3.70%	3.14%
Hybrid ARM	14.4	2.70%	2.54%

(1) Constant Prepayment Rate
(2) Net weighted average coupon as of March 31, 2018 is presented net of servicing and other fees
(3) Period-end weighted average yield is based on amortized cost as of March 31, 2018 and incorporates future prepayment and loss assumptions

Commercial Credit



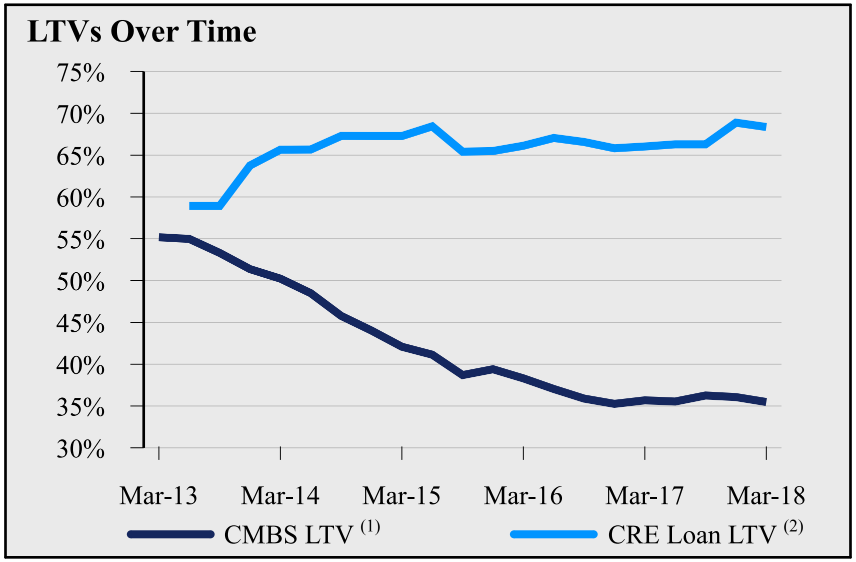
	Duration	Period-end Wtd Avg Yield [(1)]
Post AAA/ AA- [(2)]	4.0	3.95%
Post A+ / BBB- [(3)]	5.6	5.54%
Other [(4)]	7.6	7.57%
Commercial Loans	0.2	8.85%

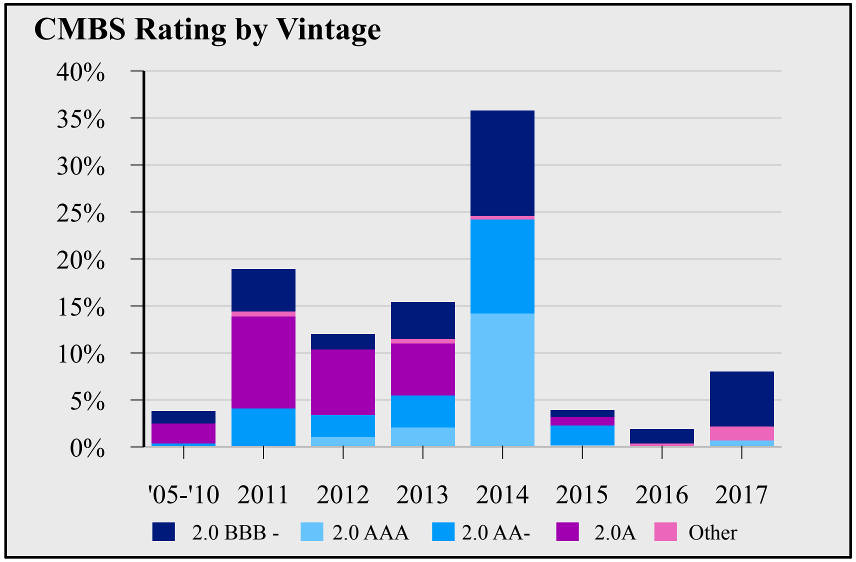
Highlights:

- Favorable trends in property fundamentals provided positive support for commercial mortgage credit investments
- Subordinate CMBS credit spreads performed well despite increased volatility
- Increased portfolio yield by adding $21 million of higher coupon CMBS during the quarter
- Commercial mortgage loan portfolio yields increased along with LIBOR

(1) Period-end weighted average yield is based on amortized cost as of March 31, 2018 and incorporates future prepayment and loss assumptions
(2) CMBS originally rated between AAA and AA- (or an equivalent/comparable ratings by a nationally recognized statistical rating organization) issued after 2009
(3) CMBS originally rated between A+ and BBB- (or an equivalent/comparable rating by a nationally recognized statistical rating organization) issued after 2009
(4) Below investment grade CMBS originally issued after 2009, including bonds issued from risk retention compliant transactions

Improvement in Commercial Mortgage Investment Credit Quality





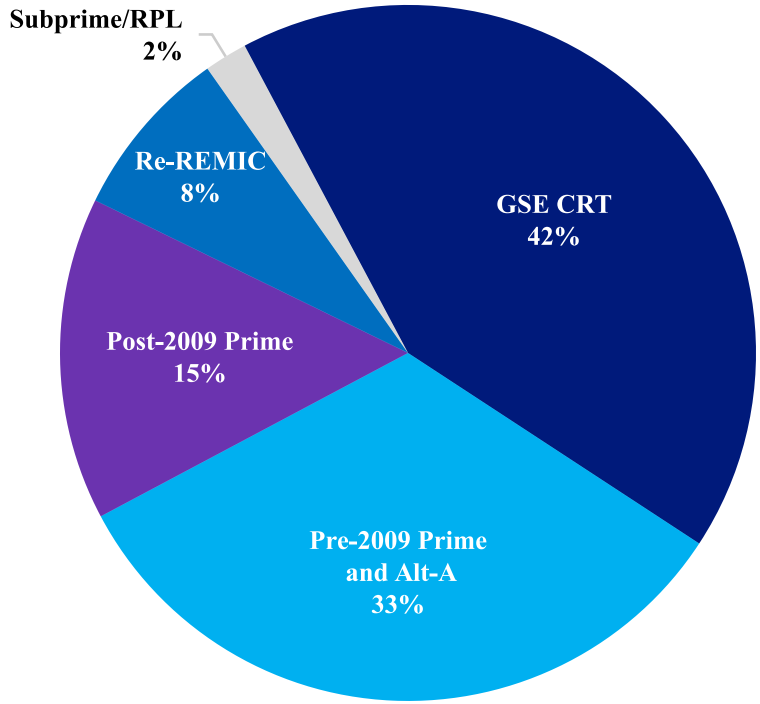
- CMBS LTV [1] of 35% and CRE Loan LTV [2] of 68%
- Approximately 66% of CMBS portfolio is rated single-A or higher
- Improved loan underwriting in risk retention compliant CMBS transactions has created new opportunities to invest
- Quarter-end commercial loan & joint venture portfolio of $212.4 million
- Commercial loan portfolio has zero delinquencies and a weighted average maturity of approximately 1 year

Source: Trepp as of March 31, 2018

(1) The product of (a) the weighted average current loan-to-value ratio of the CMBS collateral pool of which the value of the property is adjusted for price appreciation using Moody's/RCA CPPI, multiplied by (b) a fraction, the numerator of which is the total principal balance of the subject class and all other classes senior to such class (if any) less the aggregate balance of underlying defeased loans and the denominator of which is the total principal balance of all classes of the transaction less the aggregate balance of underlying defeased loans. Values are as of March 31, 2018

(2) The weighted average loan-to-value ratio for each commercial real estate loan investment with property values adjusted to reflect the most recently obtained appraisals

Residential Credit



	Duration	Period-end Wtd Avg Yield (1)
Re-REMIC	1.2	6.89%
Pre-2009 Prime and Alt-A	1.7	9.25%
Subprime/Reperforming	0.1	1.57%
Post-2009 Prime	3.3	4.25%
GSE CRT (2)	0.0	6.12%

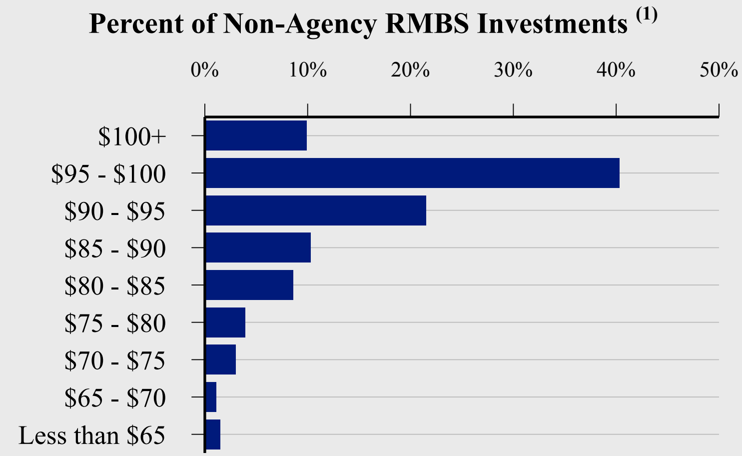
Highlights:

- Economic strength and healthy consumer sentiment are mitigating the impact of higher interest rates, benefiting home values and borrower performance
- The limited duration of our residential credit investments contributed to relatively stable valuations during the quarter despite the increase in interest rates
- Compelling fundamentals and sector paydowns in excess of primary market issuance also supported valuations
- We did not purchase any residential credit securities during the quarter as the relative value environment continued to favor Agency RMBS and CMBS

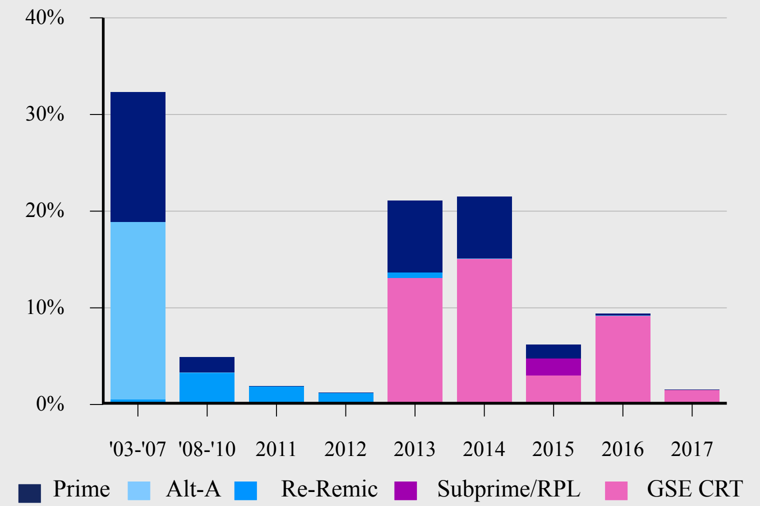
(1) Period-end weighted average yield is based on amortized cost as of March 31, 2018 and incorporates future prepayment and loss assumptions
(2) GSE CRT period-end weighted average yield includes embedded coupon interest recorded as realized and unrealized credit derivative income under U.S. GAAP. Excluding embedded coupon interest recorded as realized and unrealized credit derivative income, our period-end weighted average yield for GSE CRT was 2.61%

Residential Credit Investment Quality

Concentration in High Dollar Price Securities



Non-Agency RMBS and GSE CRT Type by Vintage

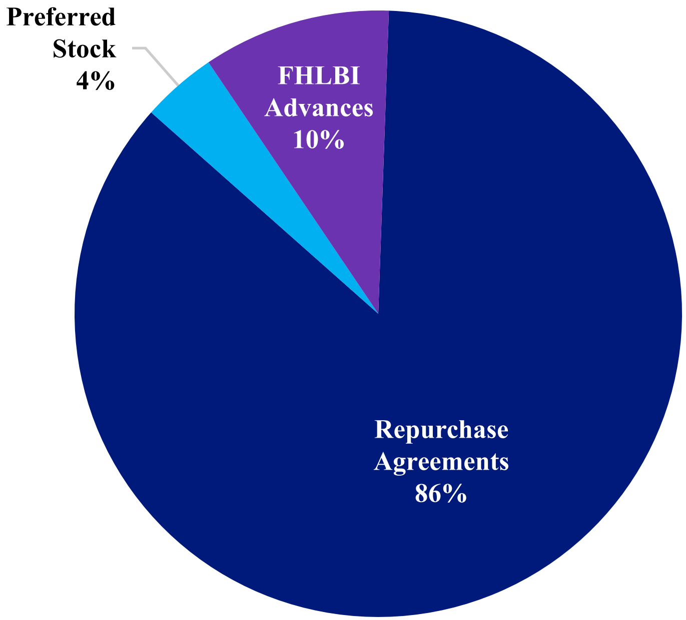


- 72% of Non-Agency RMBS holdings have dollar prices above $90, and 91% above $80
- These high dollar prices generally reflect lower exposure to collateral performance issues, demonstrate less price volatility and are more attractive to finance
- Low dollar price bonds demonstrate greater price volatility, are often unattractive to finance, and are sensitive to changes in servicer advancing and property disposition strategies

- Legacy Non-Agency RMBS investments are focused in securities backed by Prime and Alt-A loans as well as Re-REMICs
- GSE CRT holdings are concentrated in early vintages
  - Reference loans have significant embedded home price appreciation
  - Rating agencies have been active in upgrading seasoned securities

(1) Excludes GSE CRT and interest-only securities. As of March 31, 2018

Financing



- 26 active repurchase agreement counterparties
- Average cost of funds increased during the quarter as repurchase agreement and FHLBI rates moved higher with LIBOR
- Remaining balance of exchangeable senior notes retired in March 2018

Average Cost of Funds [1]	Q1 2018	Q4 2017
Agency RMBS [2]	1.65%	1.40%
CMBS [2]	2.28%	2.00%
Non-Agency RMBS	2.91%	2.74%
GSE CRT	2.87%	2.71%

(1) Average cost of funds is calculated by dividing annualized interest expense excluding amortization of net deferred gain (loss) on de-designated interest rate swaps by average borrowings
(2) Agency RMBS and CMBS average borrowing and cost of funds include borrowings under repurchase agreements and FHLBI advances

Appendix — Non-GAAP Financial Information

We calculate core earnings as U.S. GAAP net income (loss) attributable to common stockholders adjusted for (gain) loss on investments, net; realized (gain) loss on derivative instruments, net; unrealized (gain) loss on derivative instruments, net; realized and unrealized (gain) loss on GSE CRT embedded derivatives, net; (gain) loss on foreign currency transactions, net; amortization of net deferred (gain) loss on de-designated interest rate swaps; net loss on extinguishment of debt; and cumulative adjustments attributable to non-controlling interest. We may add additional reconciling items to our core earnings calculation in the future if appropriate.

We believe the presentation of core earnings provides a consistent measure of operating performance by excluding the impact of gains and losses described above from operating results. We exclude the impact of gains and losses because gains and losses are not accounted for consistently under U.S. GAAP. Under U.S. GAAP, certain gains and losses are reflected in net income whereas other gains and losses are reflected in other comprehensive income. For example, the majority of our mortgage-backed securities are classified as available-for-sale securities, and we record changes in the valuation of these securities in other comprehensive income on our condensed consolidated balance sheet. We elected the fair value option for our mortgage-backed securities purchased on or after September 1, 2016, and changes in the valuation of these securities are recorded in other income (loss) in our condensed consolidated statement of operations. In addition, certain gains and losses represent one-time events.

We believe that providing transparency into core earnings enables our investors to consistently measure, evaluate and compare our operating performance to that of our peers over multiple reporting periods. However, we caution that core earnings should not be considered as an alternative to net income (determined in accordance with U.S. GAAP), or as an indication of our cash flow from operating activities (determined in accordance with U.S. GAAP), a measure of our liquidity, or as an indication of amounts available to fund our cash needs, including our ability to make cash distributions. Please refer to pages 8-10 in the Q1 2018 earnings press release for a description of the adjustments.

	Three Months Ended		
$ in thousands, except per share data	March 31, 2018	December 31, 2017	March 31, 2017
Net income attributable to common stockholders	41,471	137,436	87,130
Adjustments:			
(Gain) loss on investments, net	160,370	17,153	1,853
Realized (gain) loss on derivative instruments, net	(113,578)	(73,646)	(14,918)
Unrealized (gain) loss on derivative instruments, net	(31,901)	(7,368)	(13,438)
Realized and unrealized (gain) loss on GSE CRT embedded derivatives, net	2,468	(7,401)	(14,148)
(Gain) loss on foreign currency transactions, net	(1,814)	(387)	(513)
Amortization of net deferred (gain) loss on de-designated interest rate swaps	(6,539)	(6,438)	(6,298)
Net loss on extinguishment of debt	26	233	4,711
Subtotal	9,032	(77,854)	(42,751)
Cumulative adjustments attributable to non-controlling interest	(114)	981	539
Series B preferred stock dividend adjustment	—	(2,870)	—
Series C preferred stock dividend adjustment	—	(5,211)	—
Core earnings attributable to common stockholders	50,389	52,482	44,918
Basic income (loss) per common share	0.37	1.23	0.78
Core earnings per share attributable to common stockholders	0.45	0.47	0.40