

# Economic and Real Estate Outlook

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Chief Economist, National Association of REALTORS®

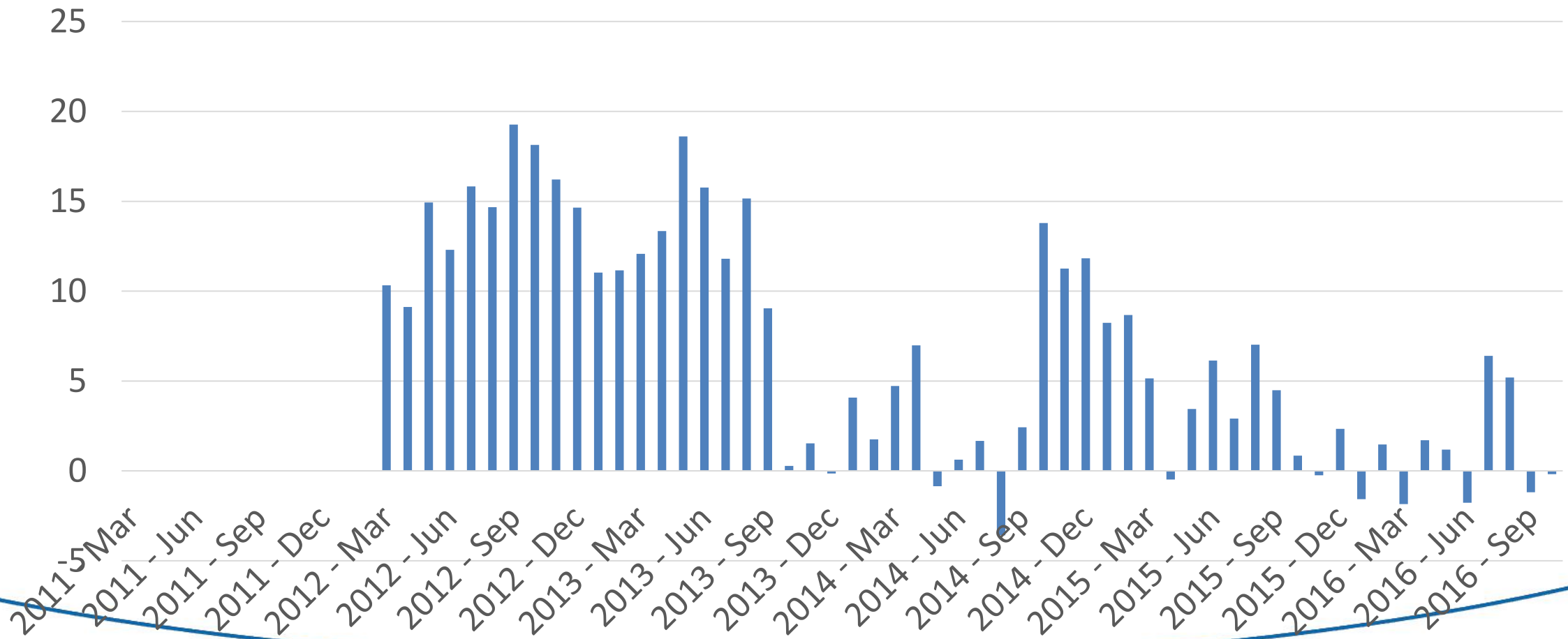
Presentation at NAR Real Estate Service Group

Chicago, IL

October 24, 2016

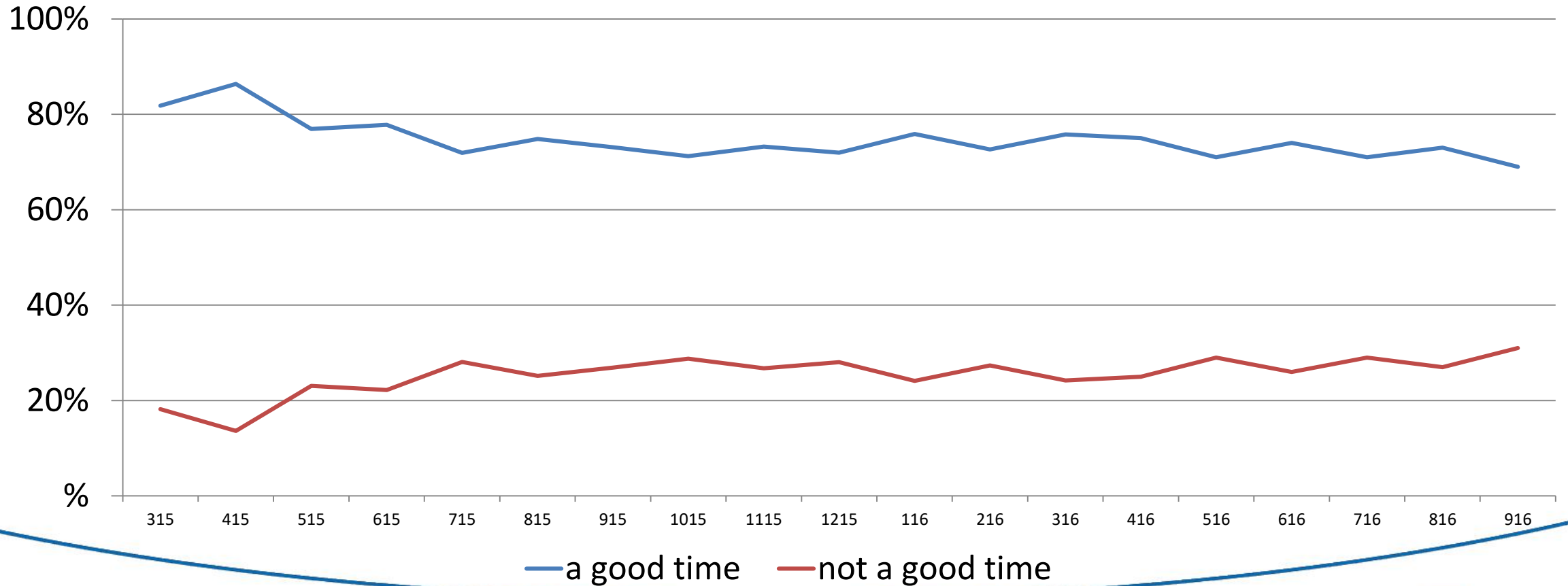
# Housing Market Leading/Turning Indicators

# Fannie Mae Homebuyer Sentiment Index (% change from a year ago)



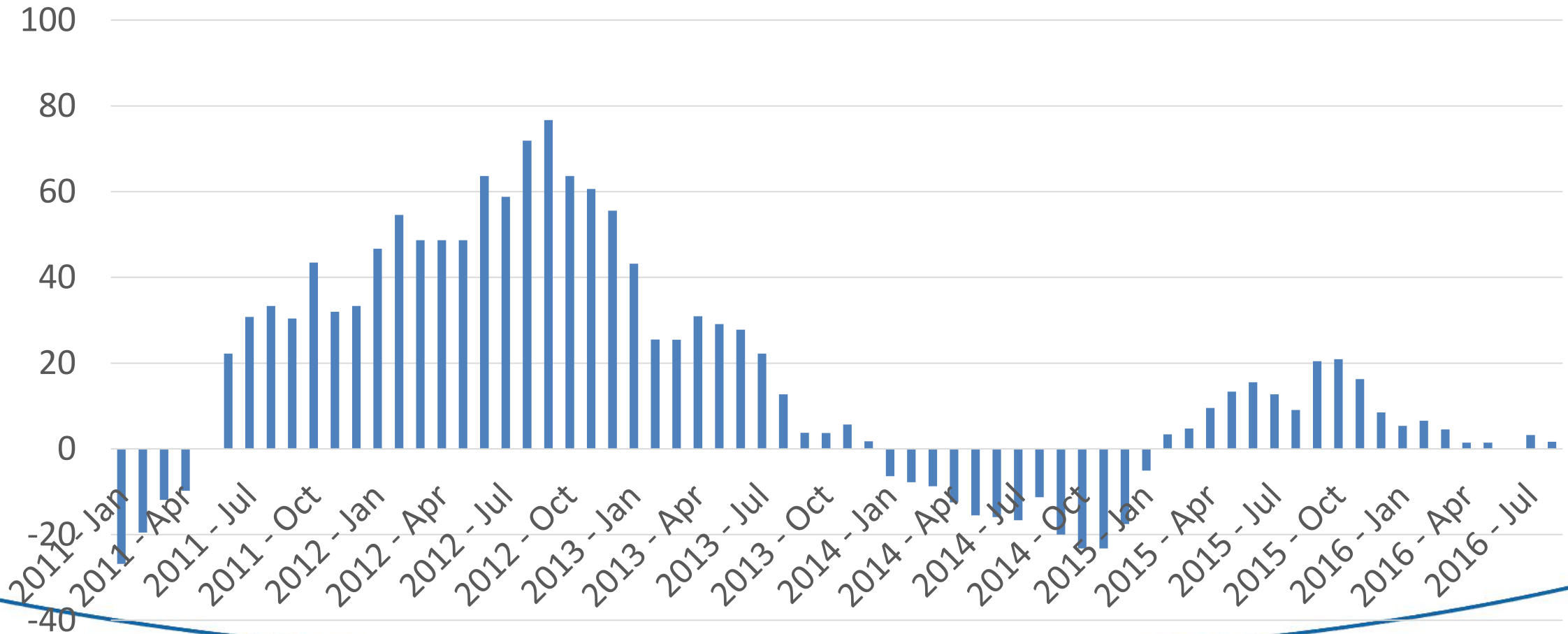
# NAR HOME Survey

Do you believe that now is a good time to BUY a home or not?

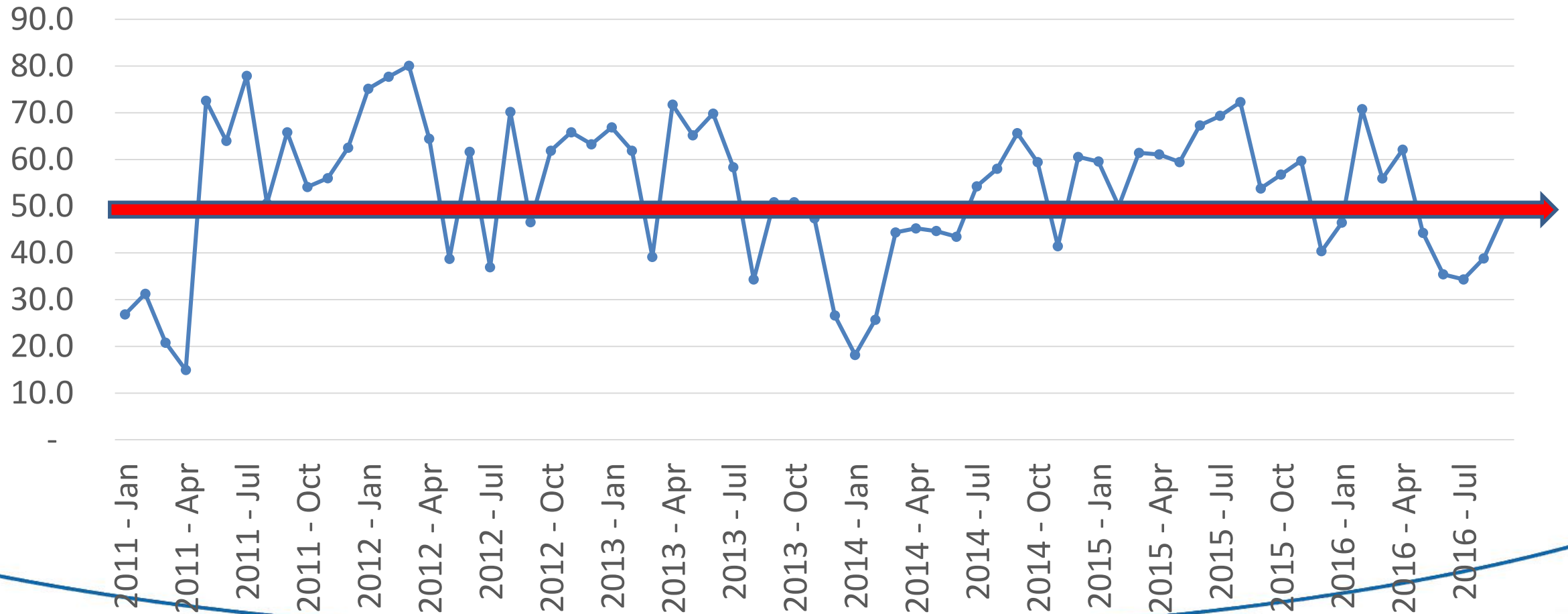


# NAR Buyer Traffic Index

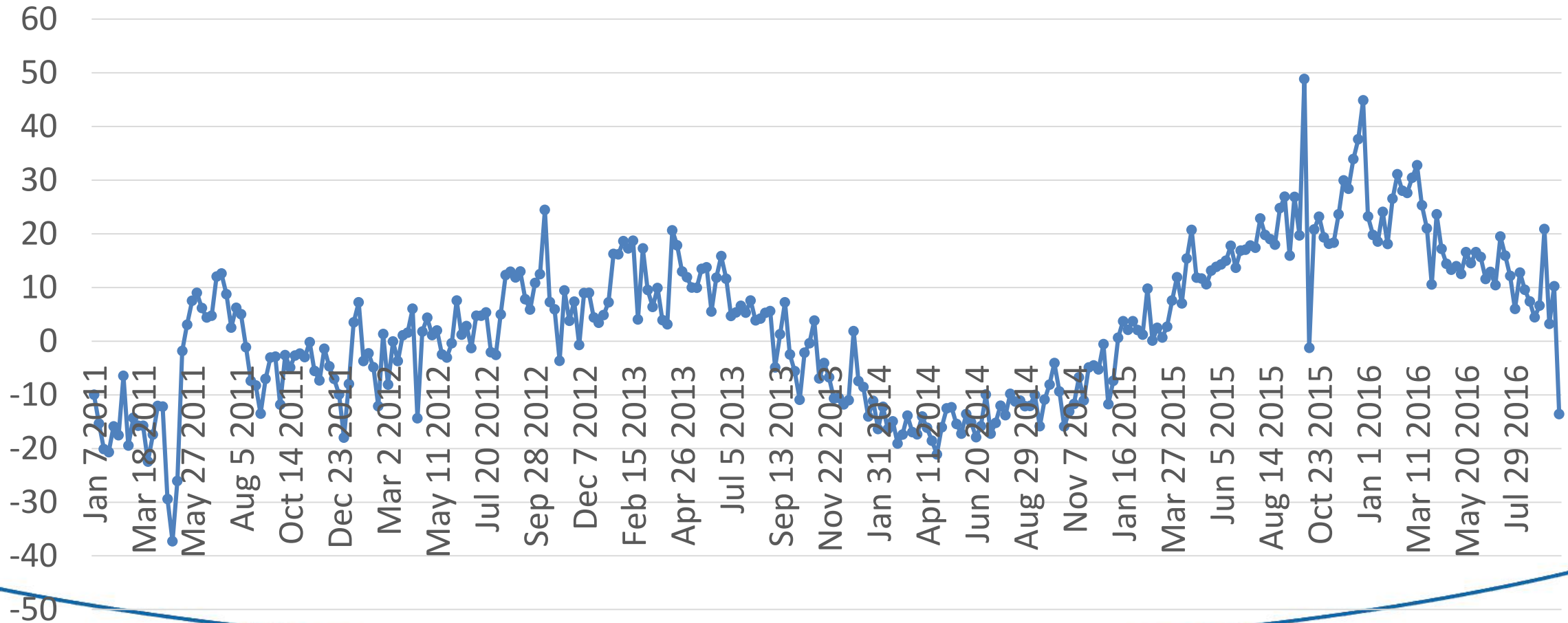
(% change from a year ago)



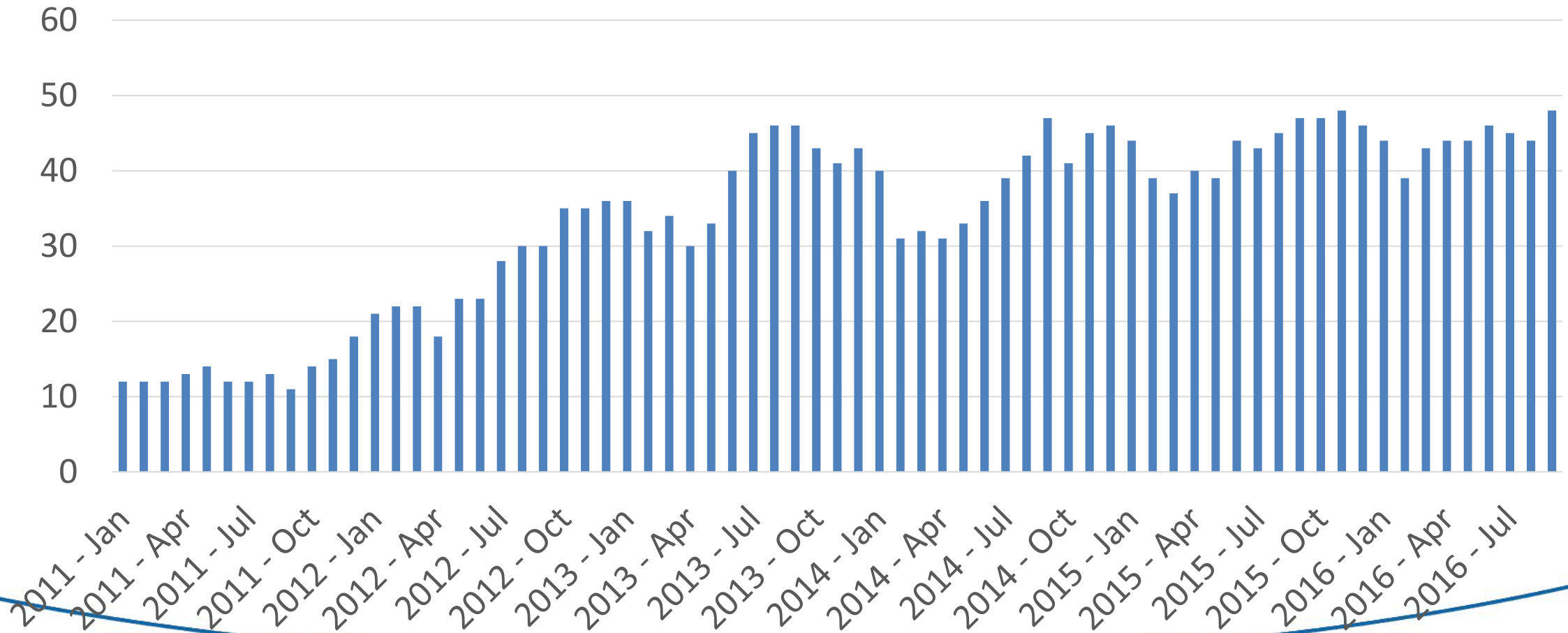
# SentriLock Openings (Diffusion Index: 50=neutral)



# Mortgage Purchase Applications (% change from a year ago)



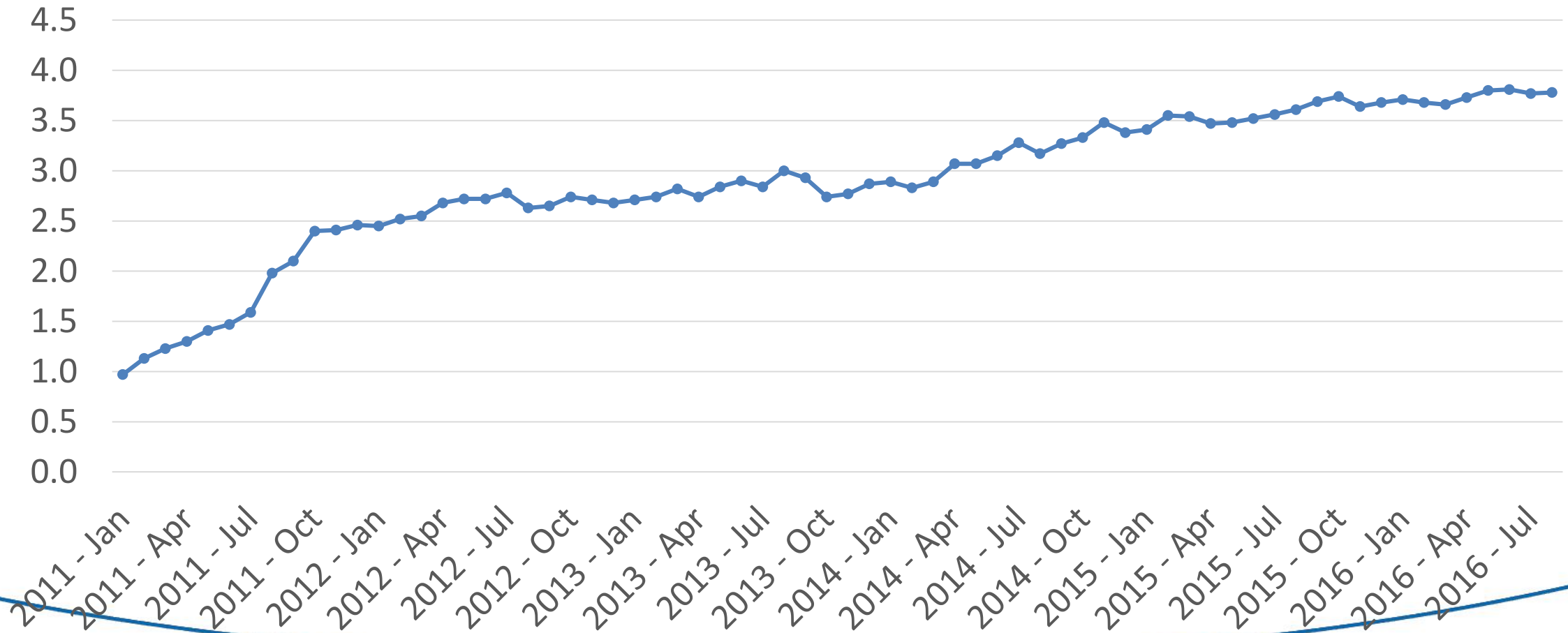
# Homebuilder: Buyer Traffic (Diffusion Index: 50 = neutral)



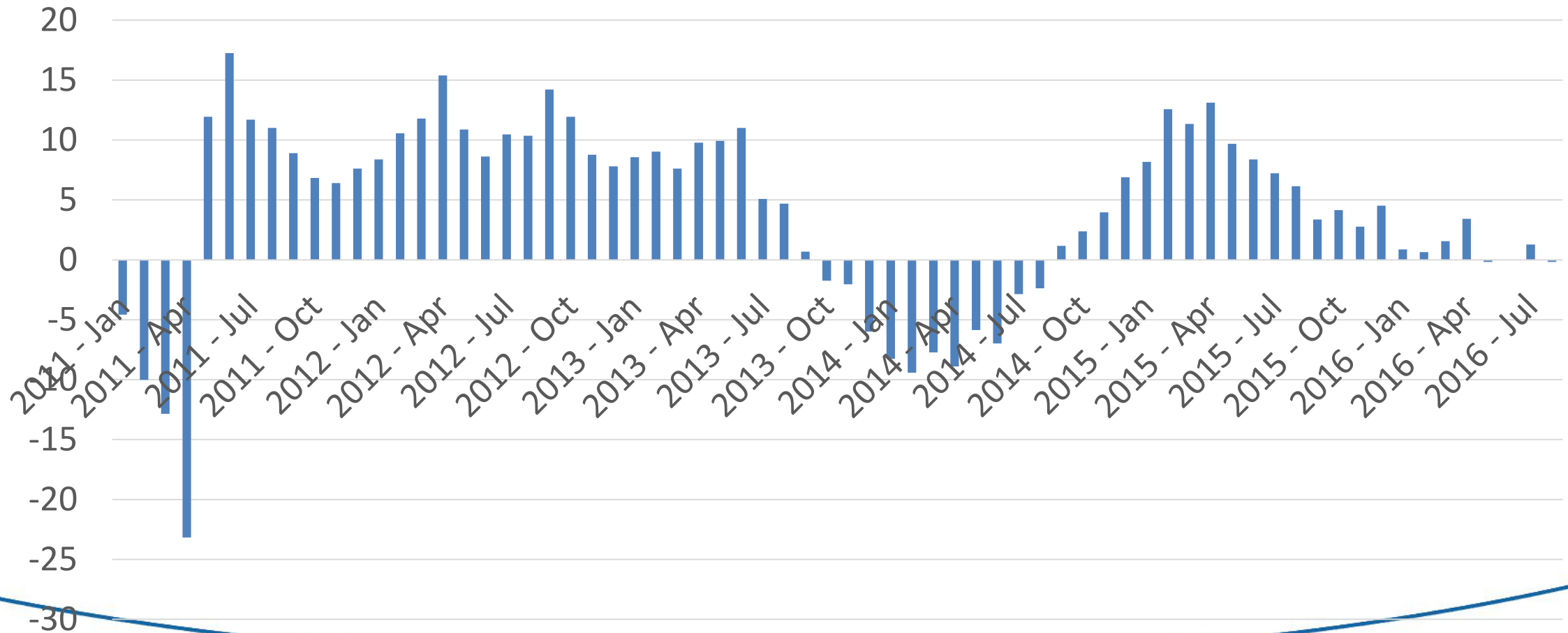


# Rent Growth

(% change from a year ago)

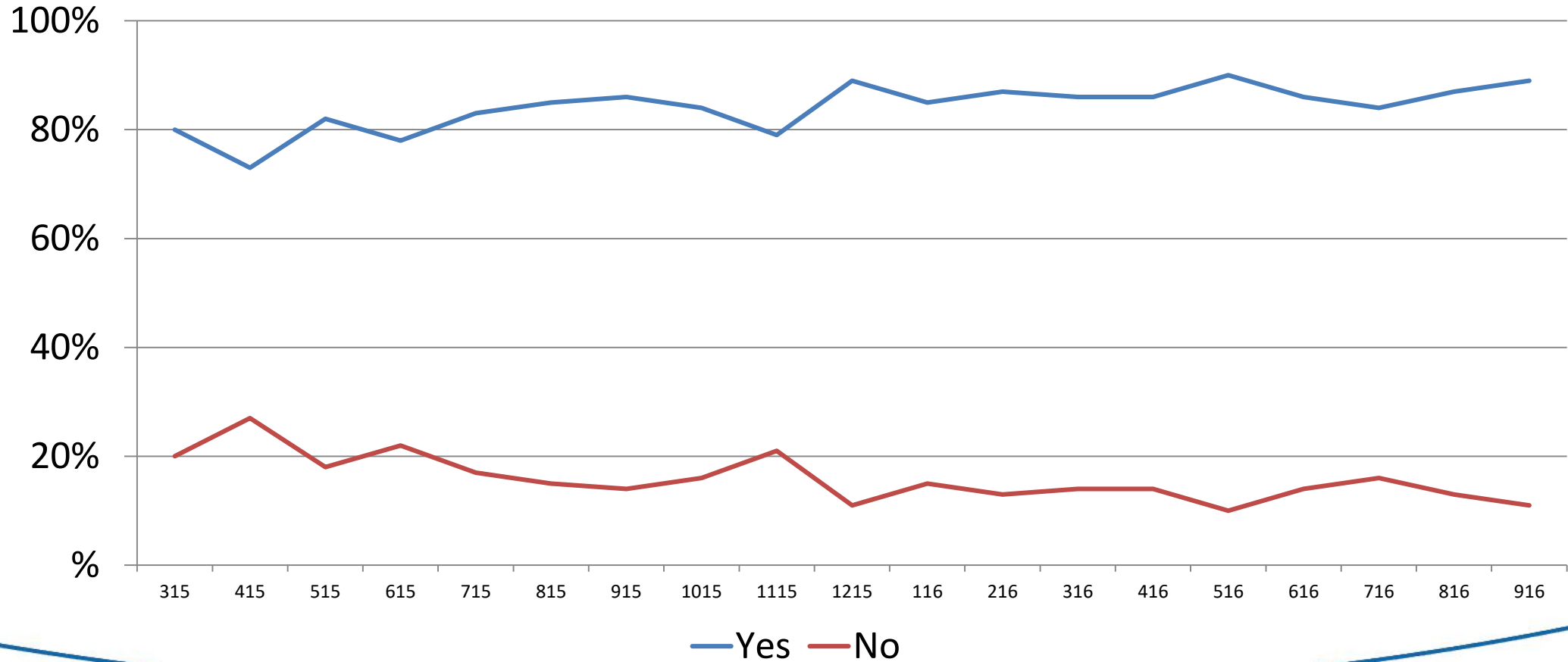


# Pending Home Sales Index (% change from a year ago)



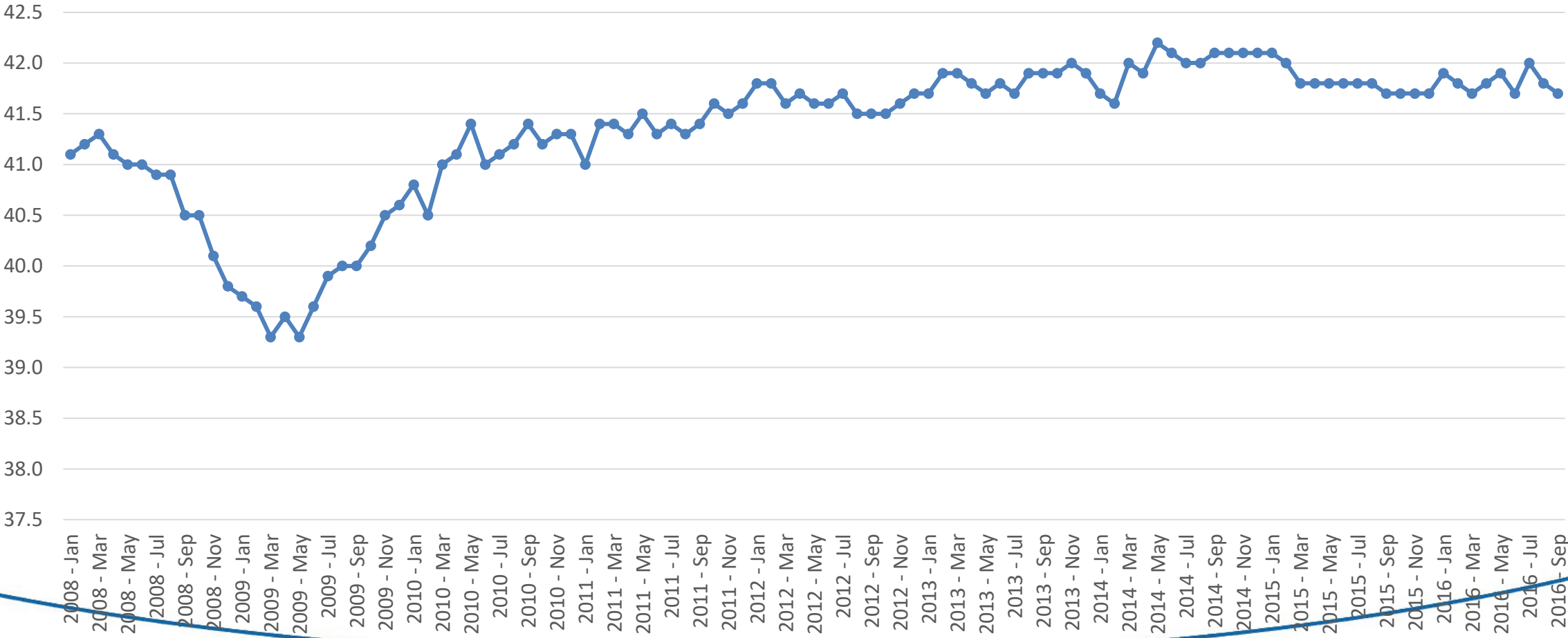
# NAR HOME Survey

Do you ever want to own a home in the future?



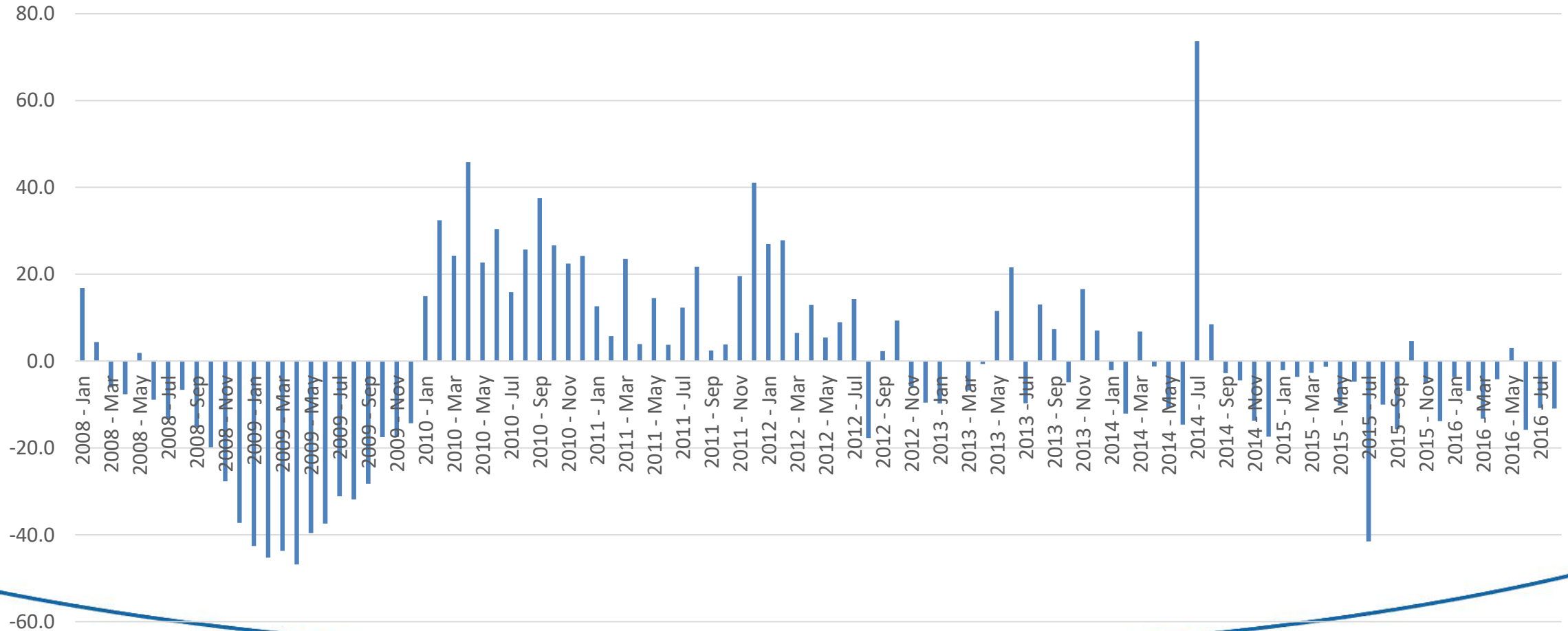
# Broad Economy Leading/Turning Indicators

# Manufacturing Weekly Workhours

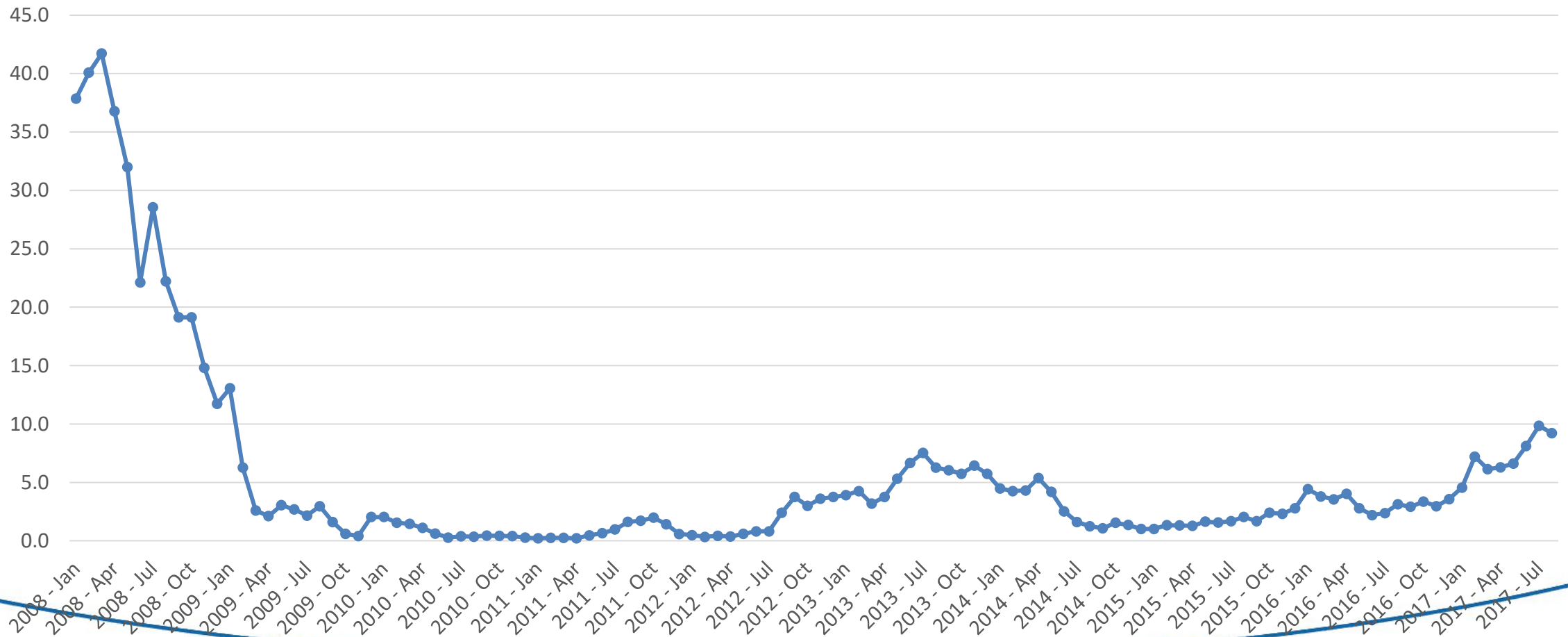


# New Capital Orders excluding Defense

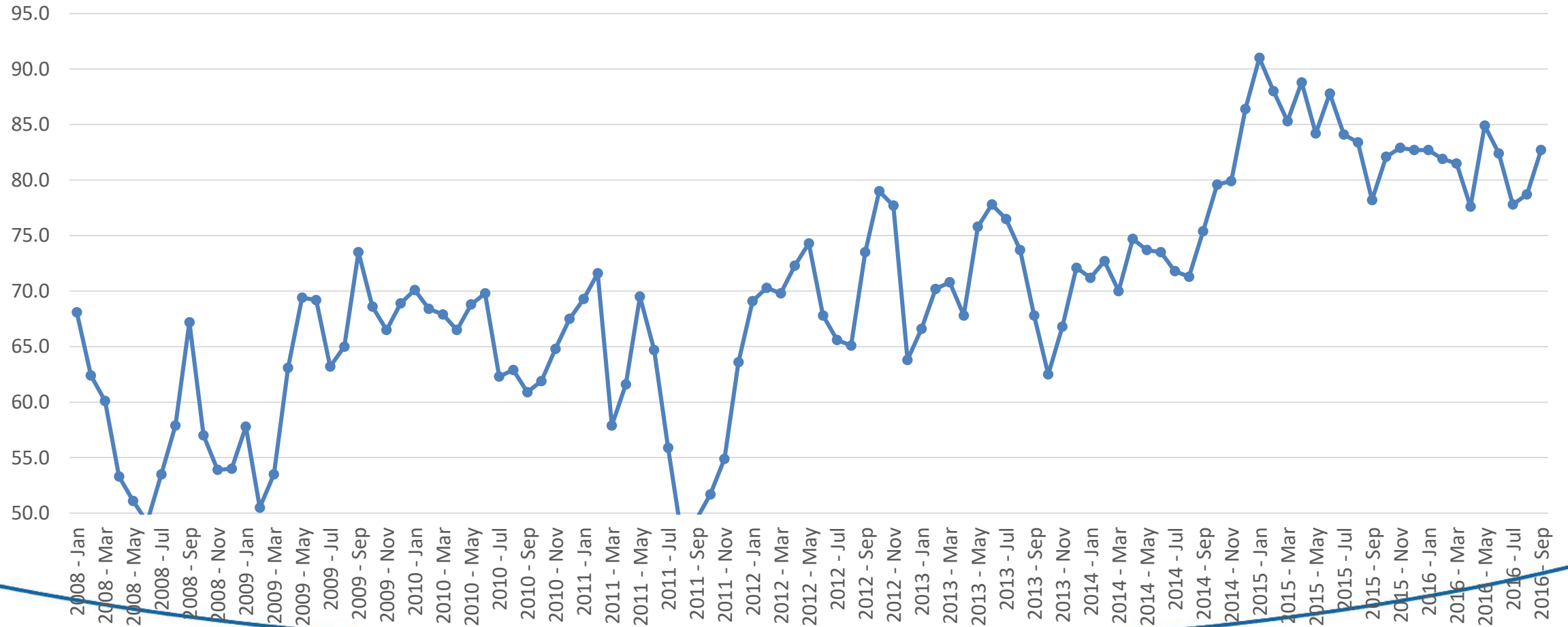
(% change from a year ago)



# Probability of Recession (NY Fed: based on interest rate spread)



# Consumer Expectations (Univ. of Michigan)

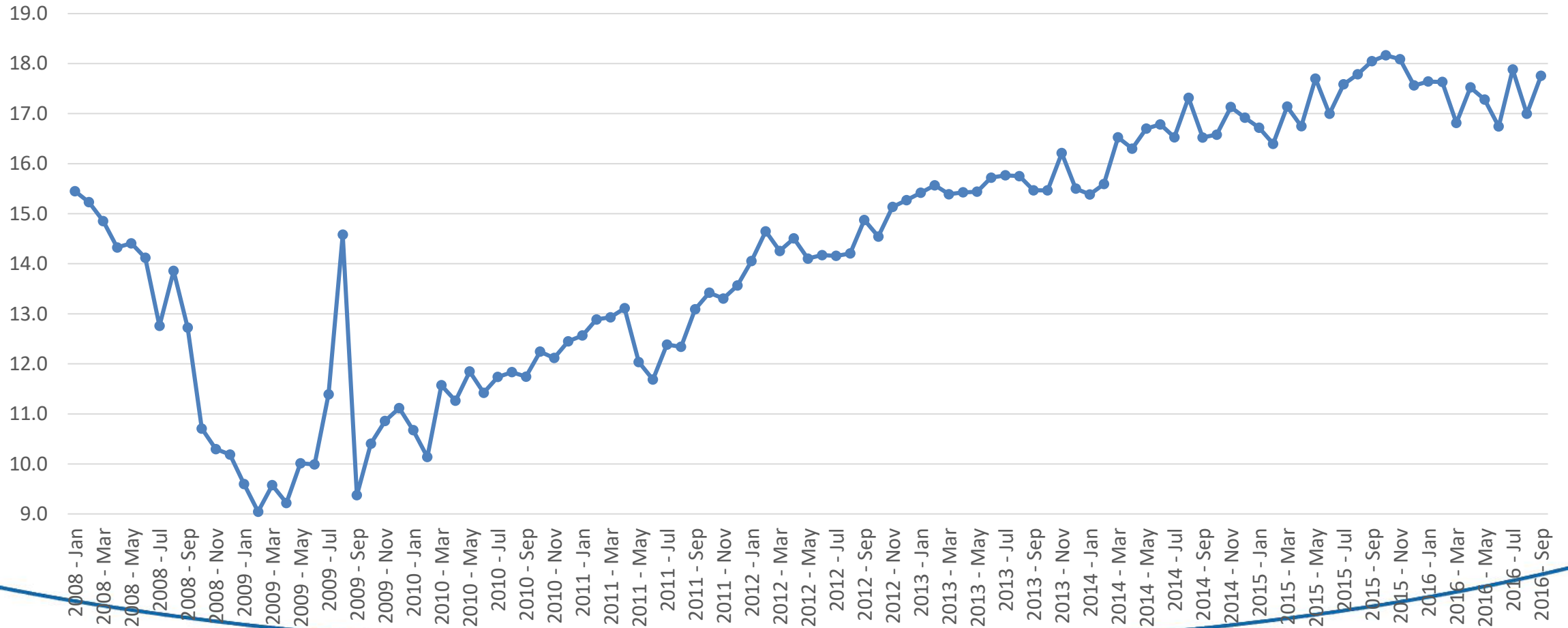




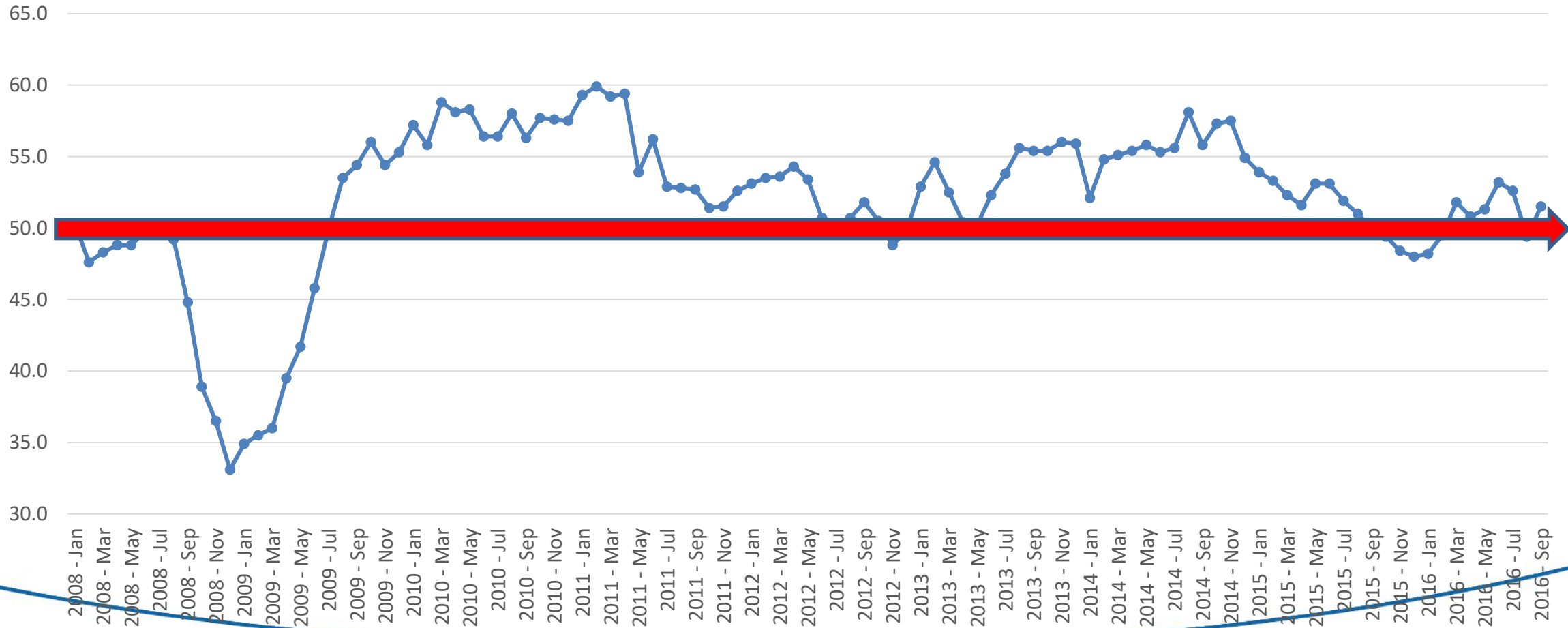
# Consumer Confidence Index (Conference Board)



# Auto Sales (Annualized Rate)

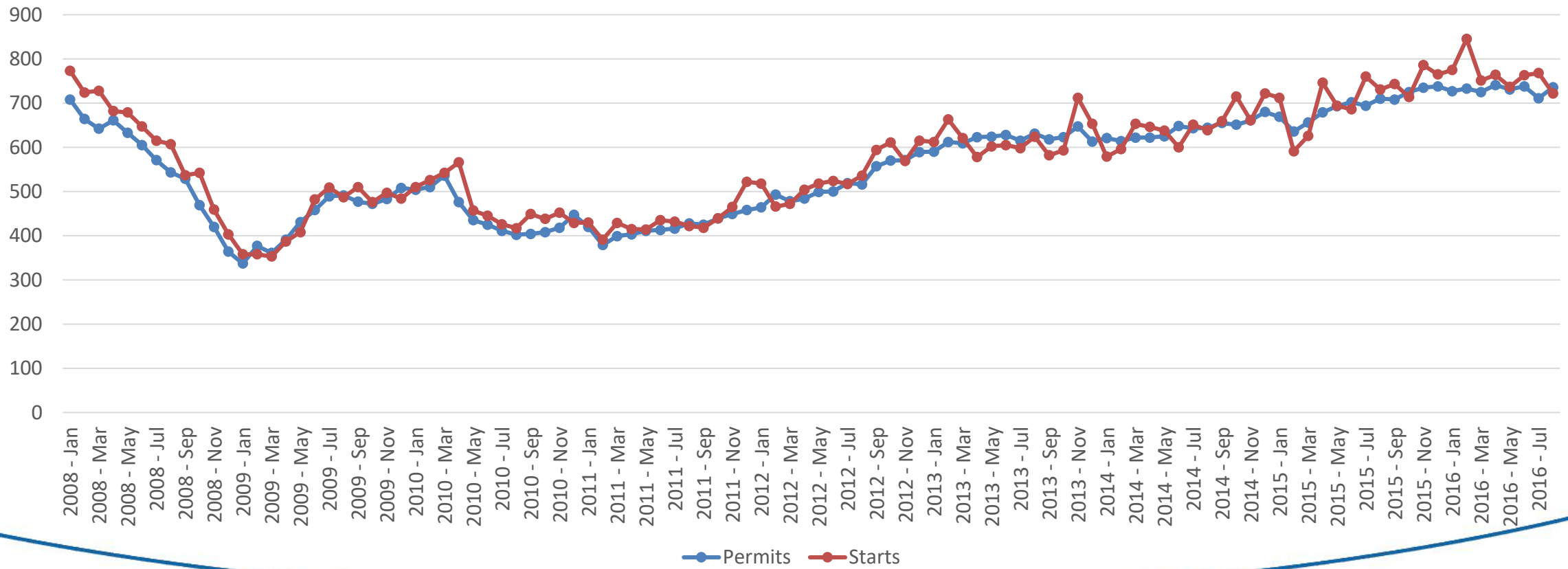


# ISM Manufacturing Index (50 = Neutral)

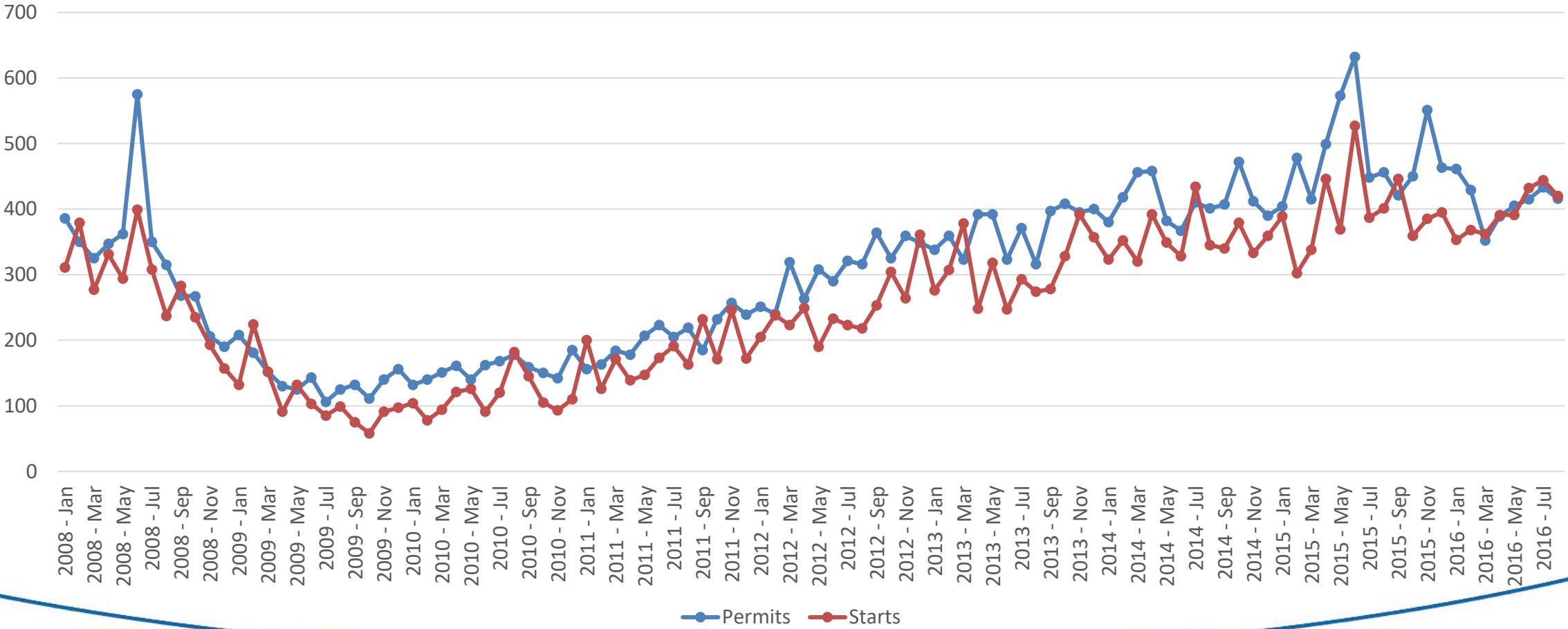


# Single-family permits and starts

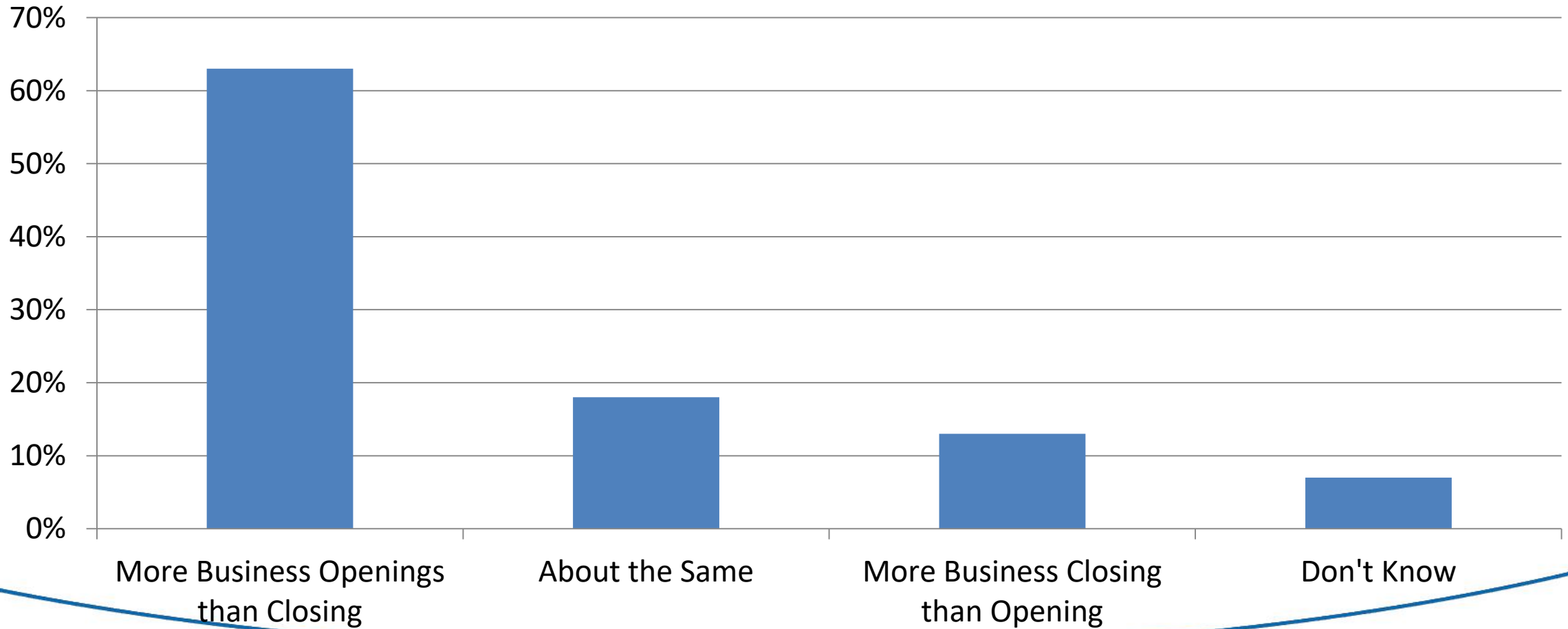
Chart Title



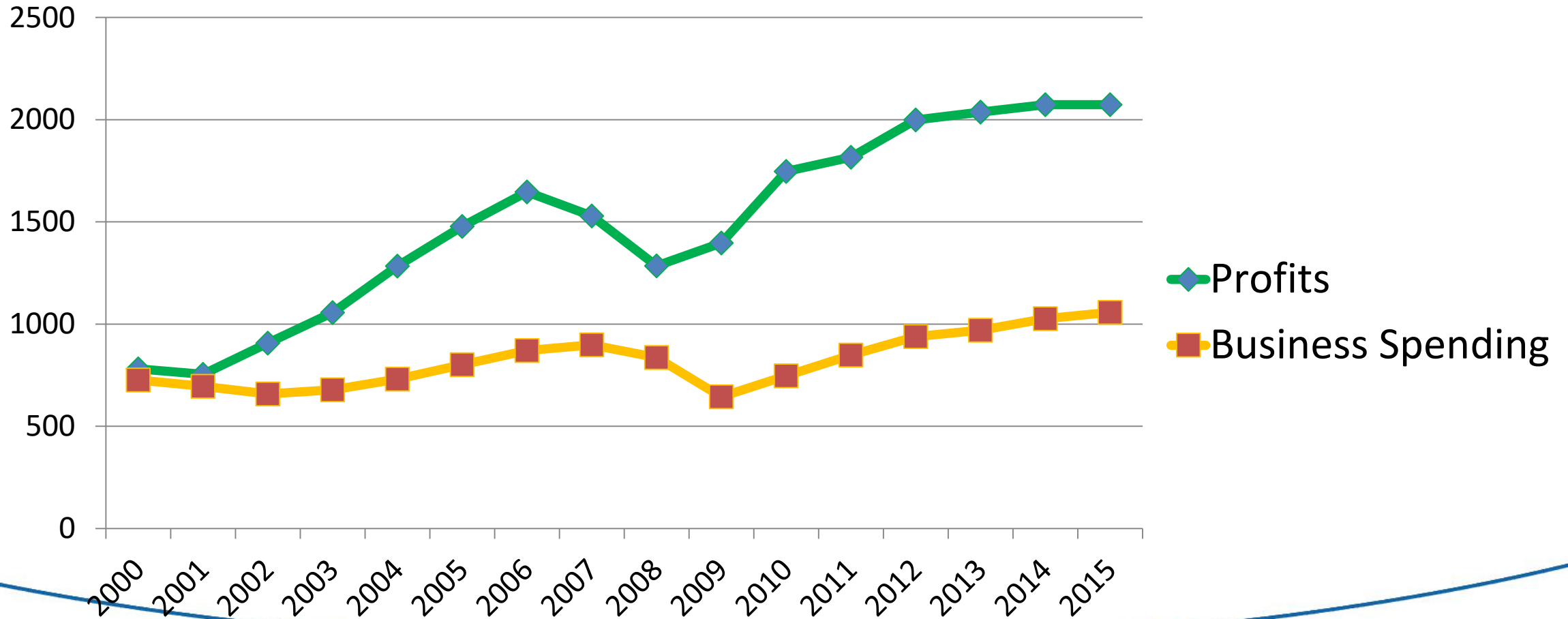
# Multifamily permits and starts



# Small Business Dynamics (NAR Survey)



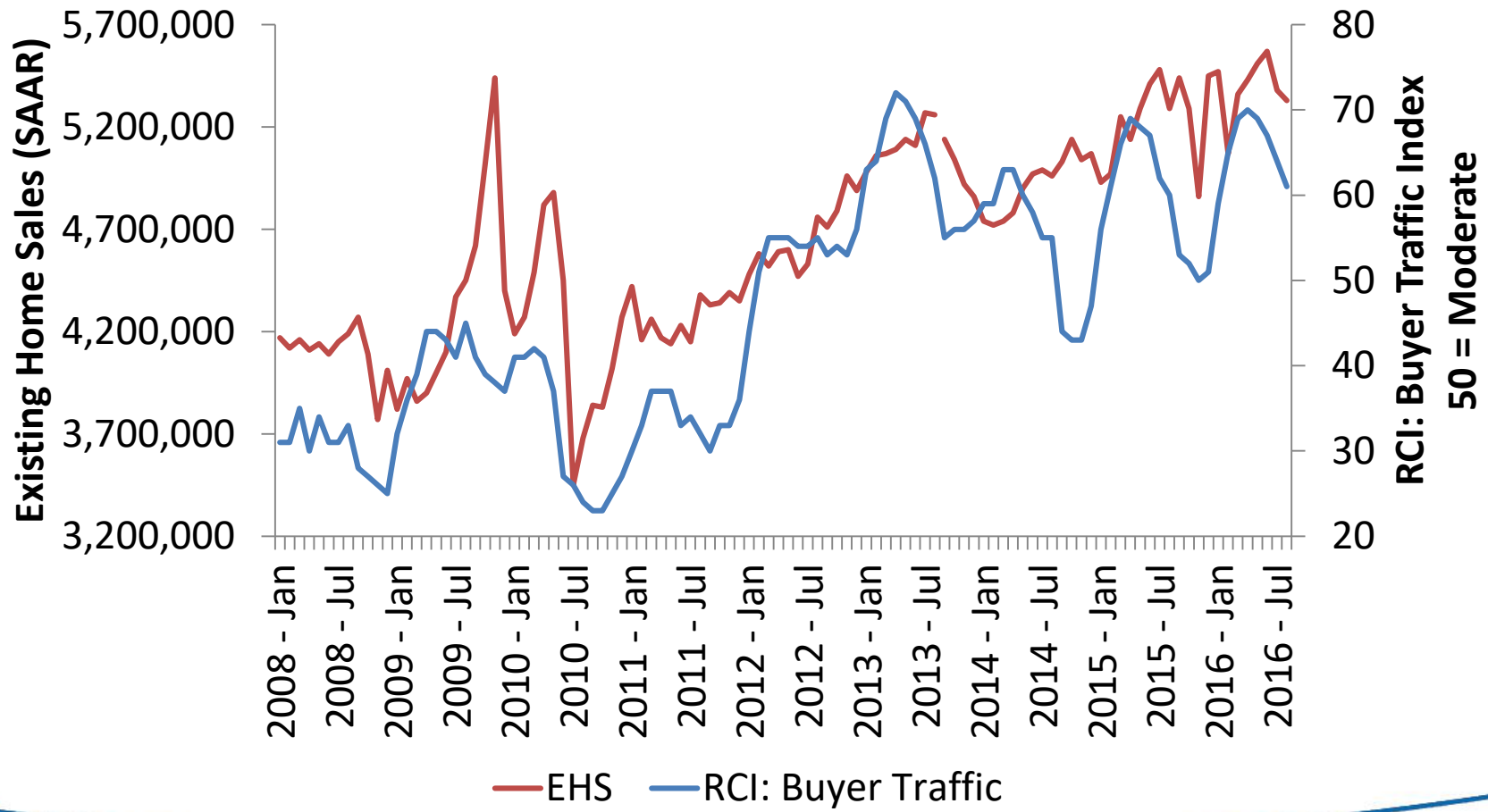
# Sluggish Business Spending Despite High Profit



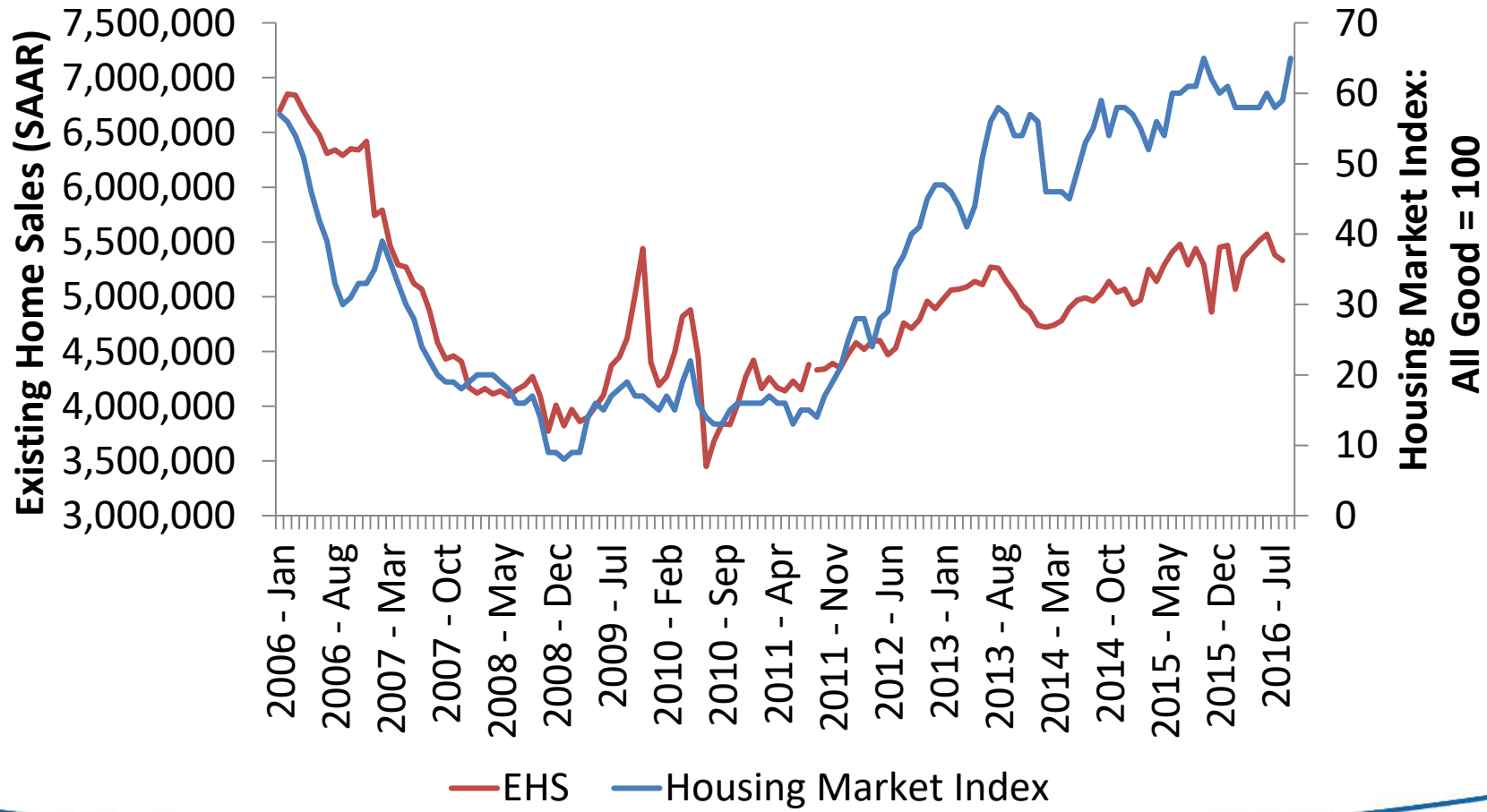
# What Impacts Home Sales?



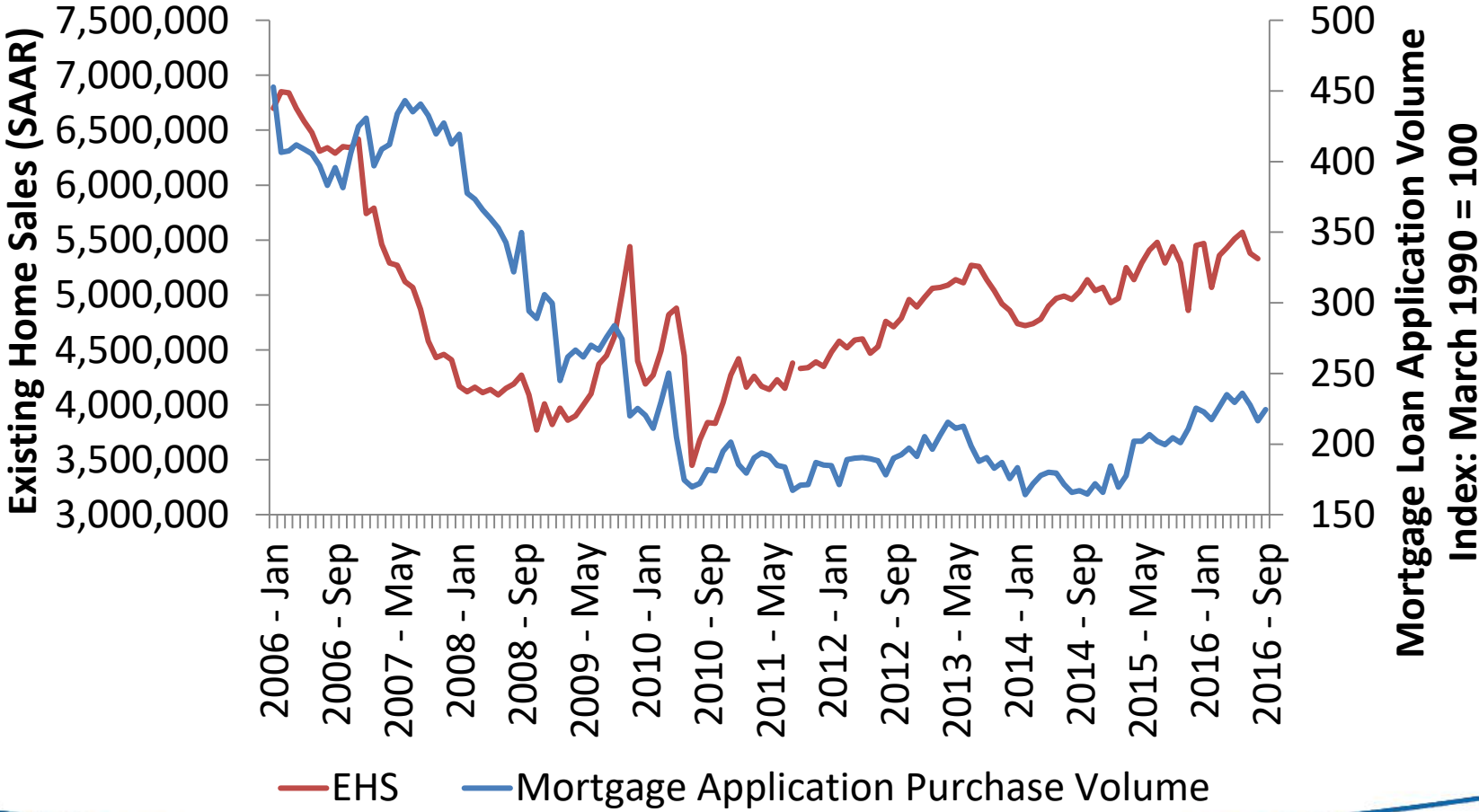
# RCI: Buyer Traffic Index – Positive Relationship; When Buyer Traffic Goes Up, EHS Goes Up



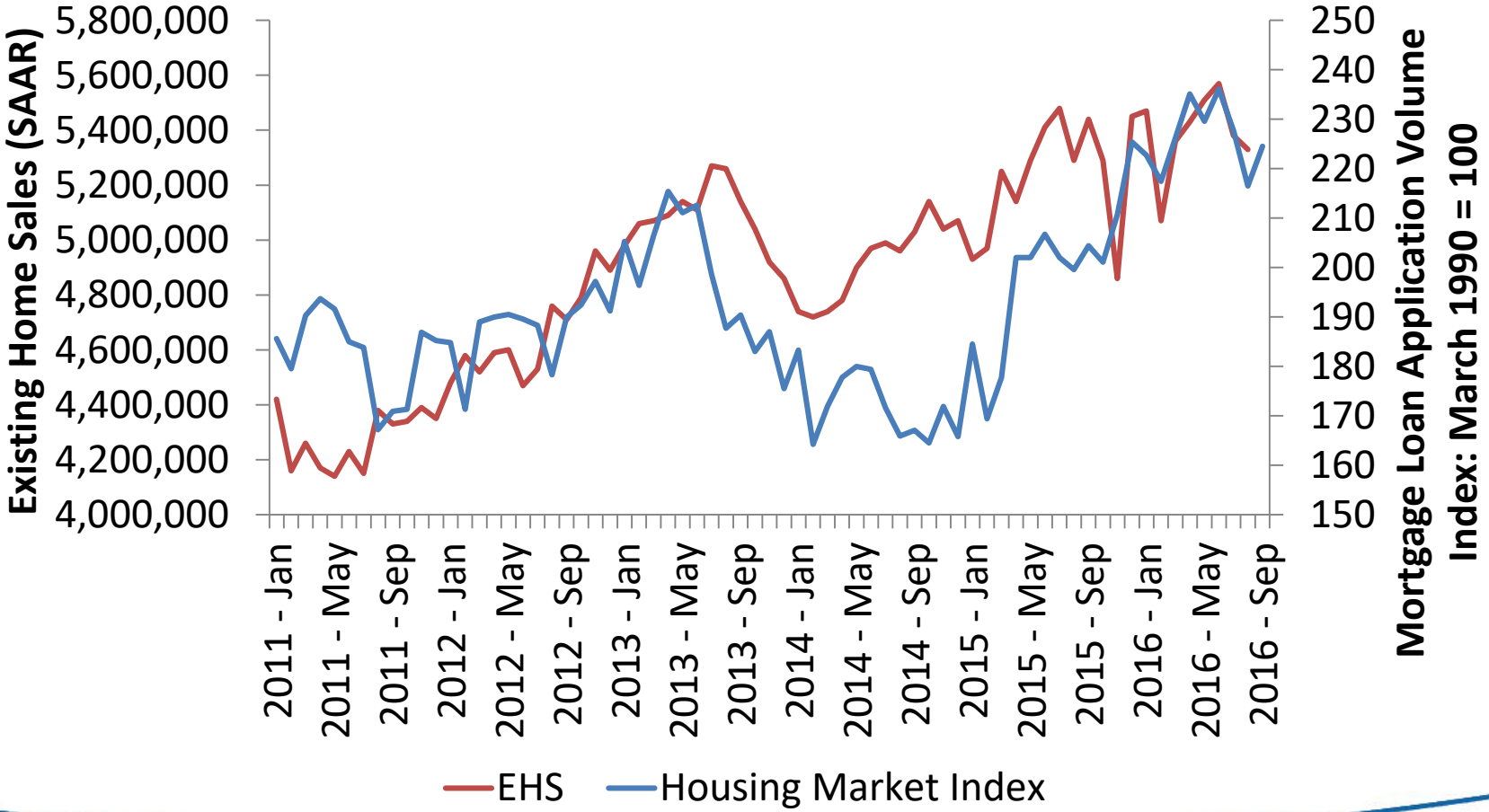
# Housing Market Index (Builders) – Can Diverge with EHS



# Mortgage Application Purchase Volume Index – Not as Well Related in Medium Term



# Mortgage Application Purchase Volume Index – More Positive Relationship in Shorter Run



# Theoretical Drivers

# Demand – Buyer's Side

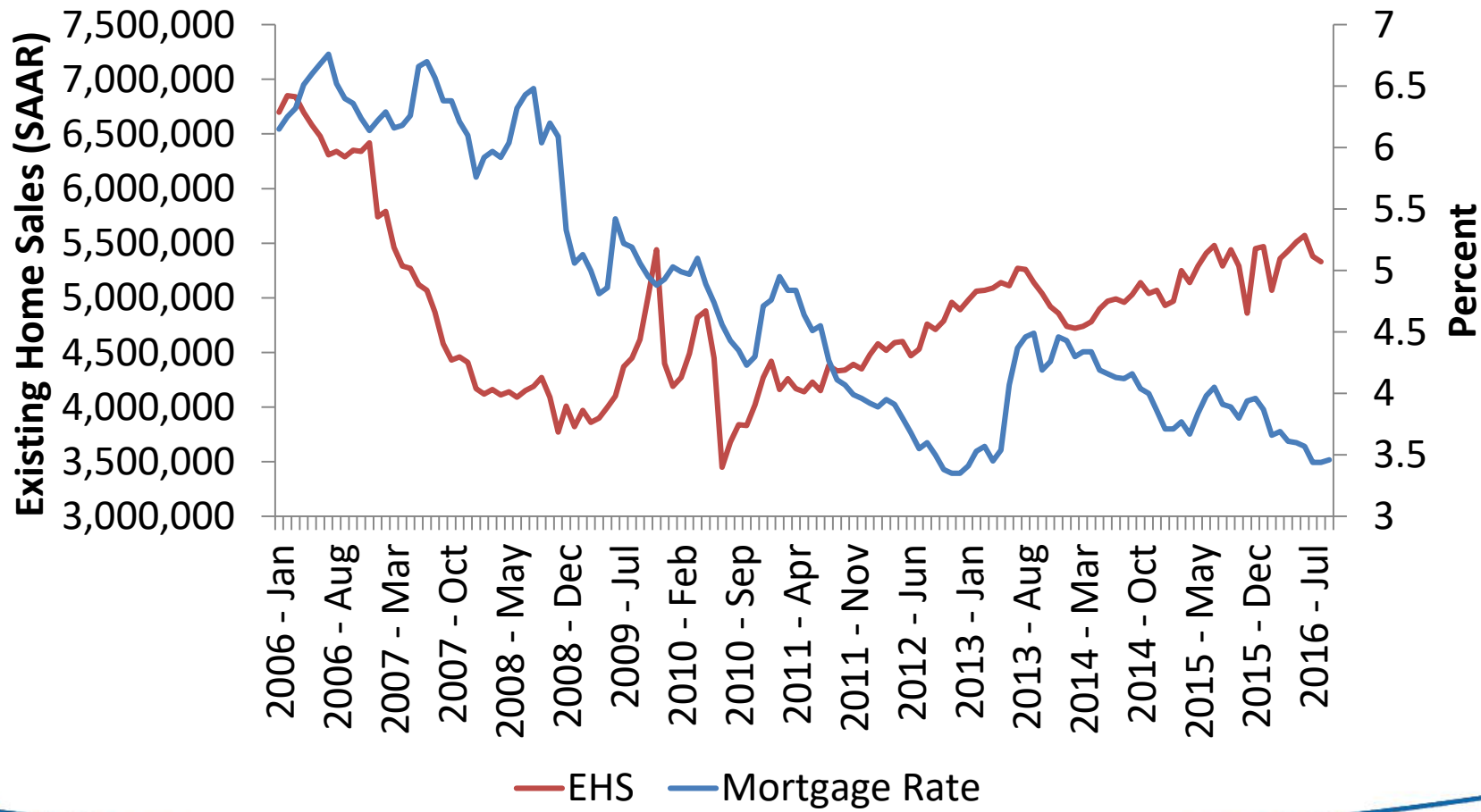
- Income (current vs. permanent)
- Relative Price (apartment rents, tax benefits)
- Mortgage Rates
- Expected changes in the above factors plus expected change in the price of homes
- Concerns about the economy can affect expectations

# Supply

## (New Homes vs. Existing Homes)

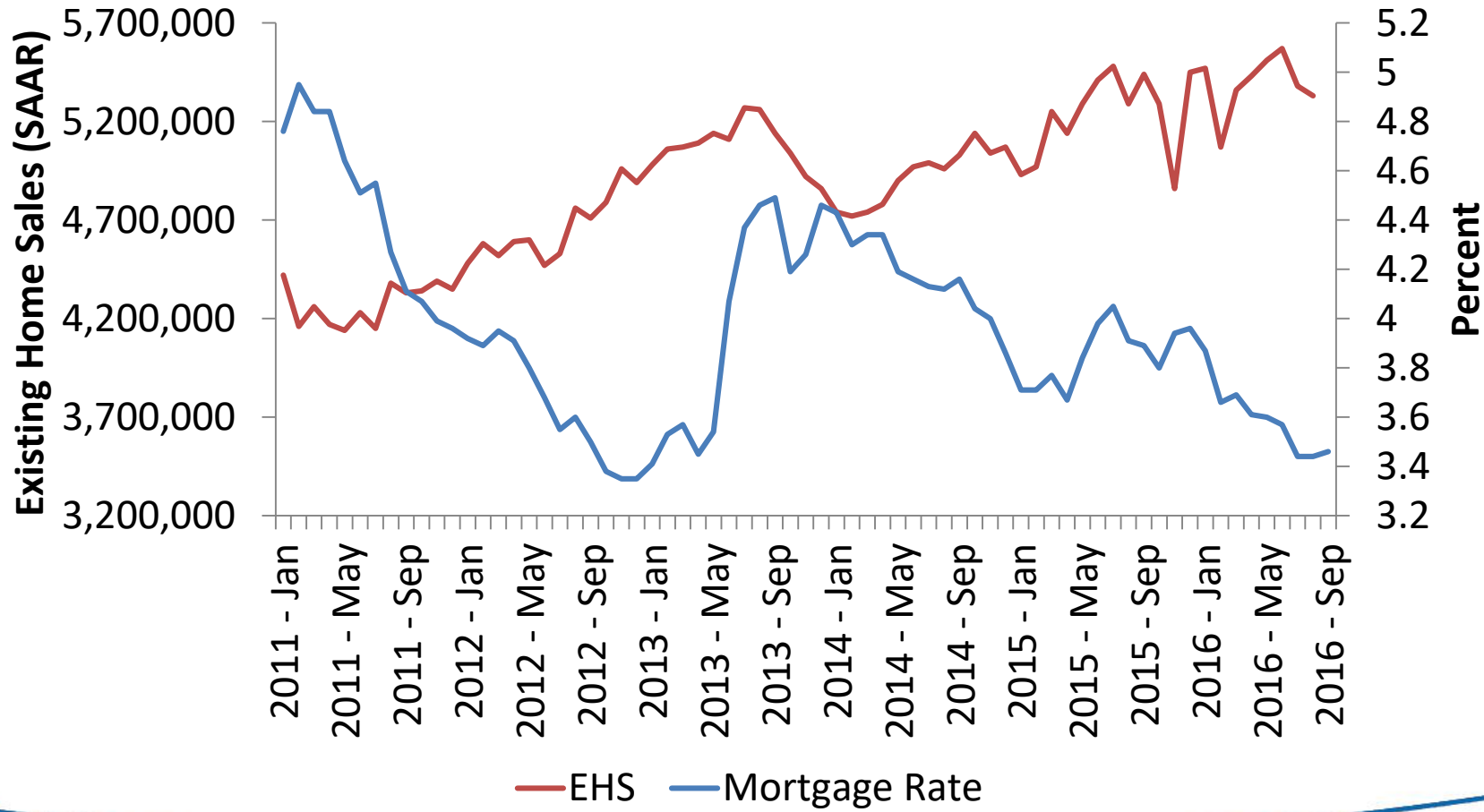
- Changes in costs of production (wages, materials, financing)
- Weather or other temporary disruptions
- Regulations/permitting
- Expected changes in the above factors plus expected change in the price of homes
- Concerns about the economy can affect expectations

# Mortgage Rates – No noticeable longer-term trend

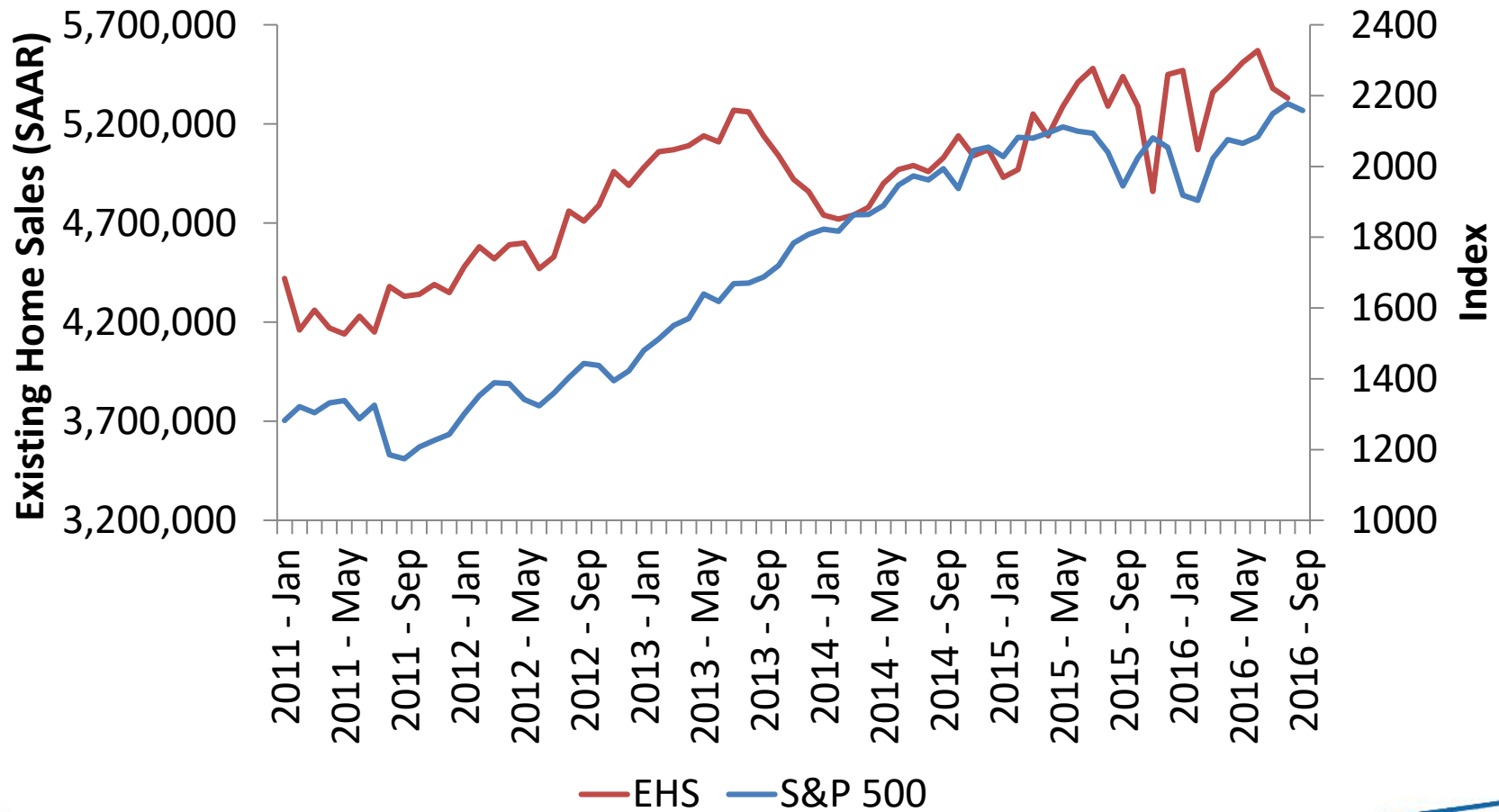




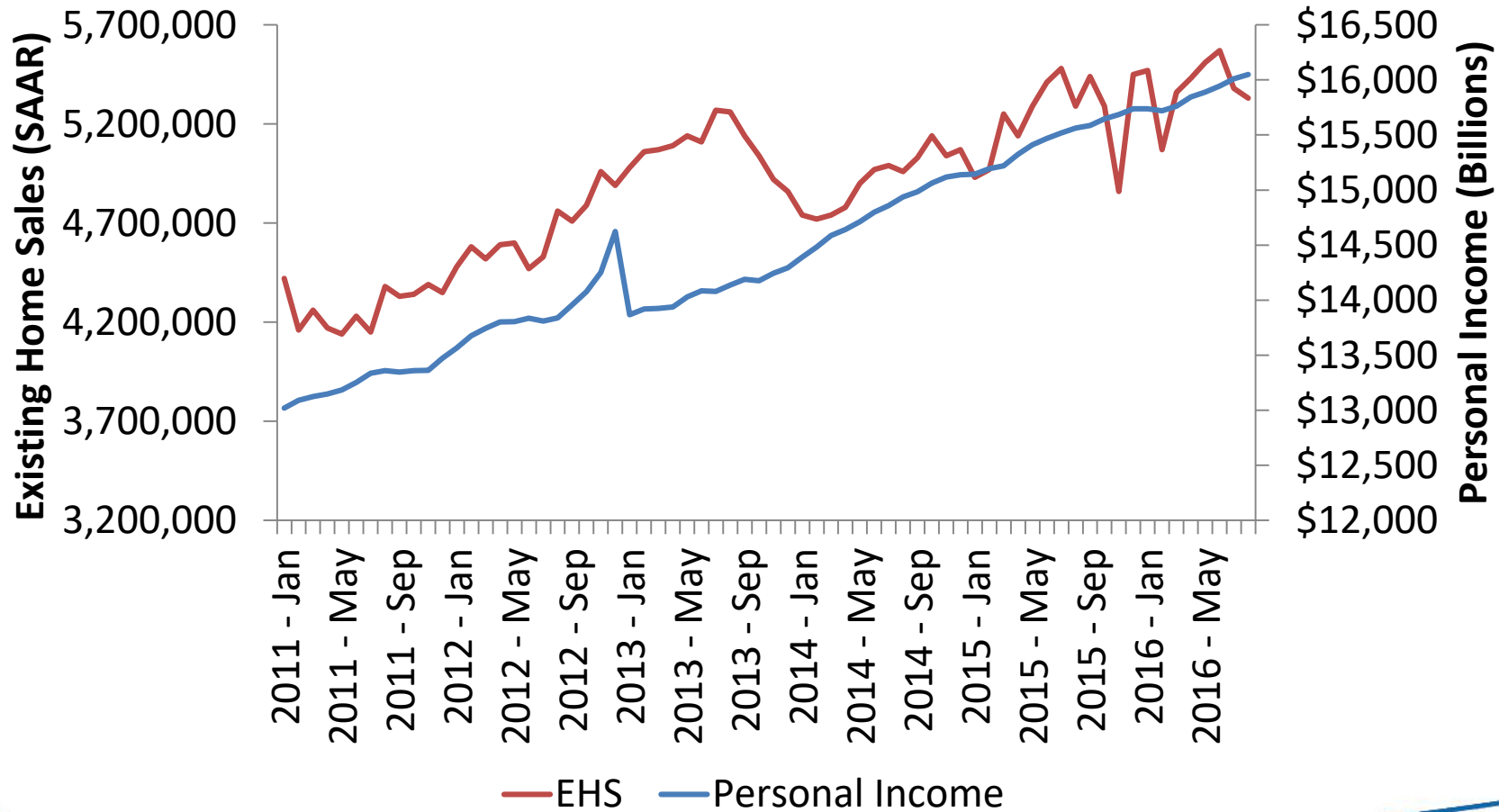
# Mortgage Rates – Negatively Related in the Shorter Run; When Rates Go Down, EHS Goes Up



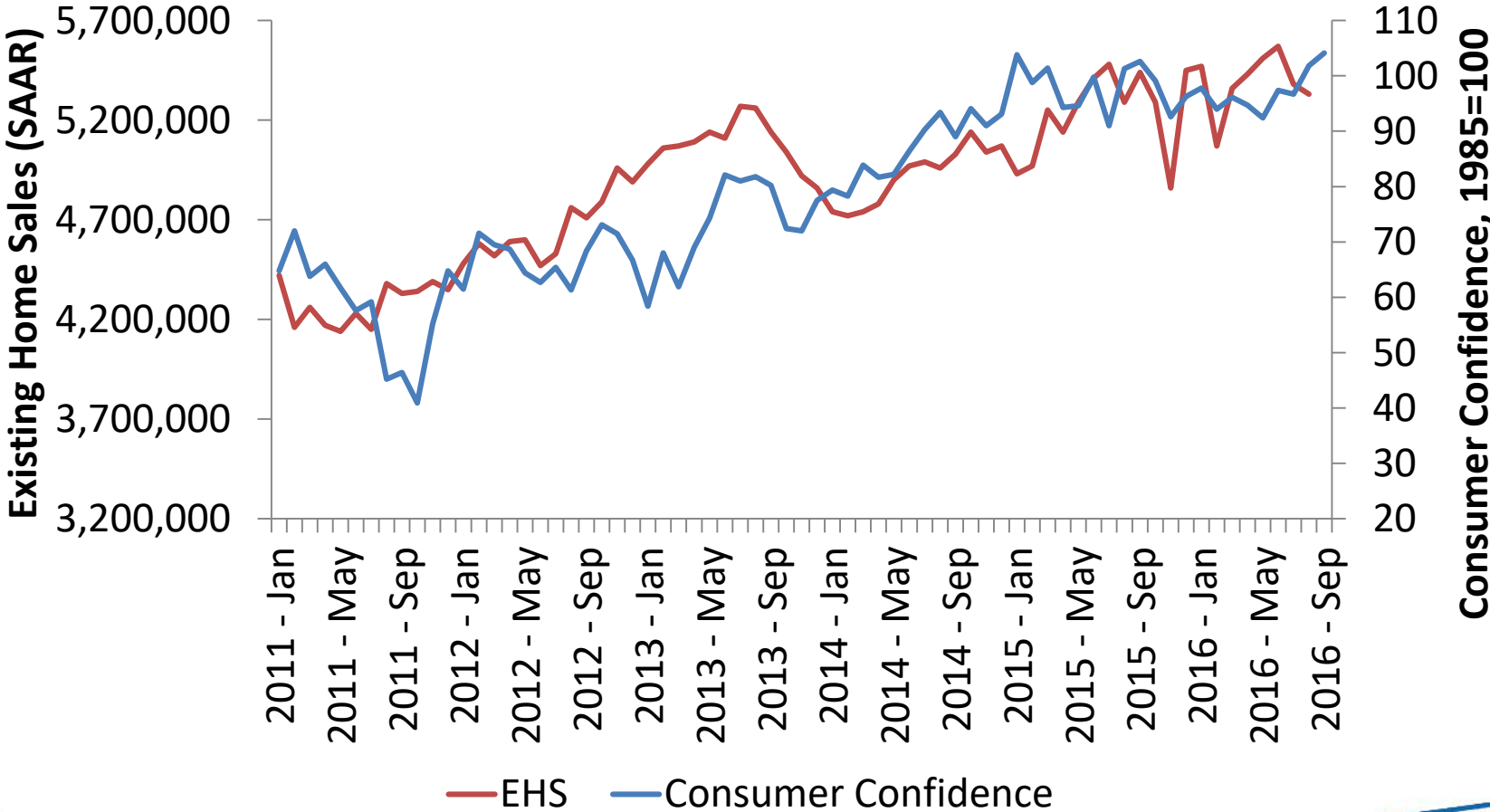
# Stock Market – Positively Related in the Shorter Run; When Market Goes Up, EHS Goes Up



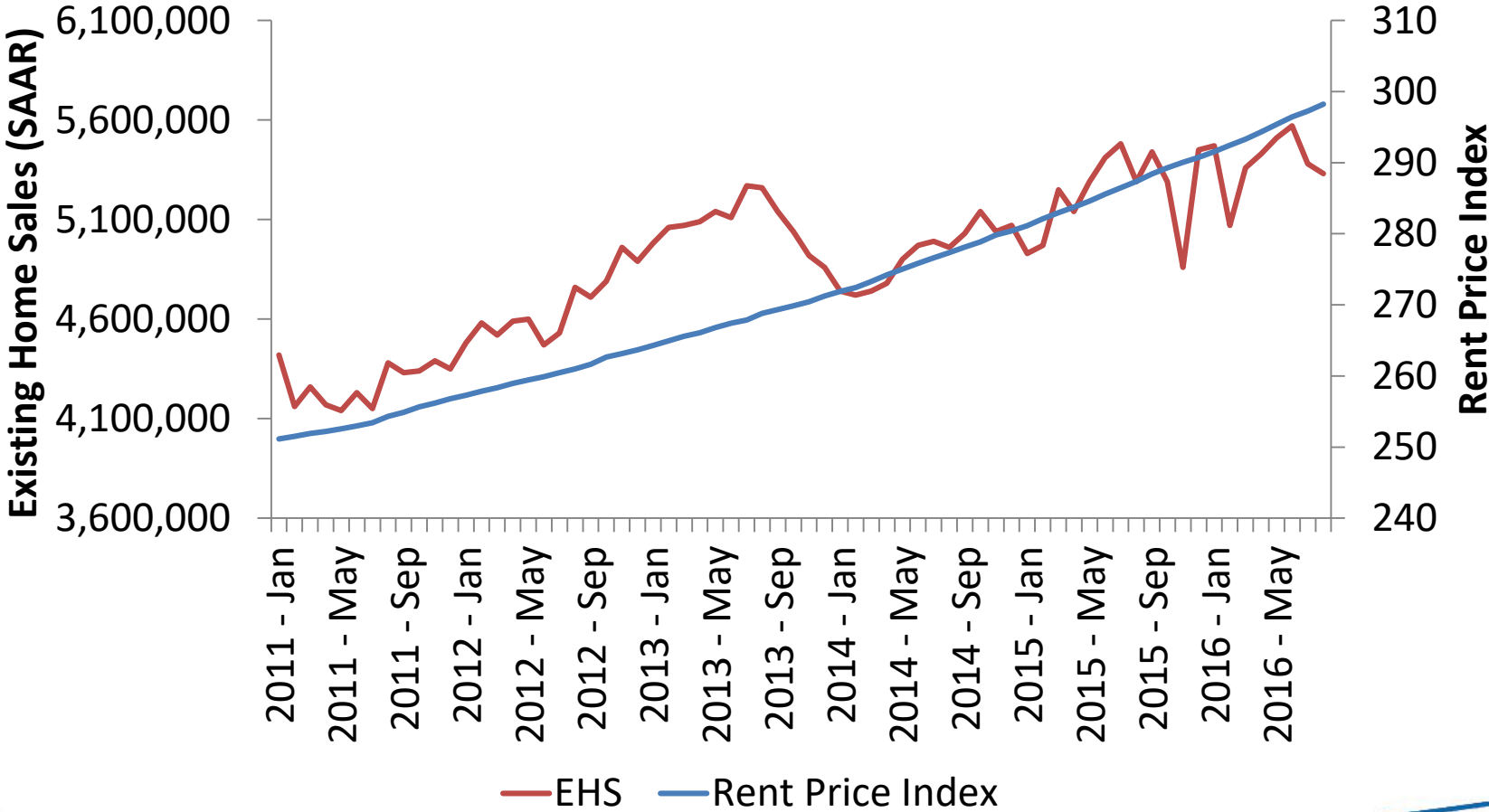
# Personal Income– Positively Related in the Shorter Run; When Income Goes Up, EHS Goes Up



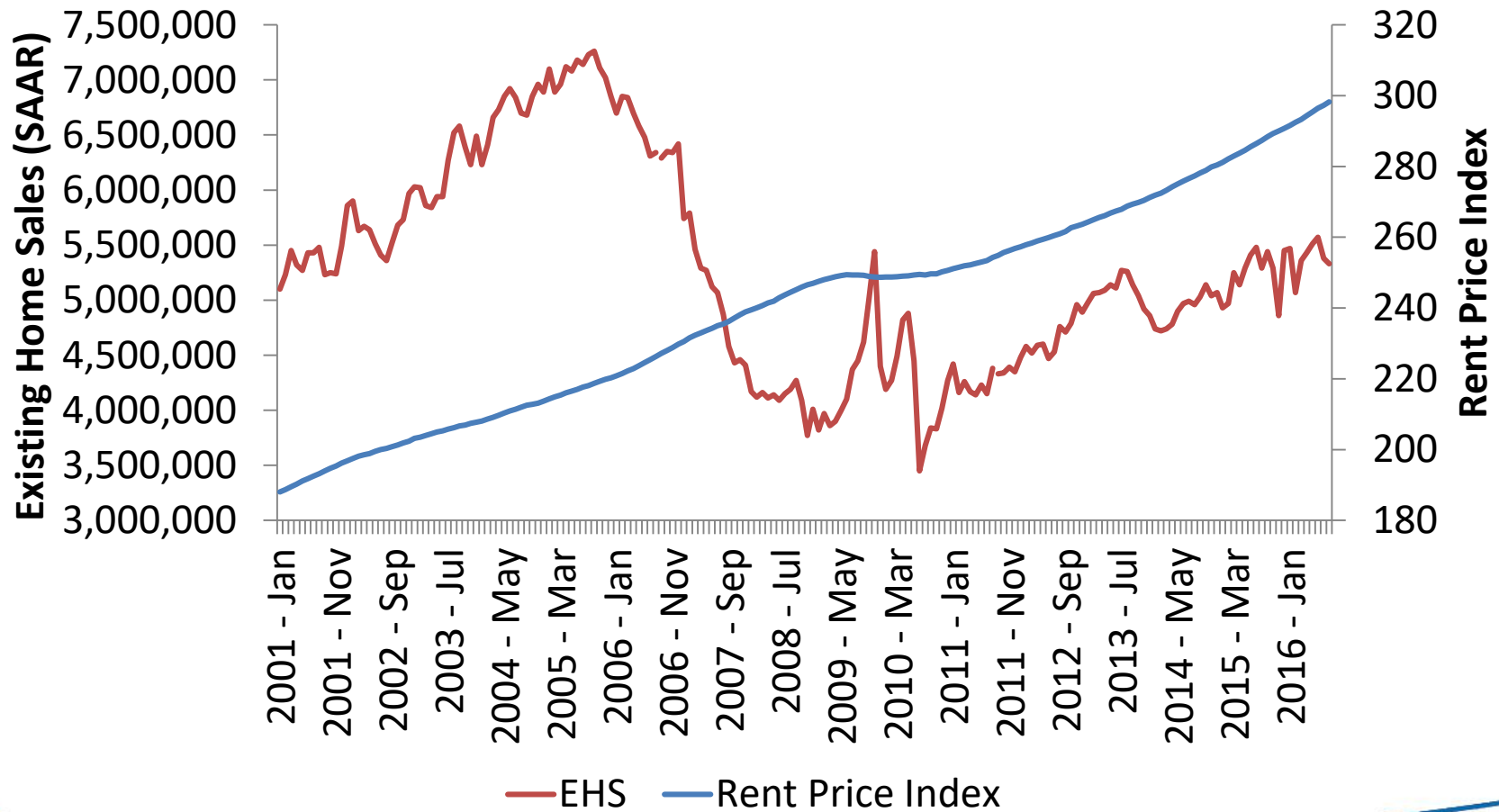
# Consumer Confidence – Positively Related; When Confidence Goes Up, EHS Goes Up



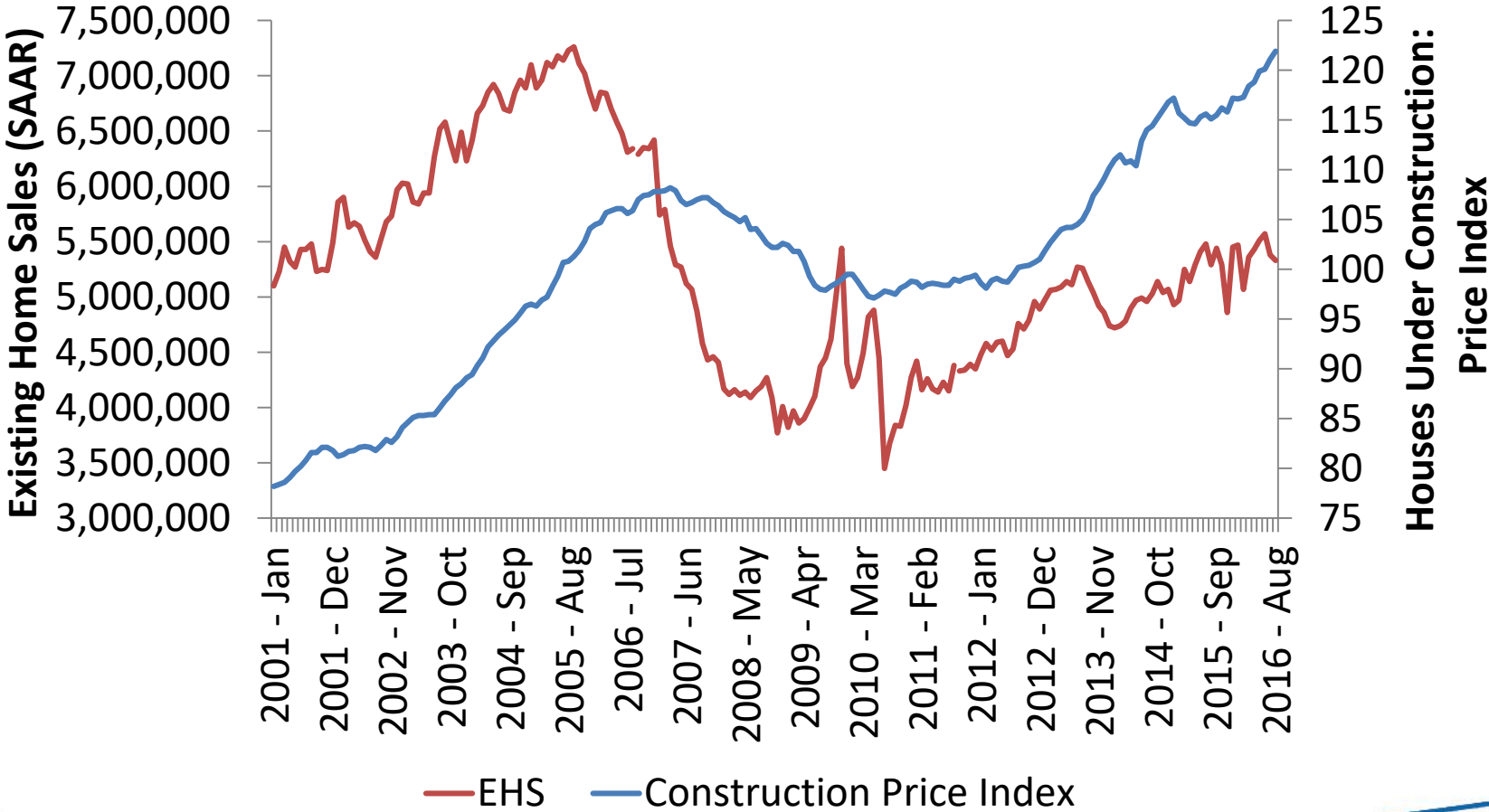
# Rent Price Index – Positively Related in Shorter Run; When Rent Goes Up, EHS Goes Up



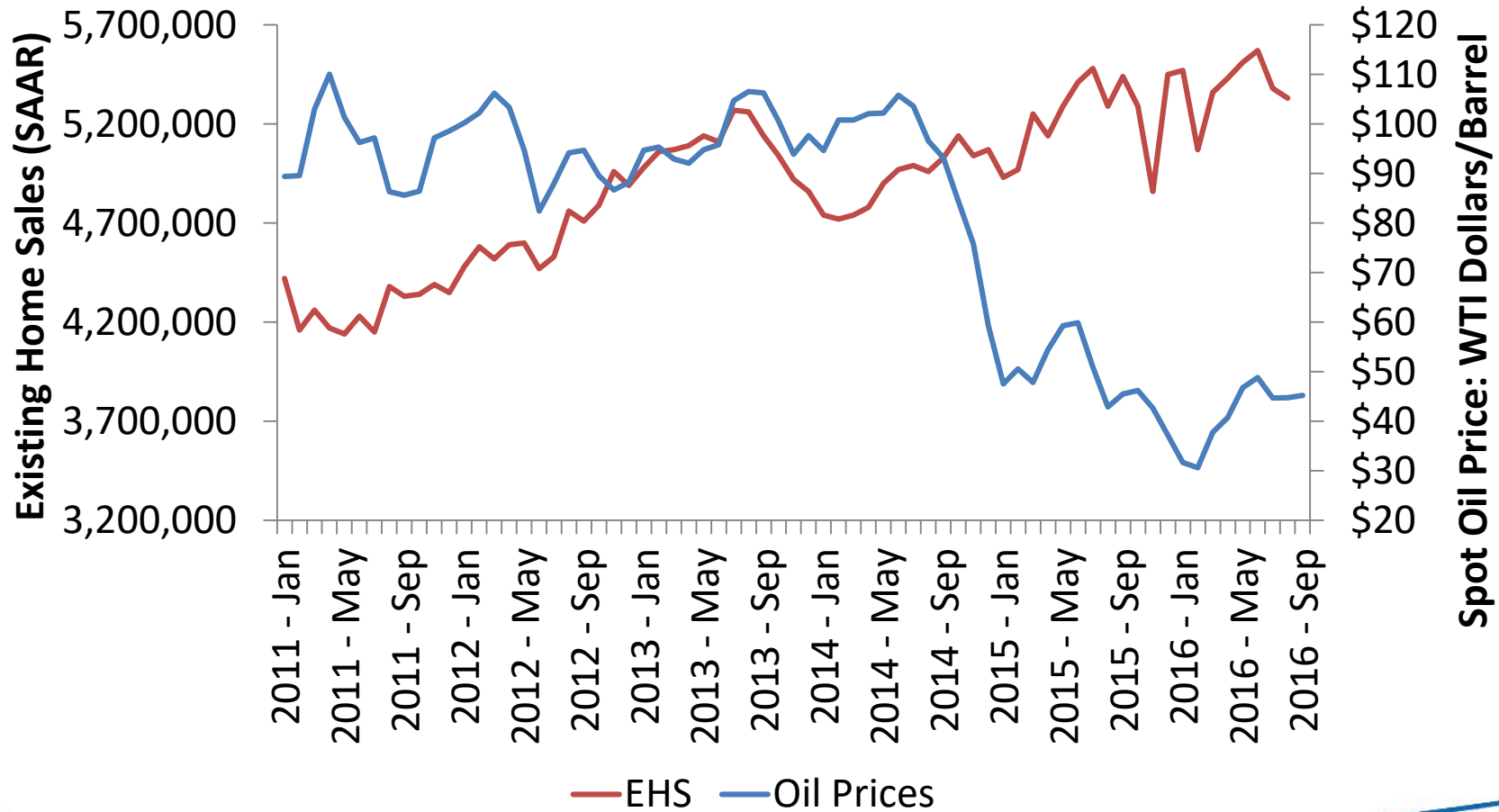
# Rent Price Index – No Strong Relationship by This Measure in the Longer Run



# Construction Price Index – No Strong Relationship by This Measure in the Longer Run



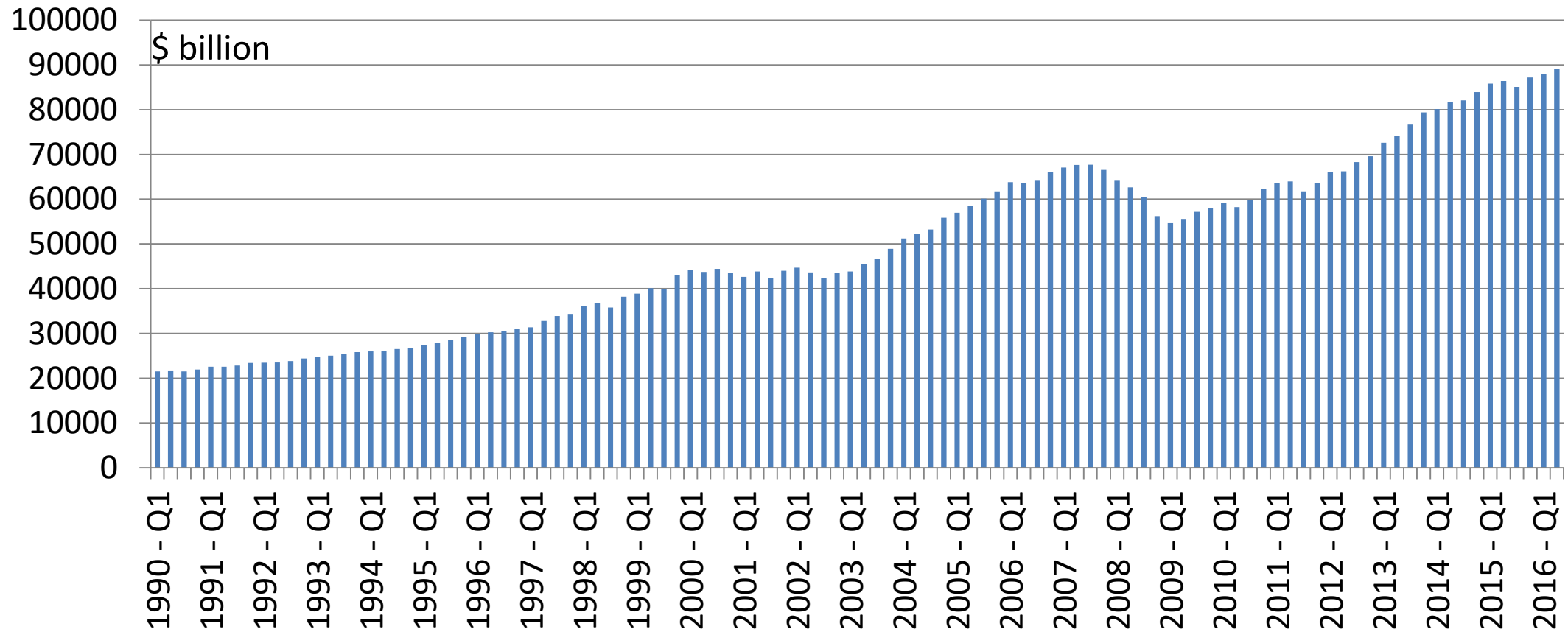
# Oil Prices – No Strong Relationship





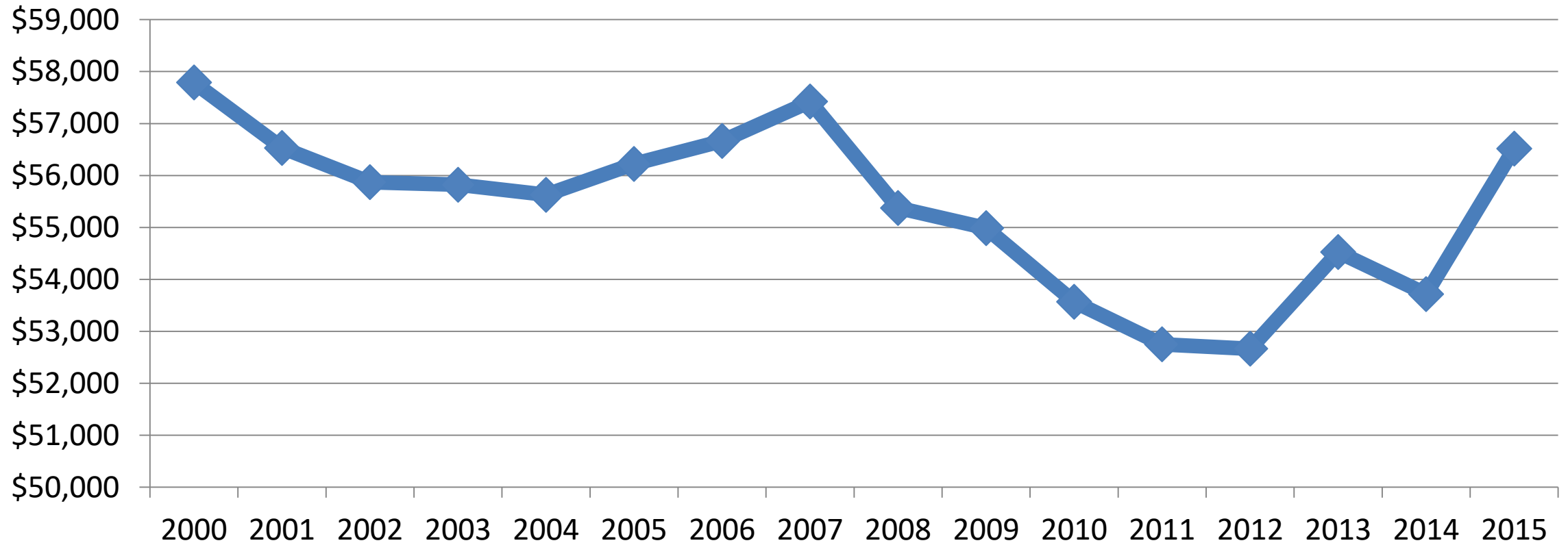
# Economy and Real Estate Trends and Forecast

# Lifetime Wealth at near All-Time High



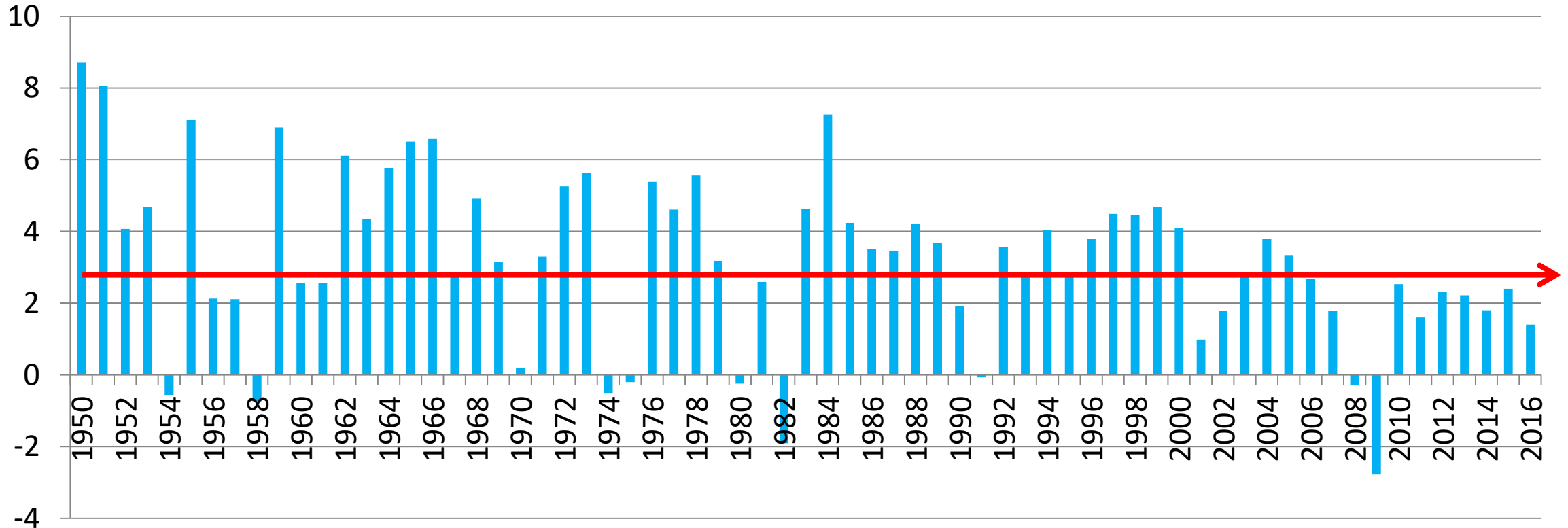
# Median Household Income

(Inflation Adjusted)



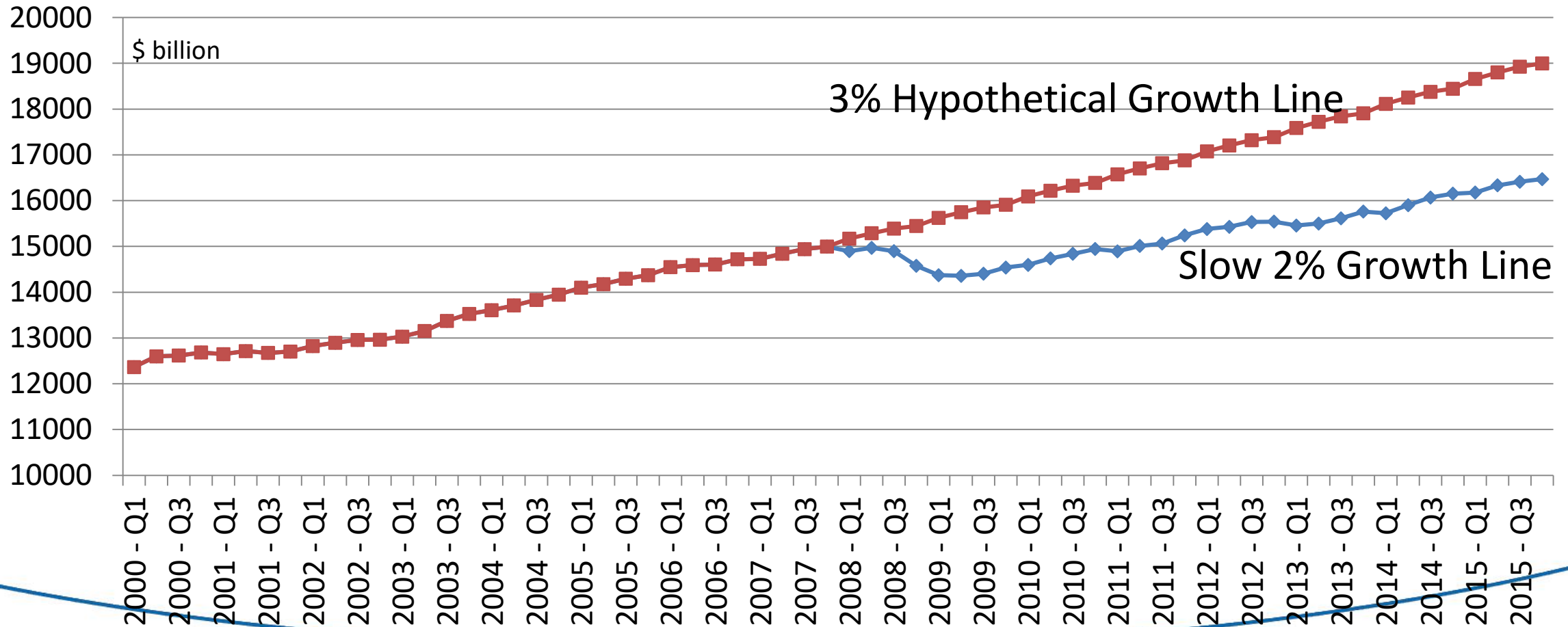
# Annual GDP ...

## Below 3% for 11 straight years

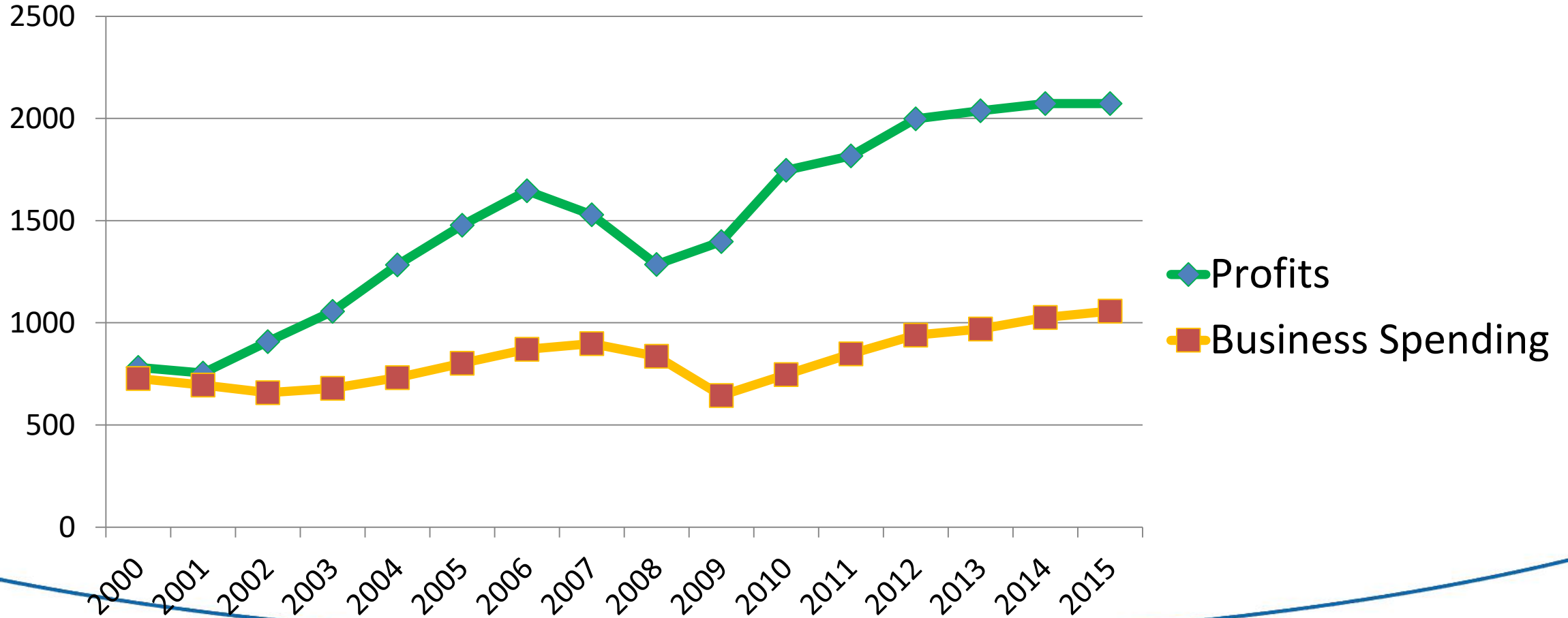


# Sluggish GDP and Gap after Recession

(\$2.5 trillion gap ... \$7,000 per person)

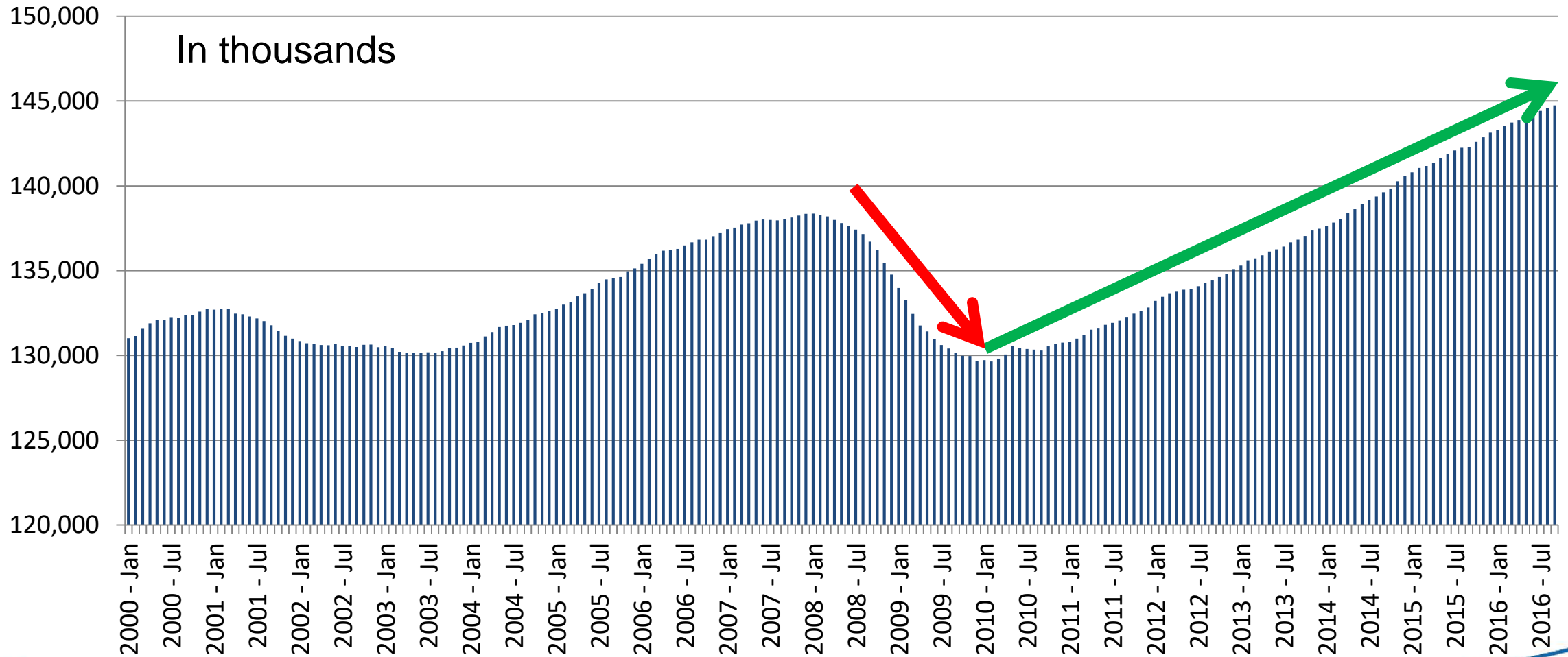


# Sluggish Business Spending Despite High Profit



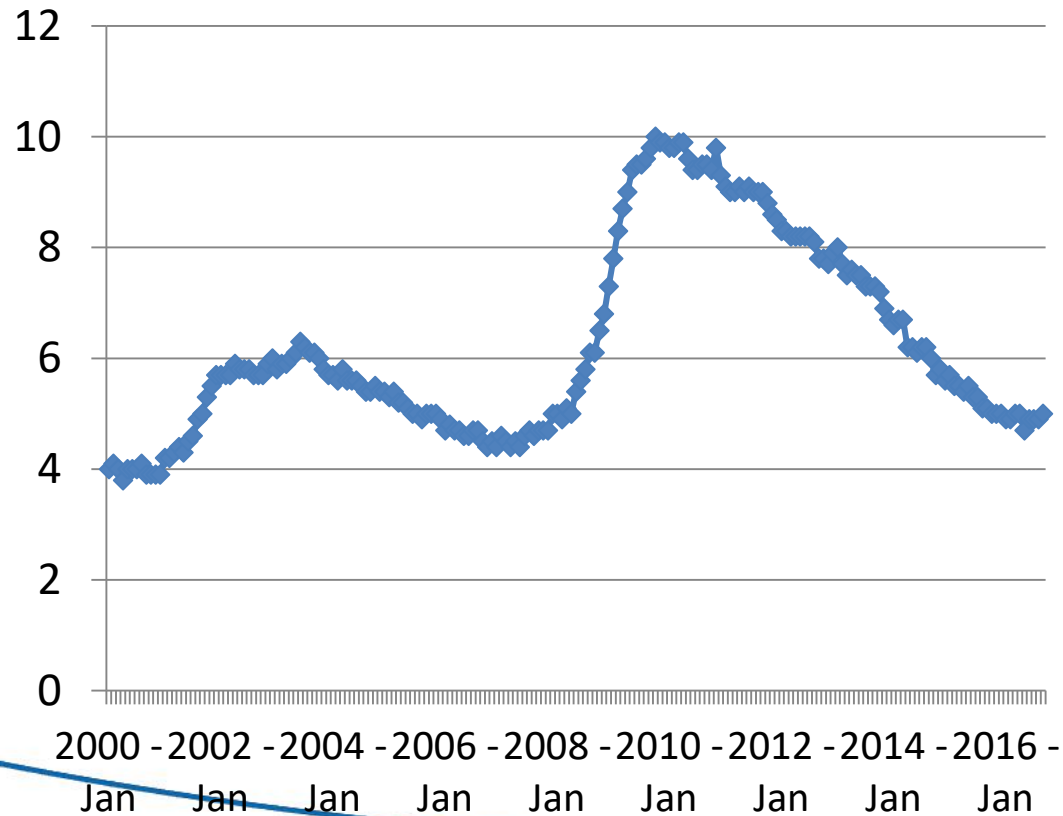
# Jobs

(8 million lost ... 15 million gained)

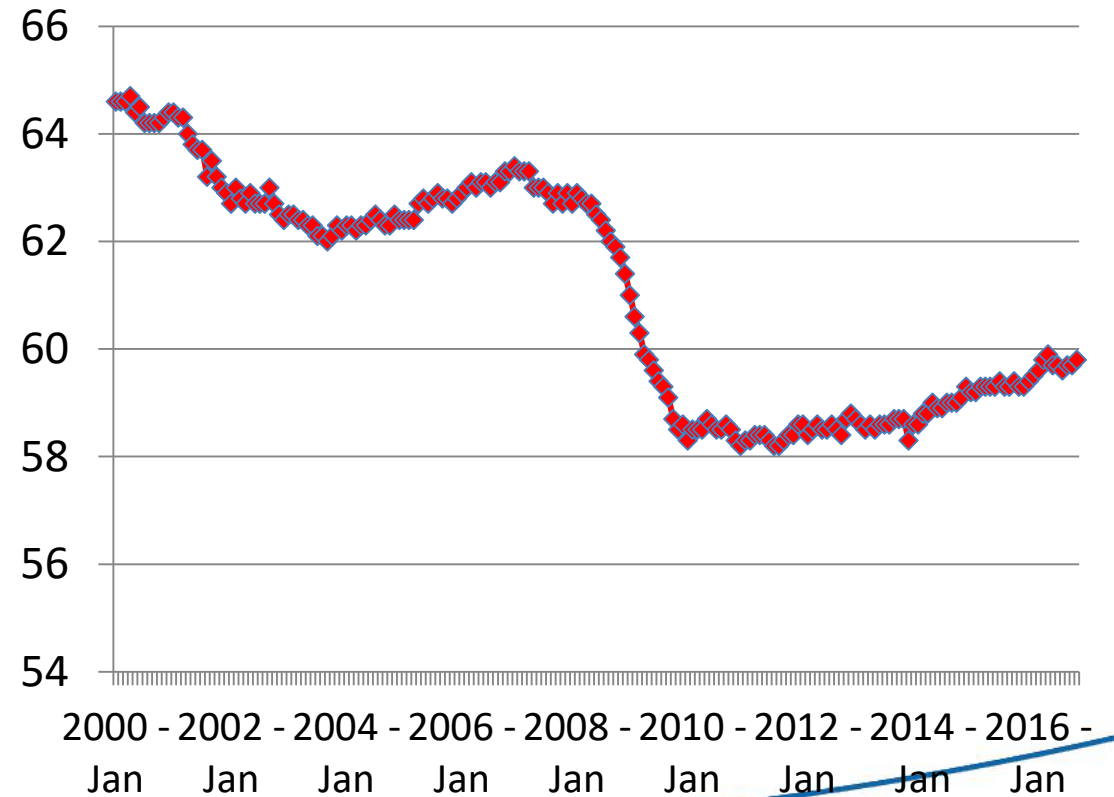


# Unemployment Rate vs. Employment Rate

## Unemployment Rate

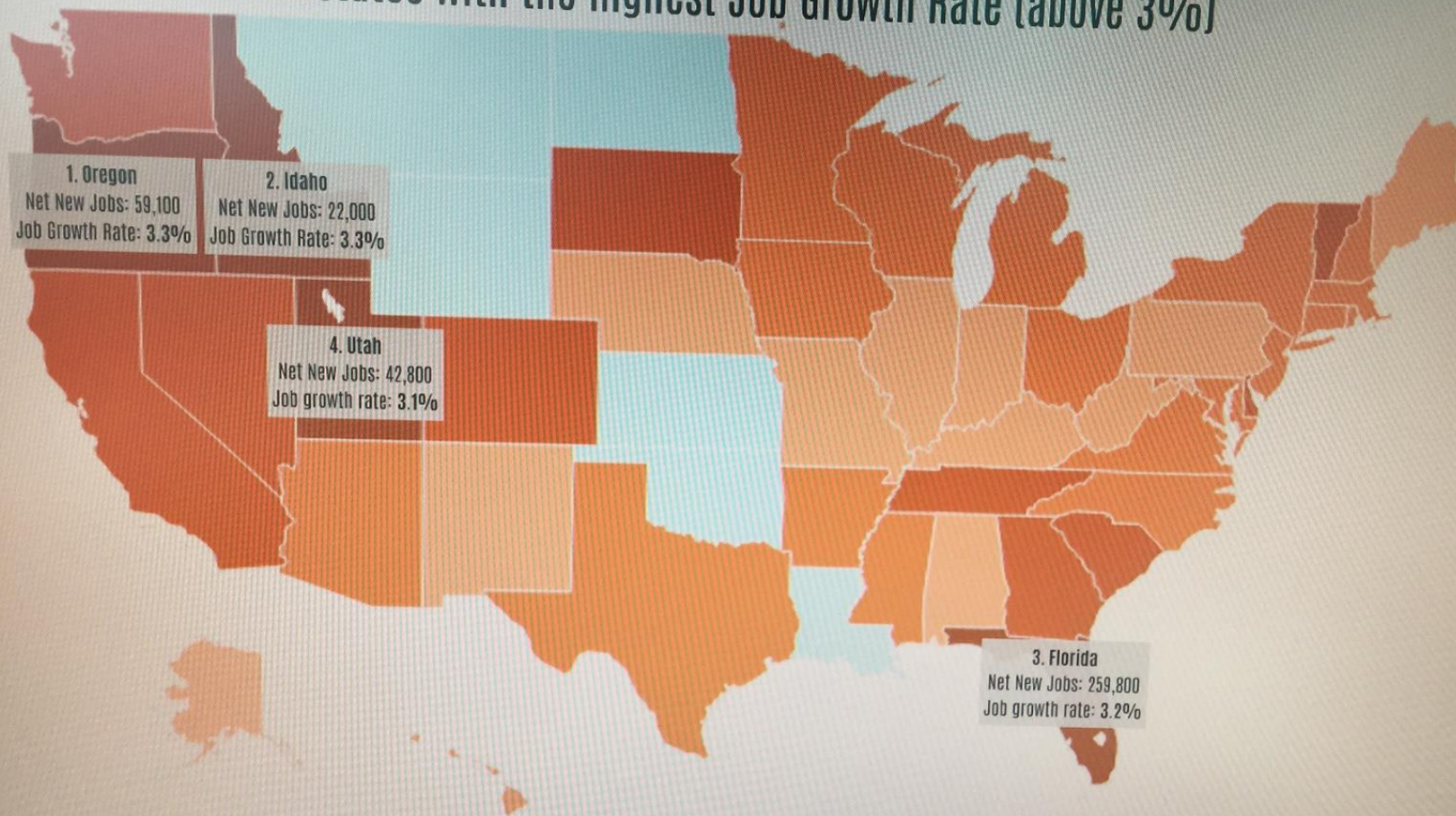


## Employment Rate

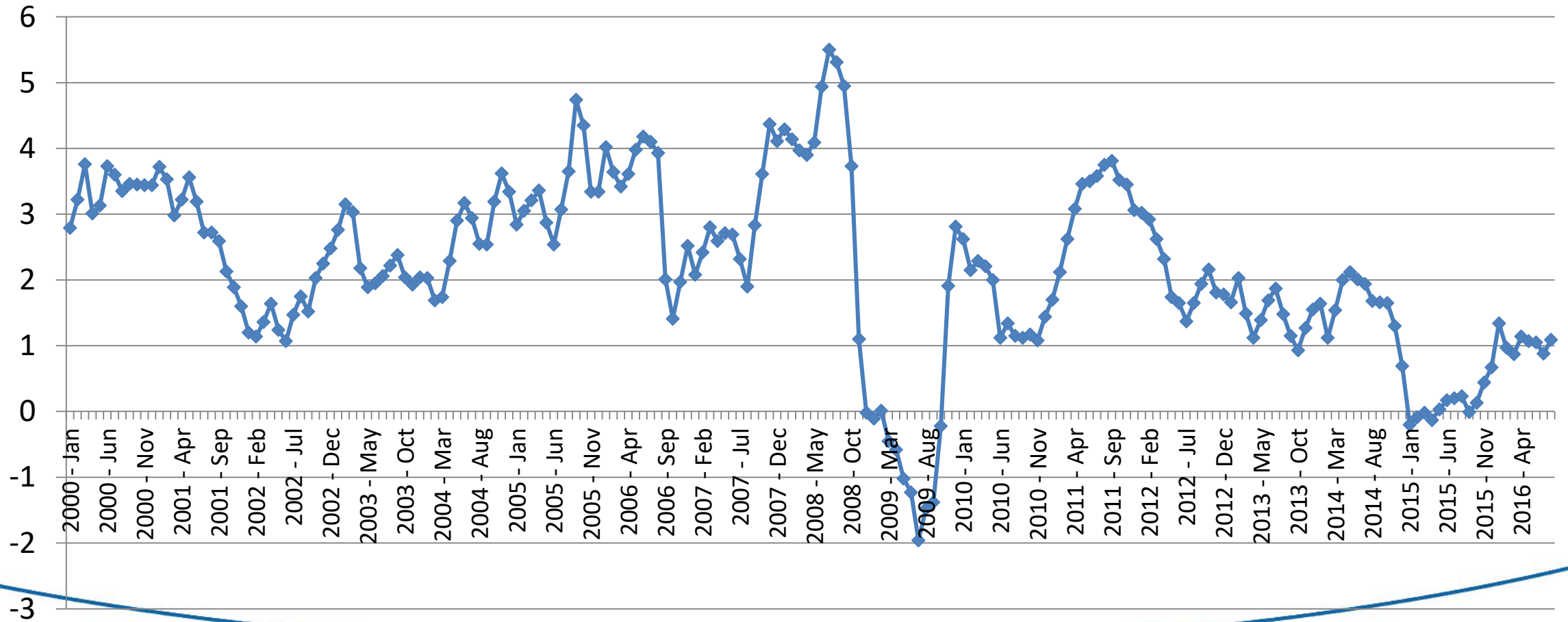




## States with the highest Job Growth Rate (above 3%)

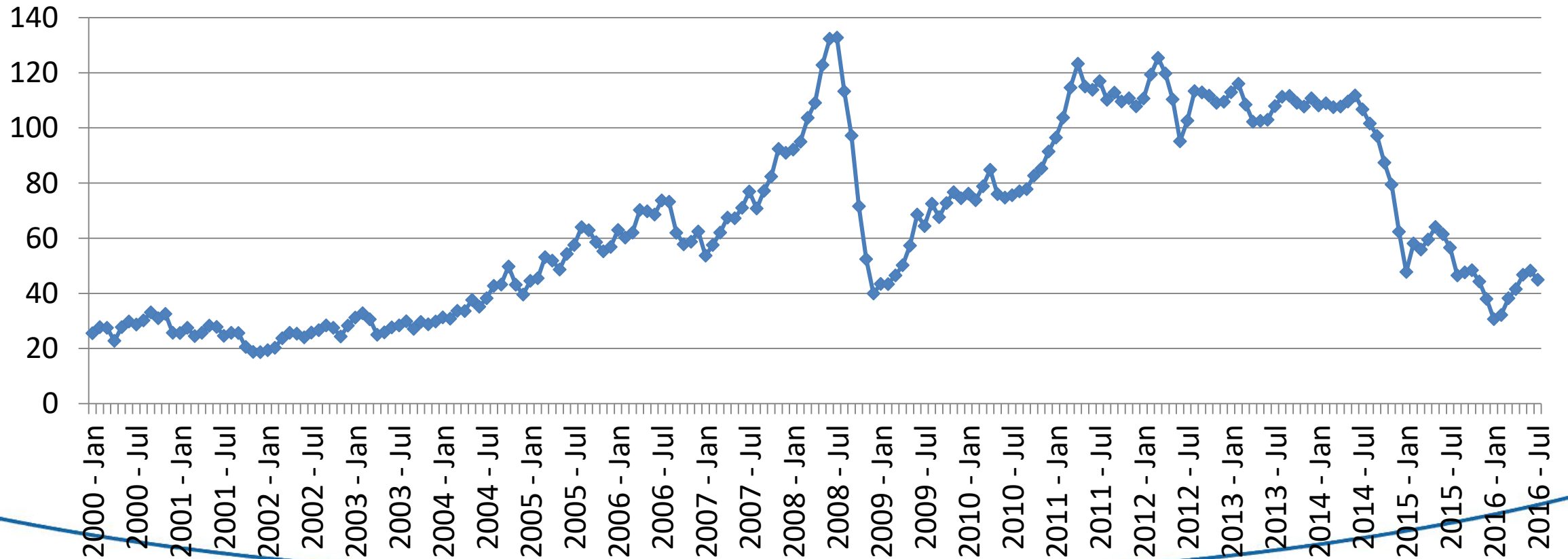


# No CPI Inflation – Yet



# Oil Price

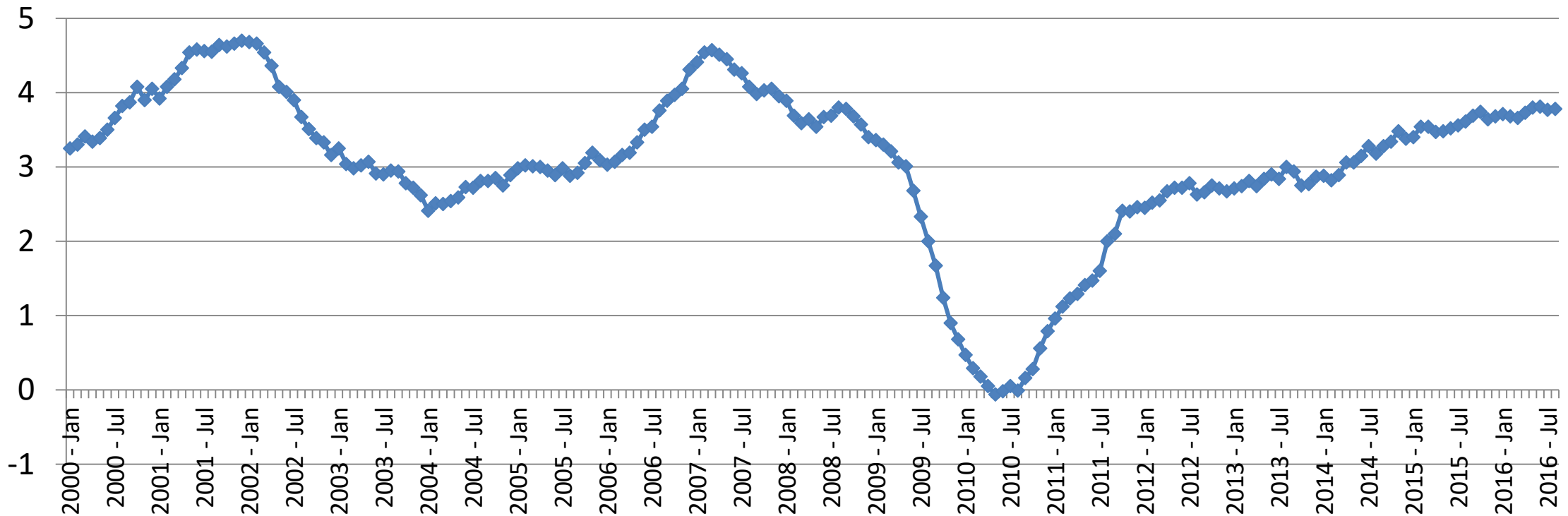
## Brent Crude



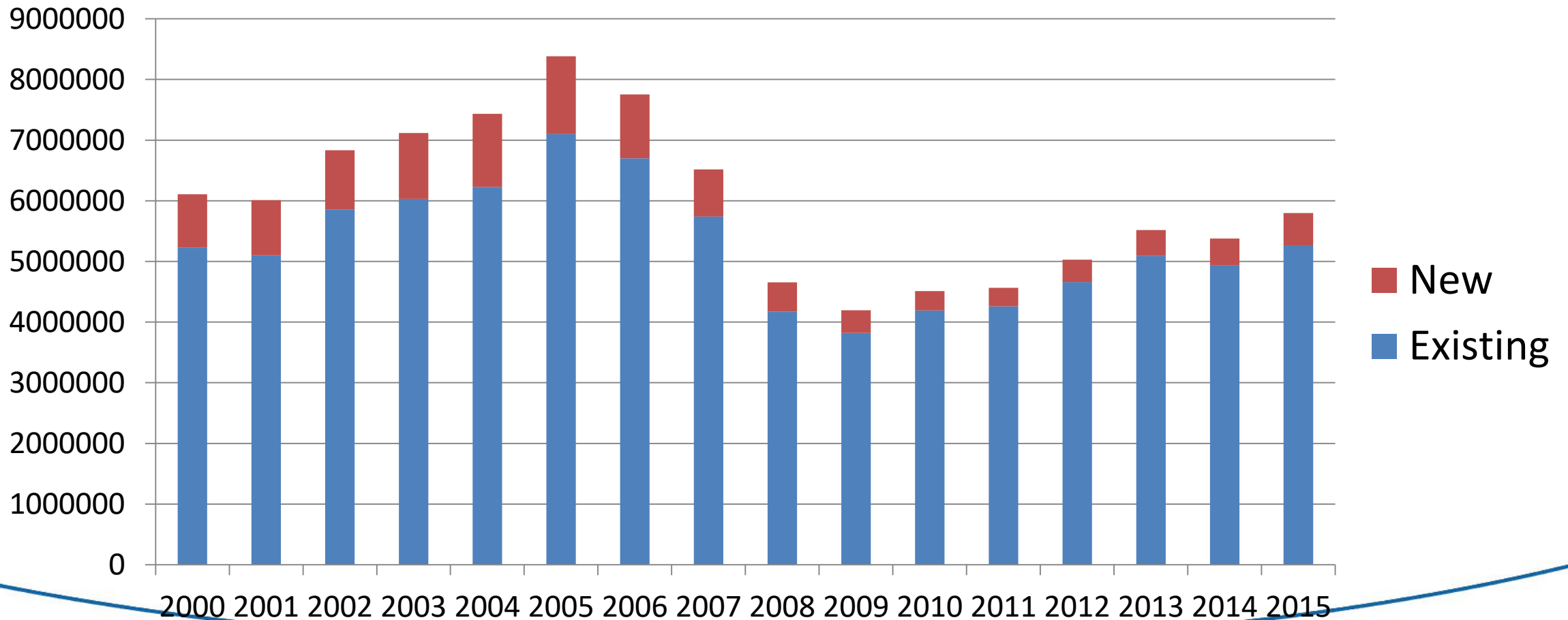
# Renting Painful

## Rents Rising at 7-year high

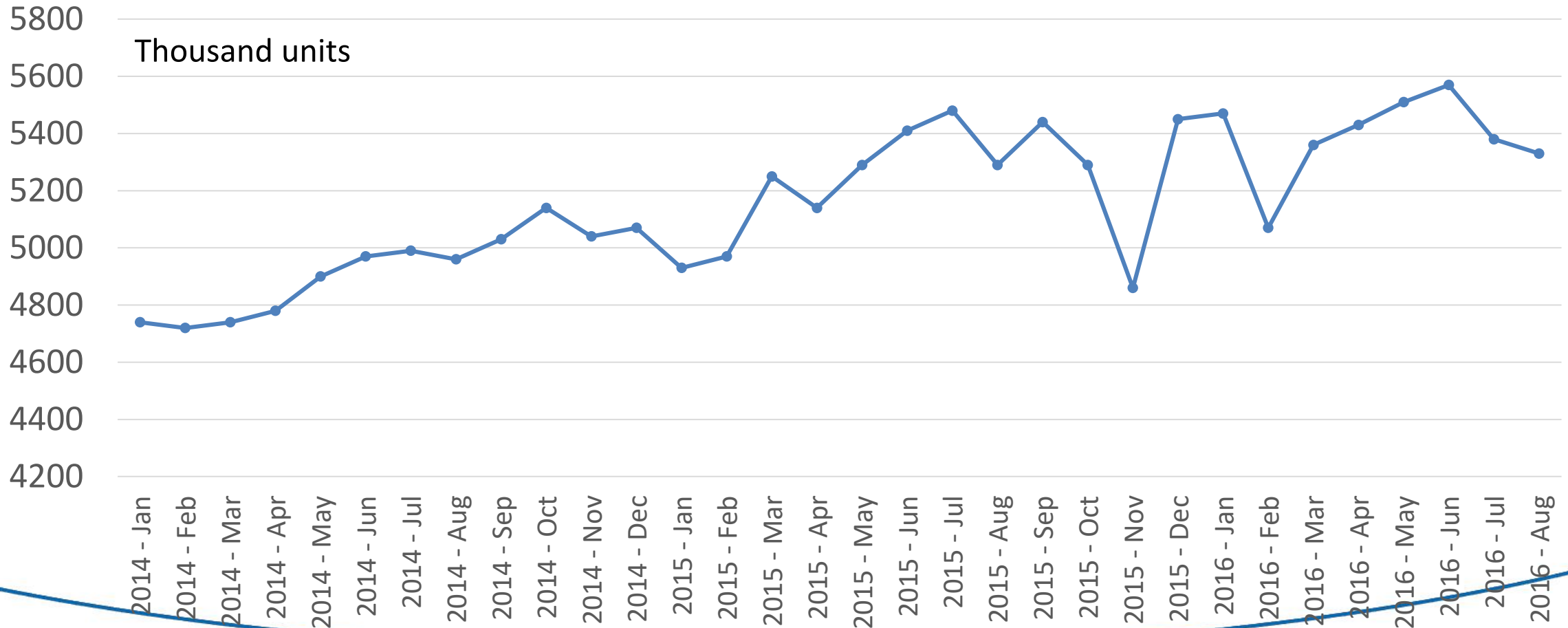
Renters' Rent



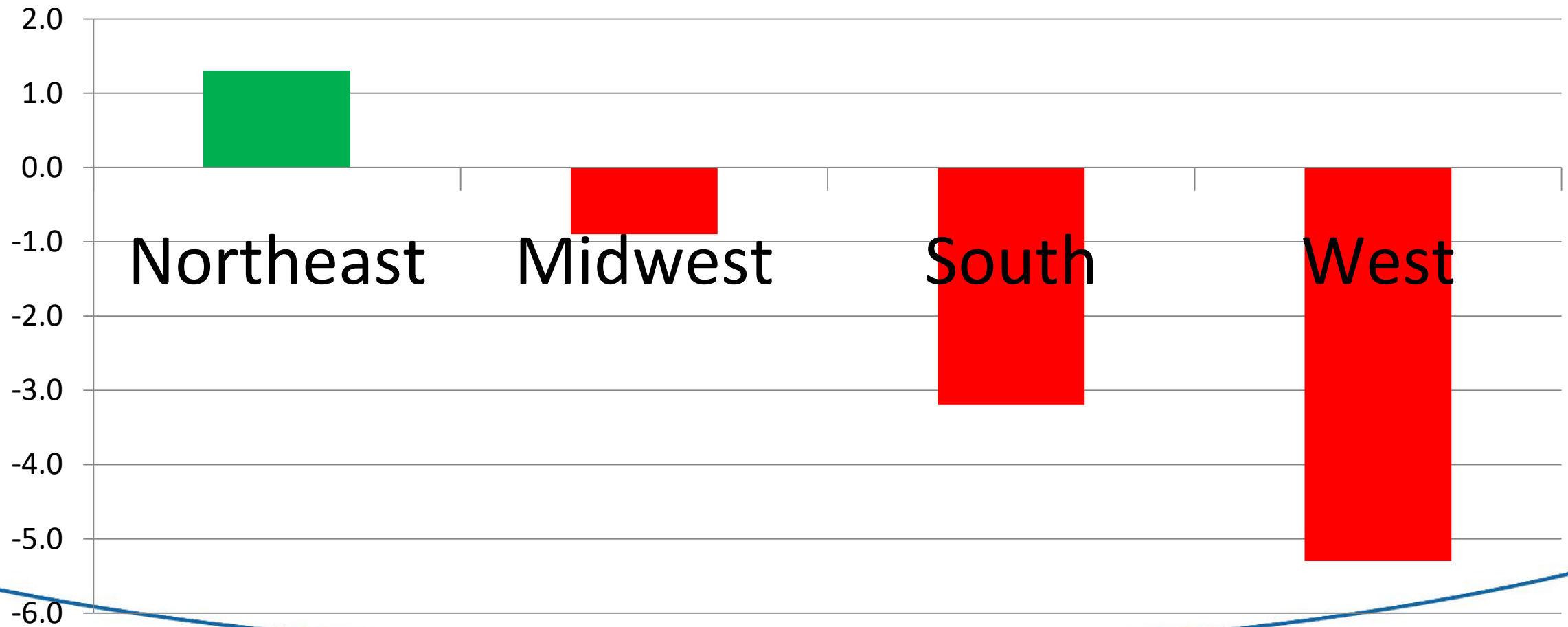
# Annual Home Sales



# Monthly Existing Home Sales

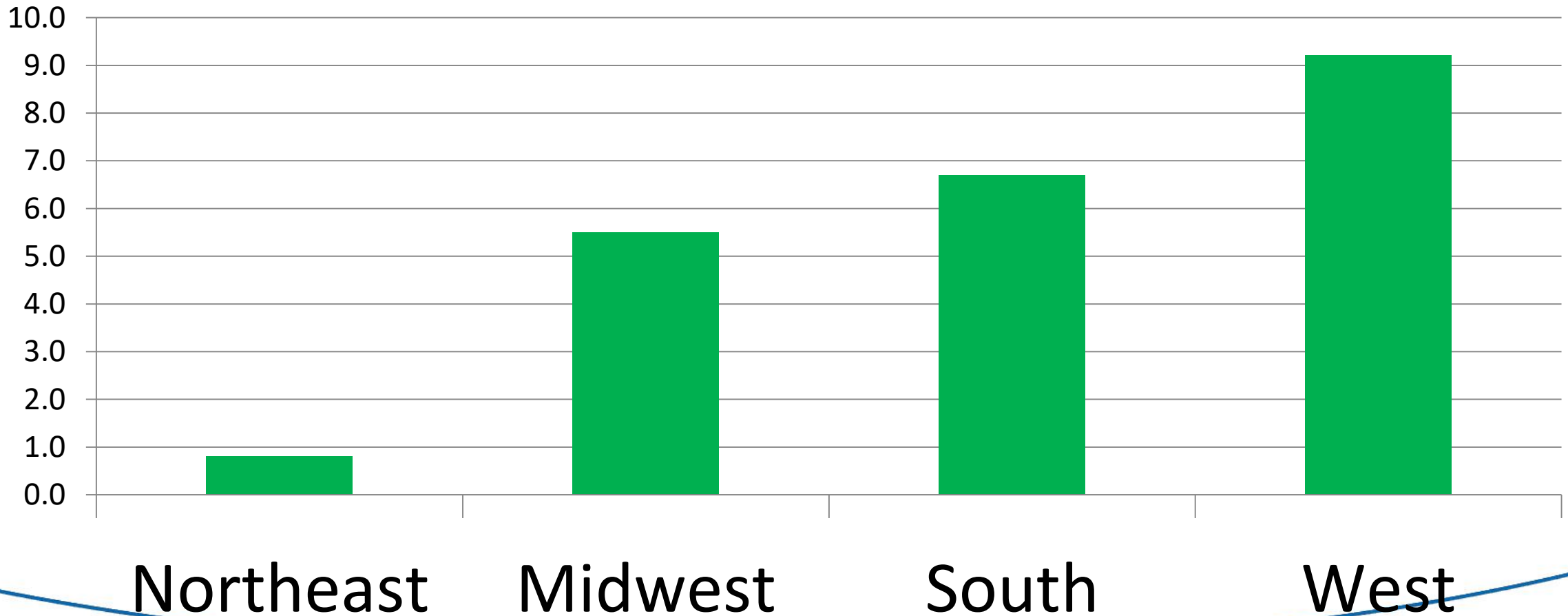


# Monthly % Change by Region



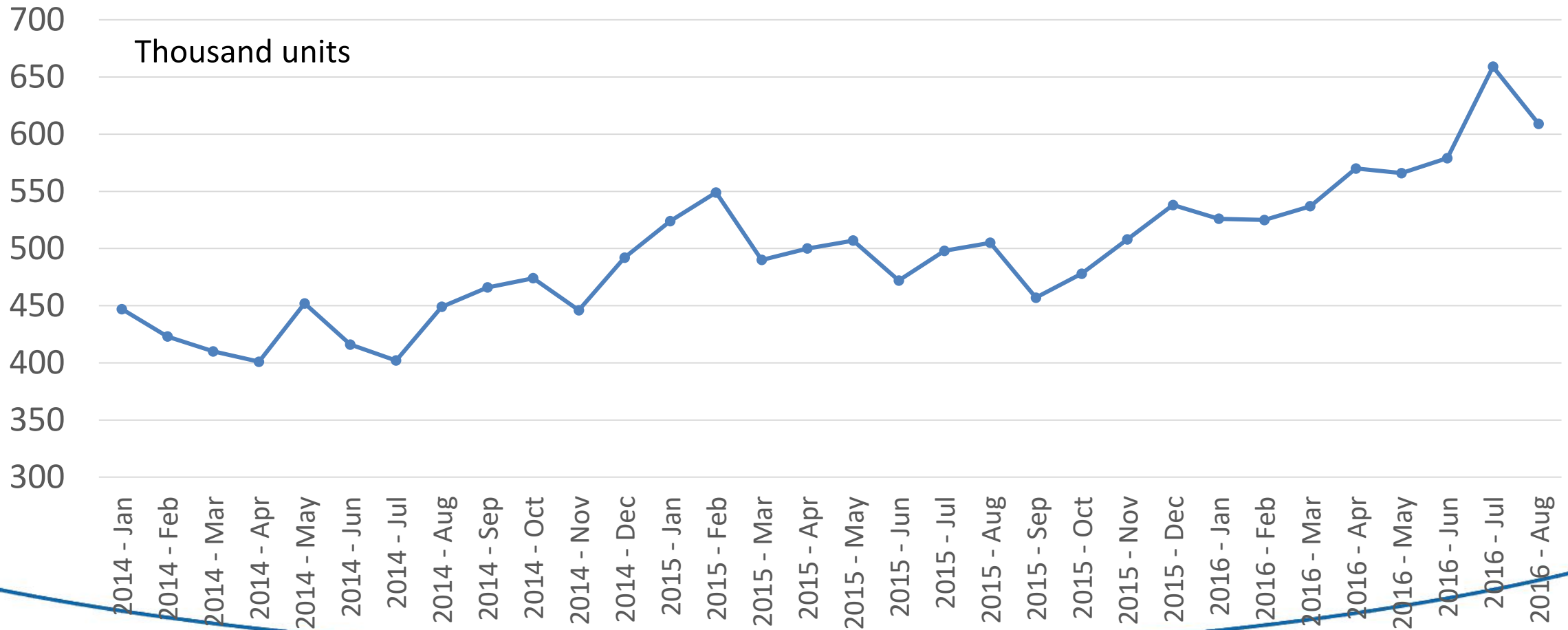
# Regional Price Growth

(% change from 12 months ago)

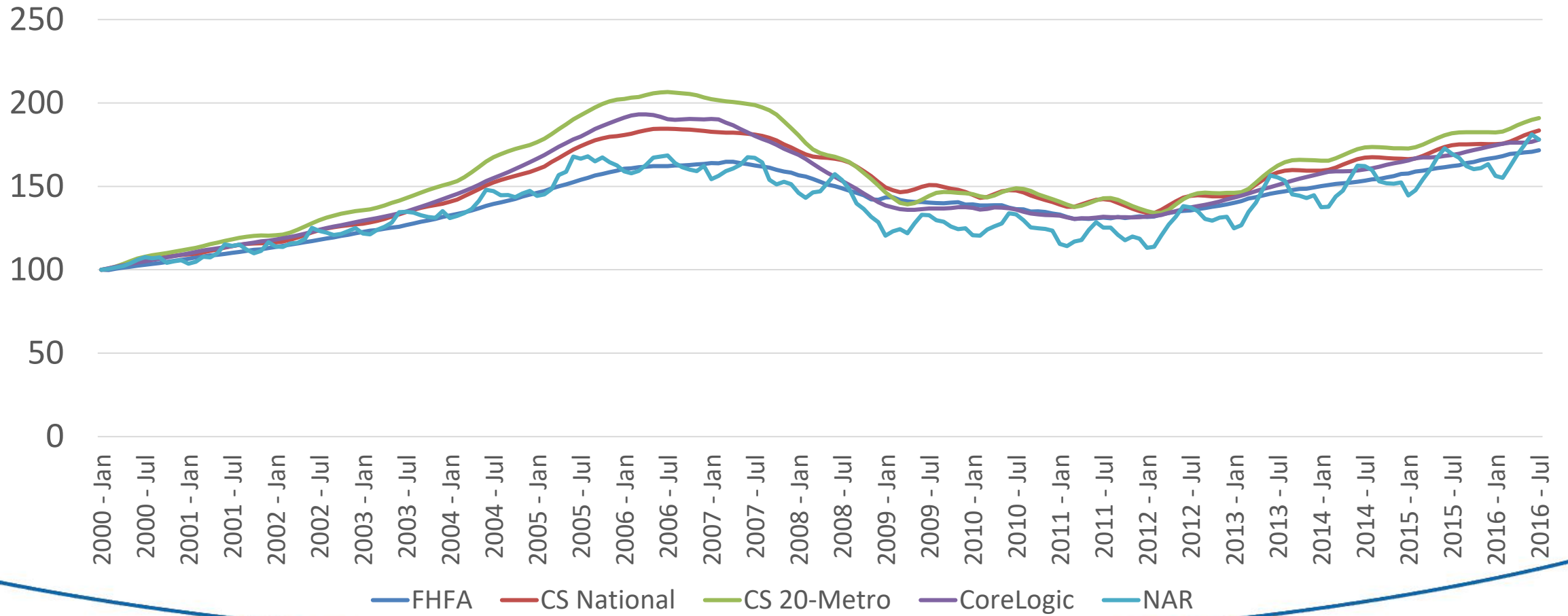




# Monthly New Home Sales



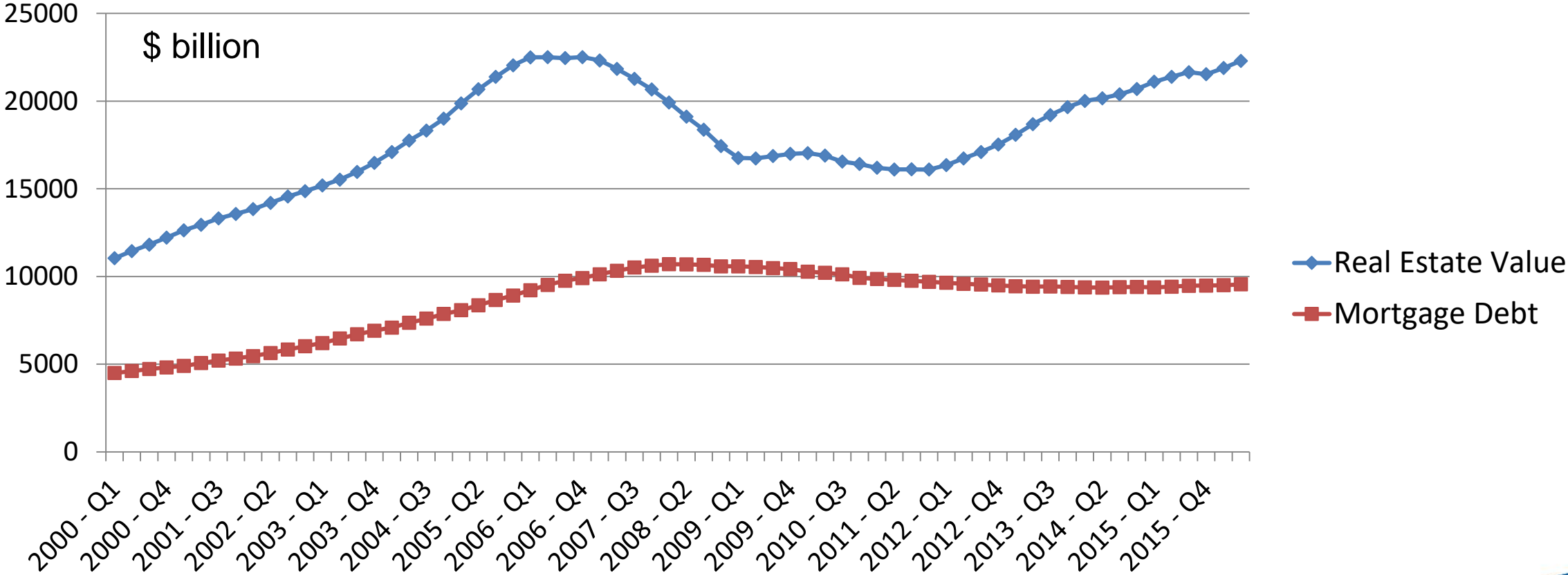
# National Home Prices



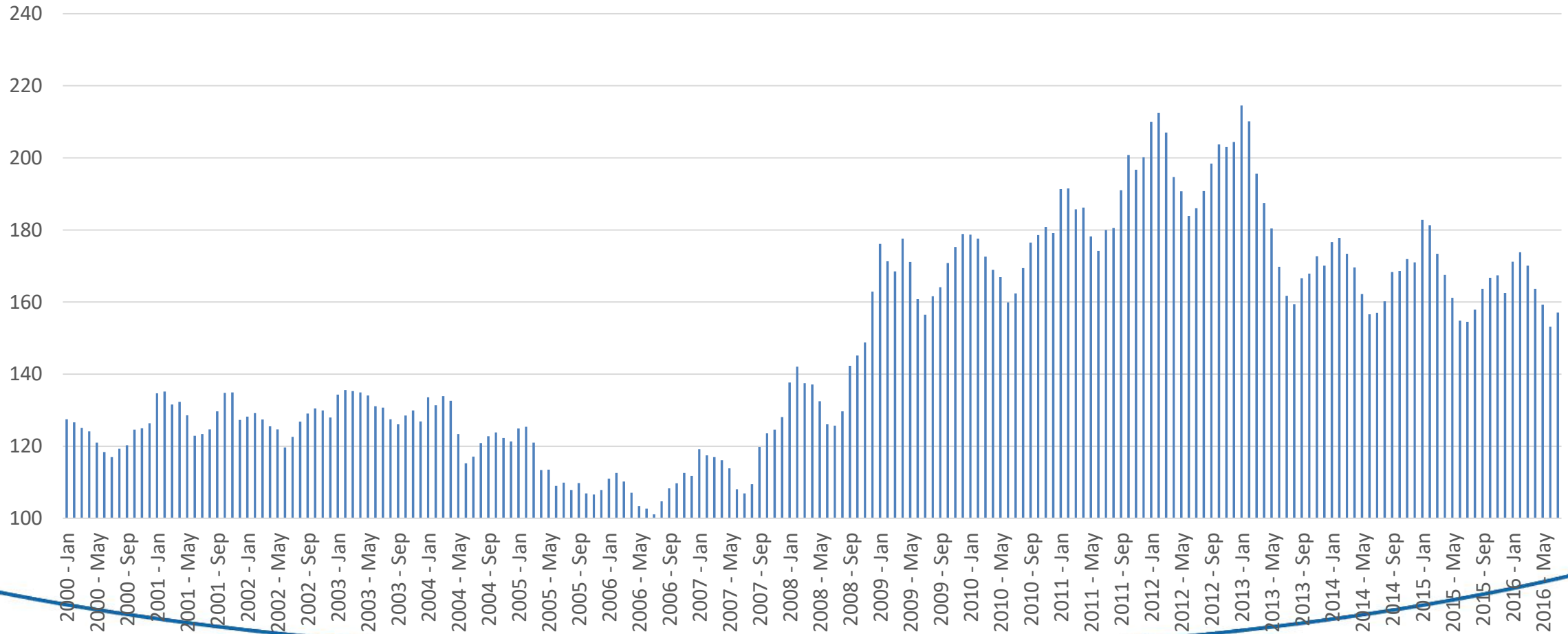
# Median Price



# Rising Home Price and Rising Housing Wealth

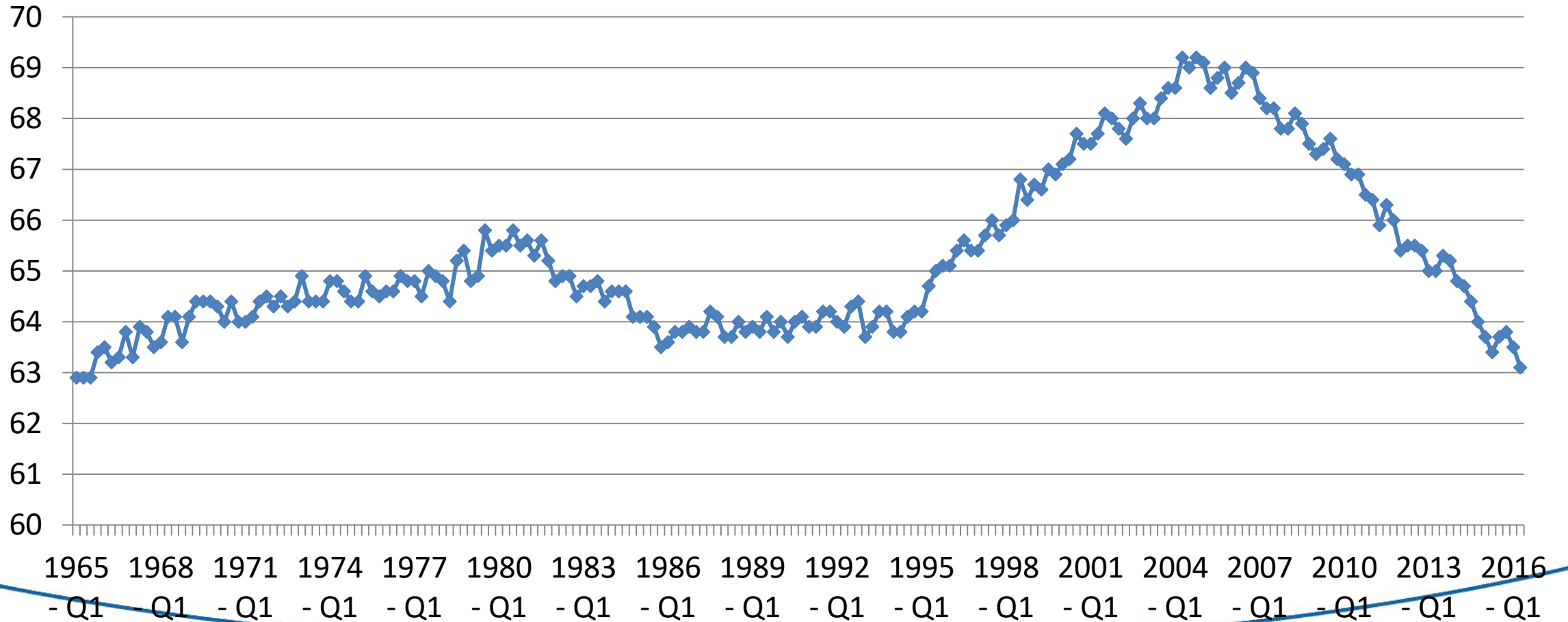


# Affordability Index

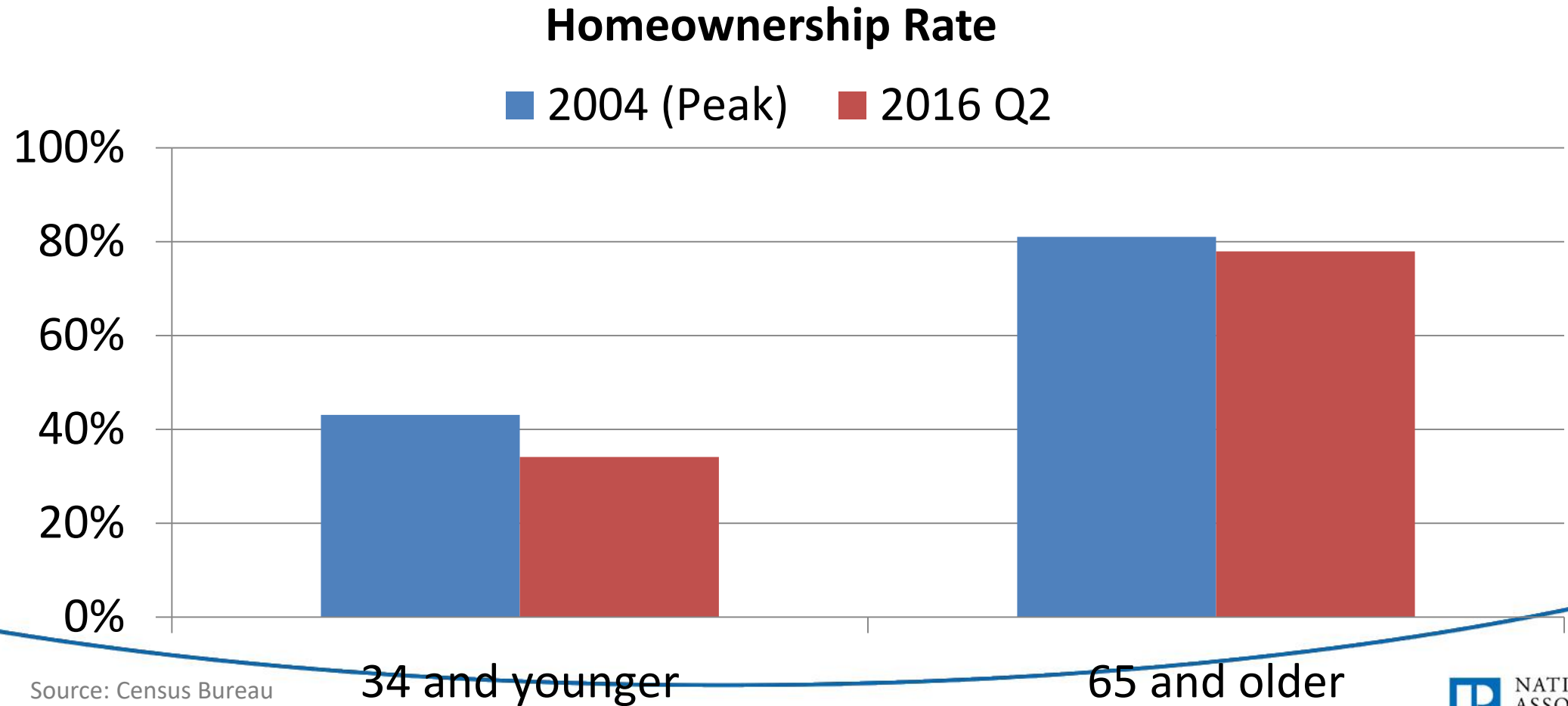


# Homeownership Rate

## Near 50-year low



# Younger Households Less Likely to Own a Home



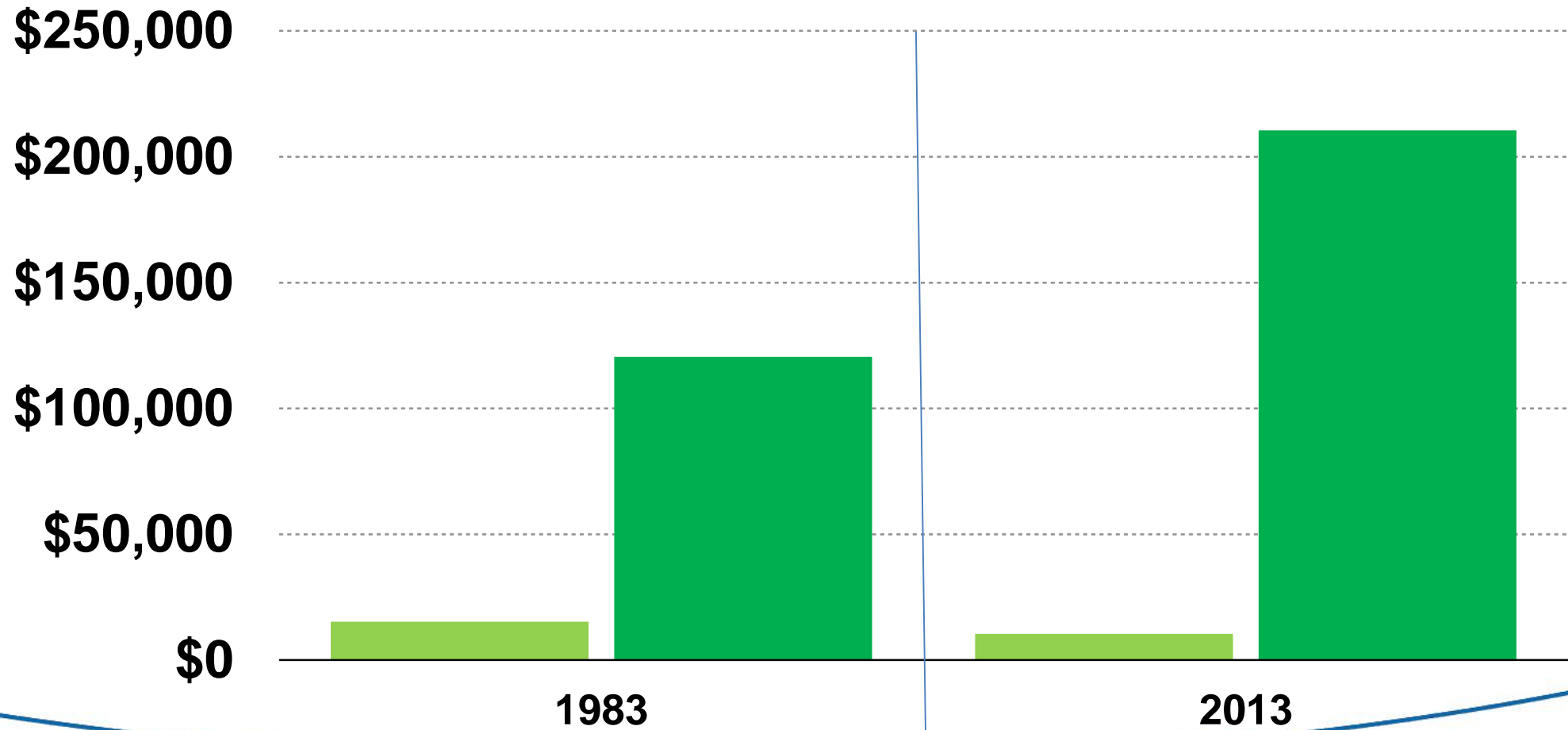
Source: Census Bureau

34 and younger

65 and older

# Wealth Gap Between Young Adults (under-35) and Retiree (65+) in 1983 and 2013

Median net worth of households headed by...

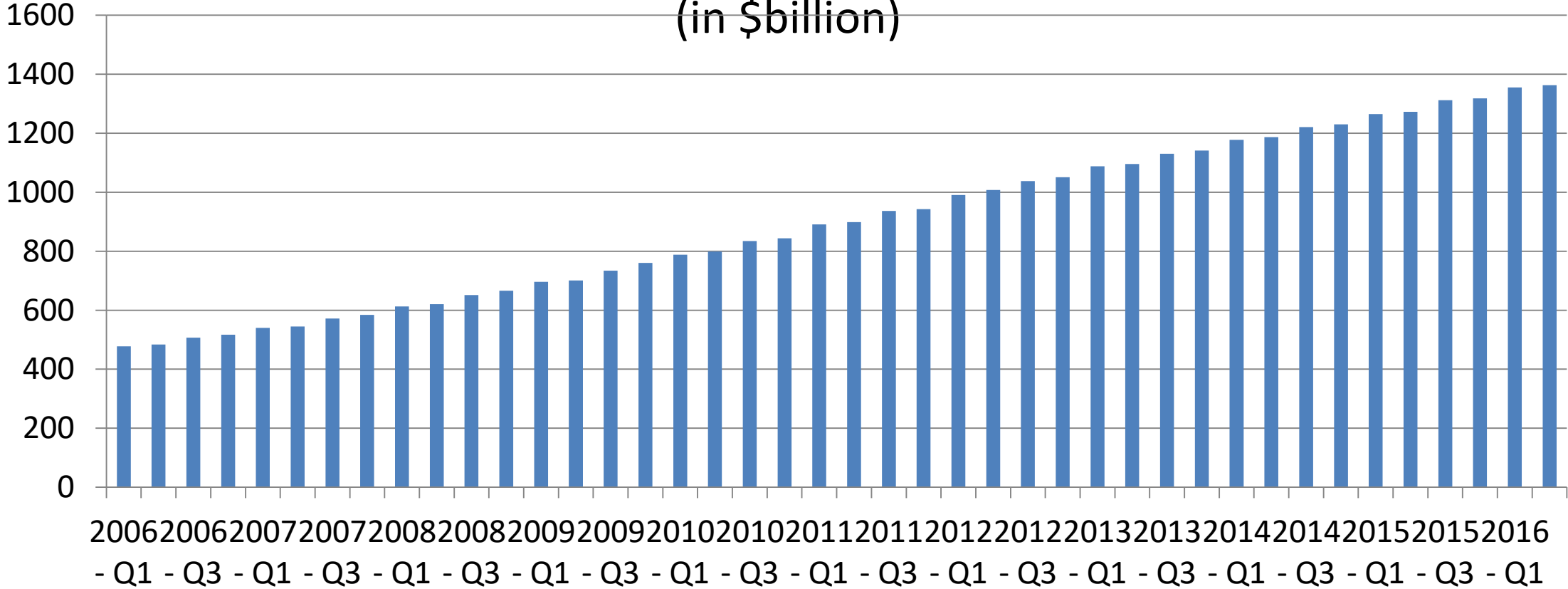




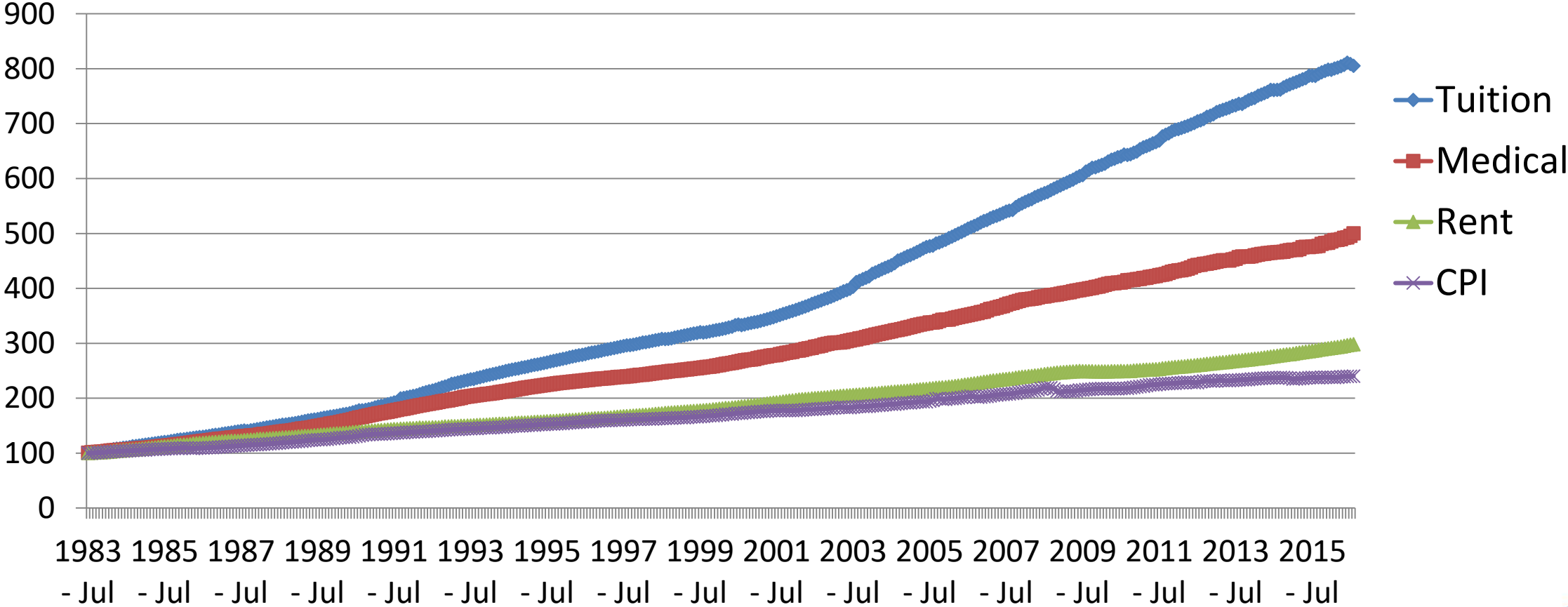
# Student Loan ...

## NAR-ASA Study implies 5 year Delay

(in \$billion)



# Consumer Price Index over the Long Haul (Rental Income > CPI by 25%)

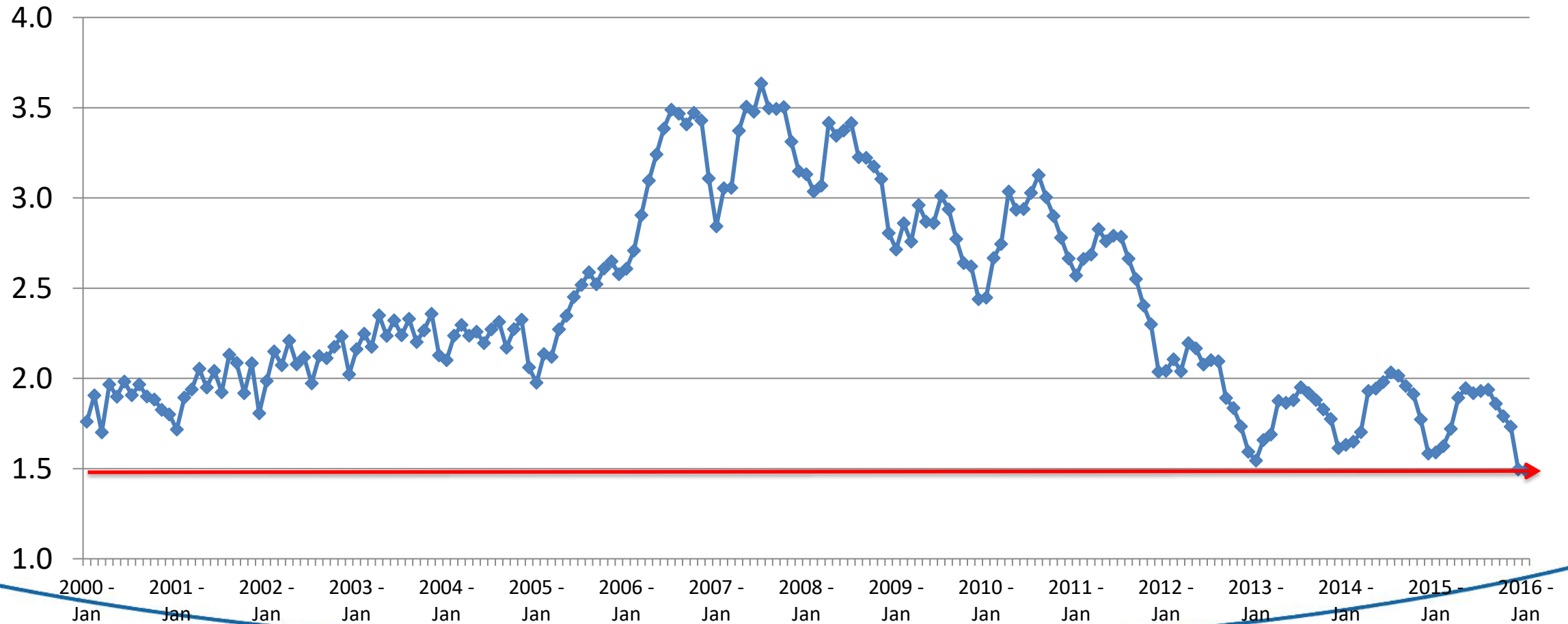


# Social Benefits to Homeownership

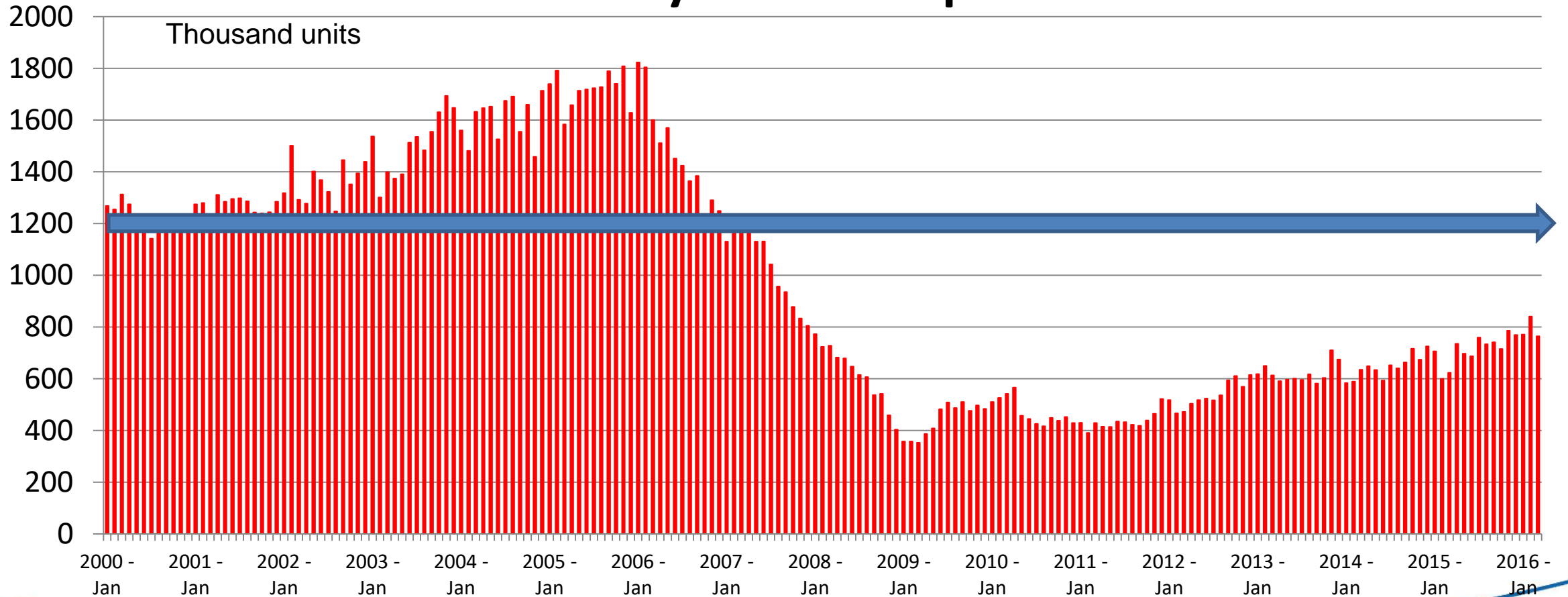
- Higher student test score
- Lower juvenile delinquency rate
- Better health outcome and higher self-esteem from having a sense of control in life
- Increased charitable donations and volunteering
- Local civic engagement
  
- Terrible social results if foreclosure ... therefore need sustainable homeownership

# Inventory of Homes per Households

(currently 1.5 homes for 100 households)

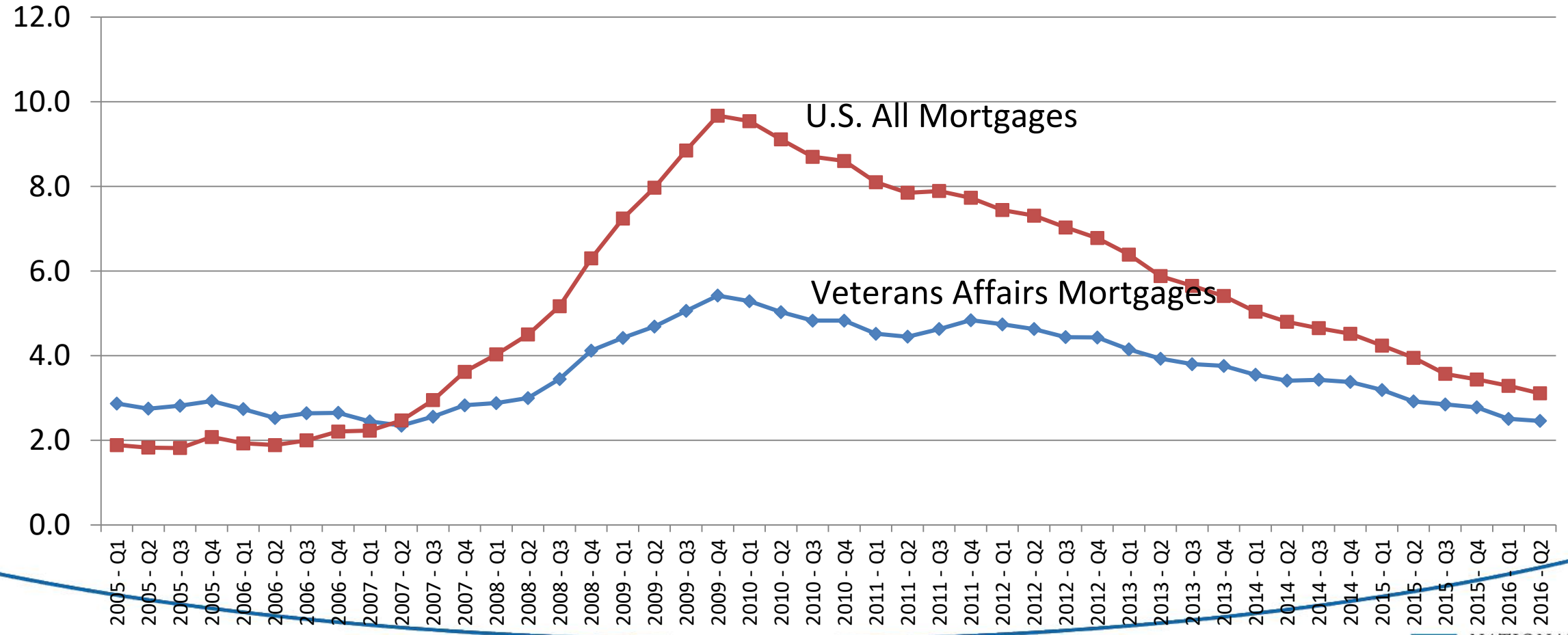


# Single-family Housing Starts – Grossly Inadequate

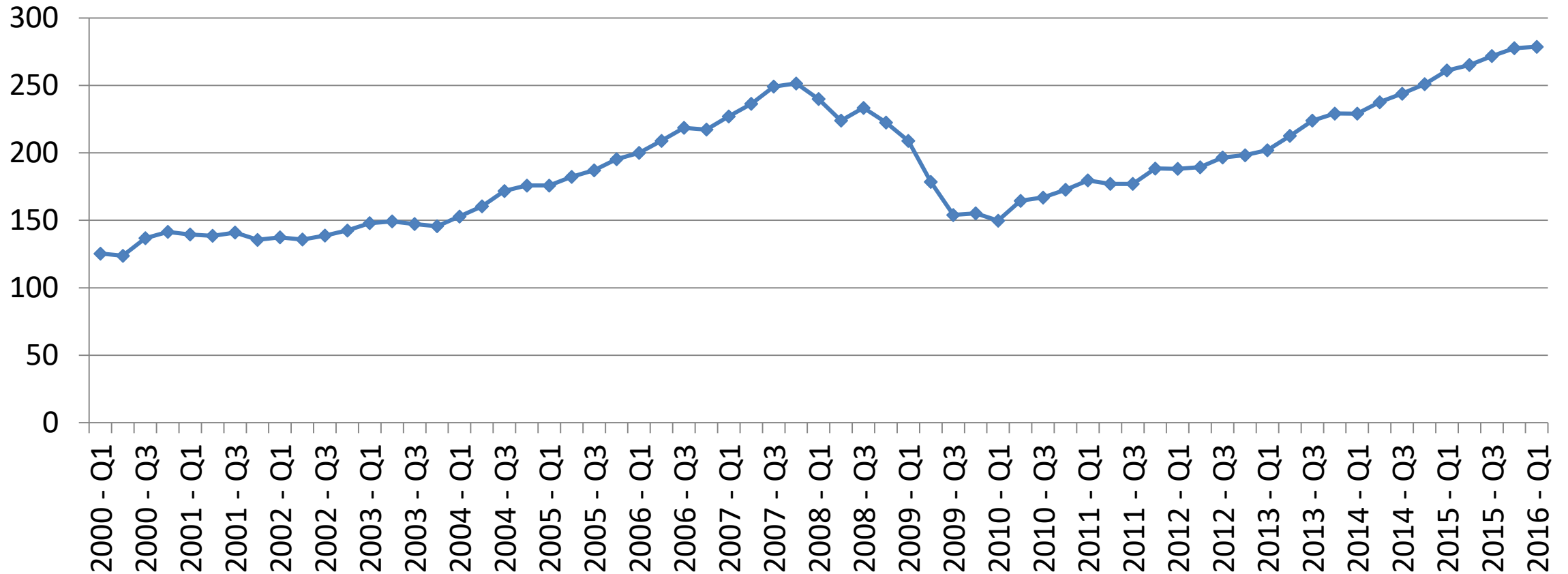


# Borrowers Not Defaulting

## (Serious Delinquency Rate)



# Commercial Property Price may be Bubblish



Source: Federal Reserve

# Rising Cap Rates and Commercial Real Estate Prices

- Steady prices in mid-tier markets
- Price drops in trophy properties
  - Green Street price index could fall 4% to 8% over the next two years



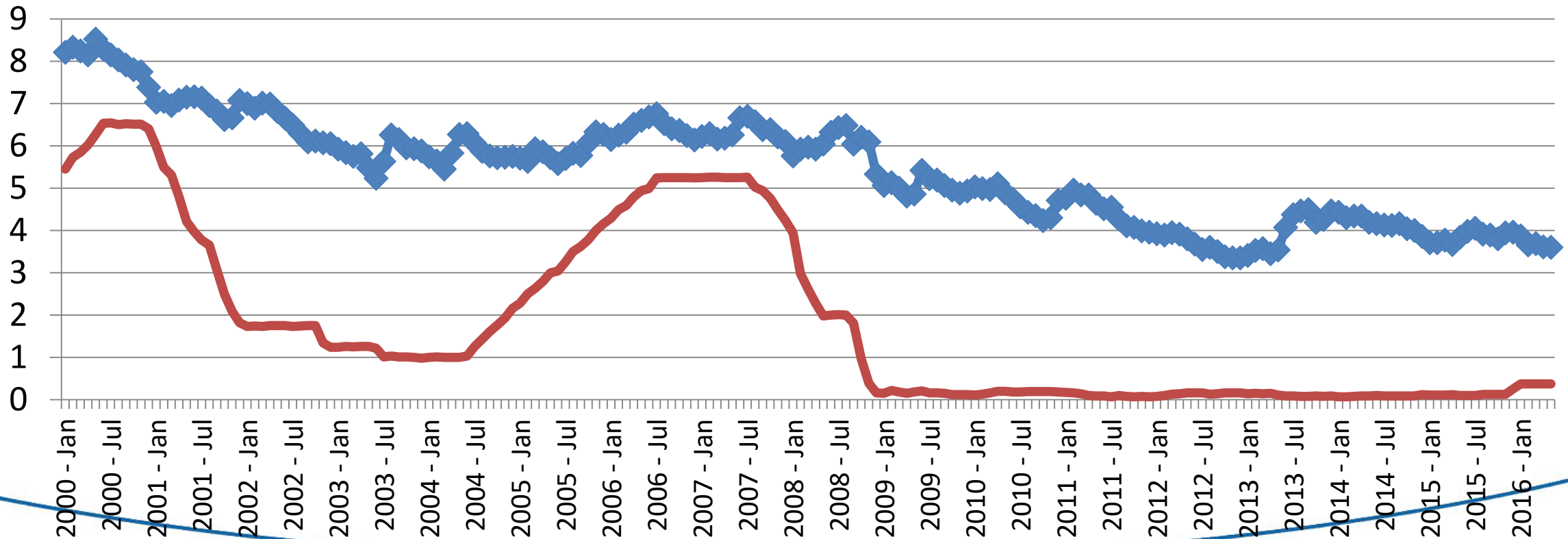
Fed Rate Hike in December '15

Next hike in December '16?

then again in ...

# Fed Policy and Mortgage Rate

◆ Mortgage Rate    — Fed Funds Rate

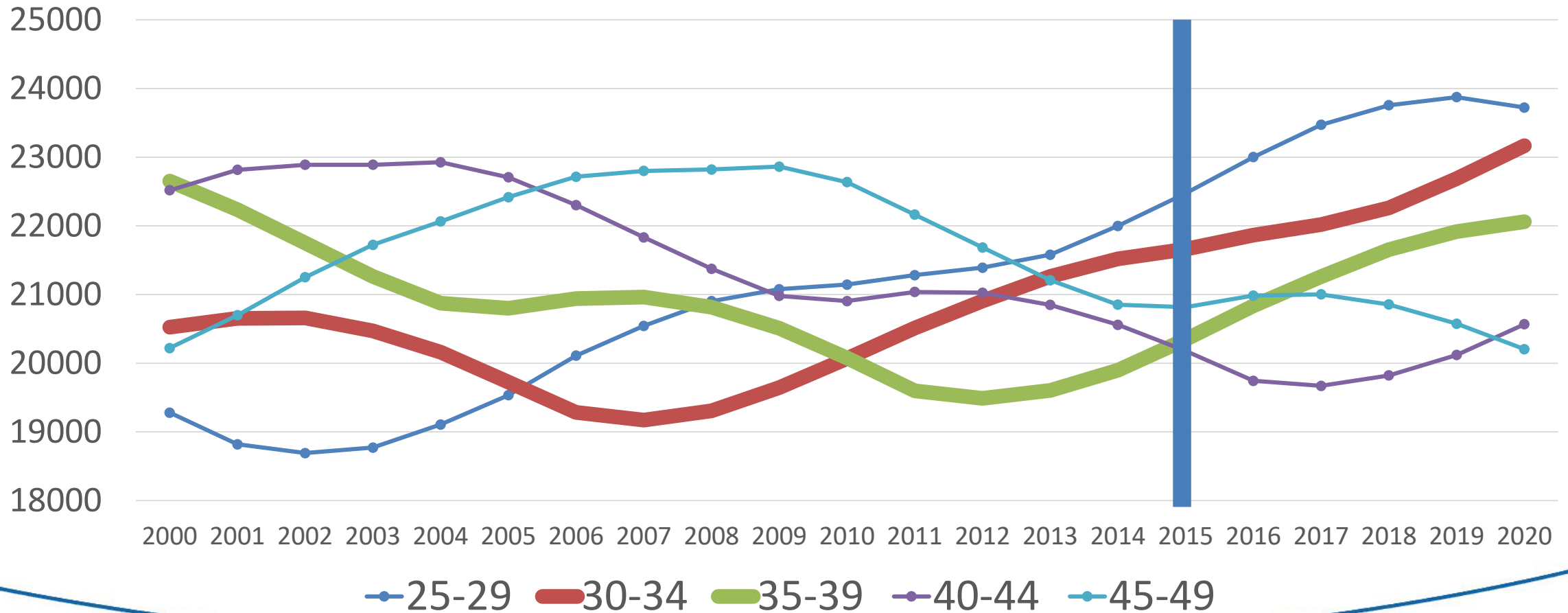


# Forecast

# Normal vs. Now

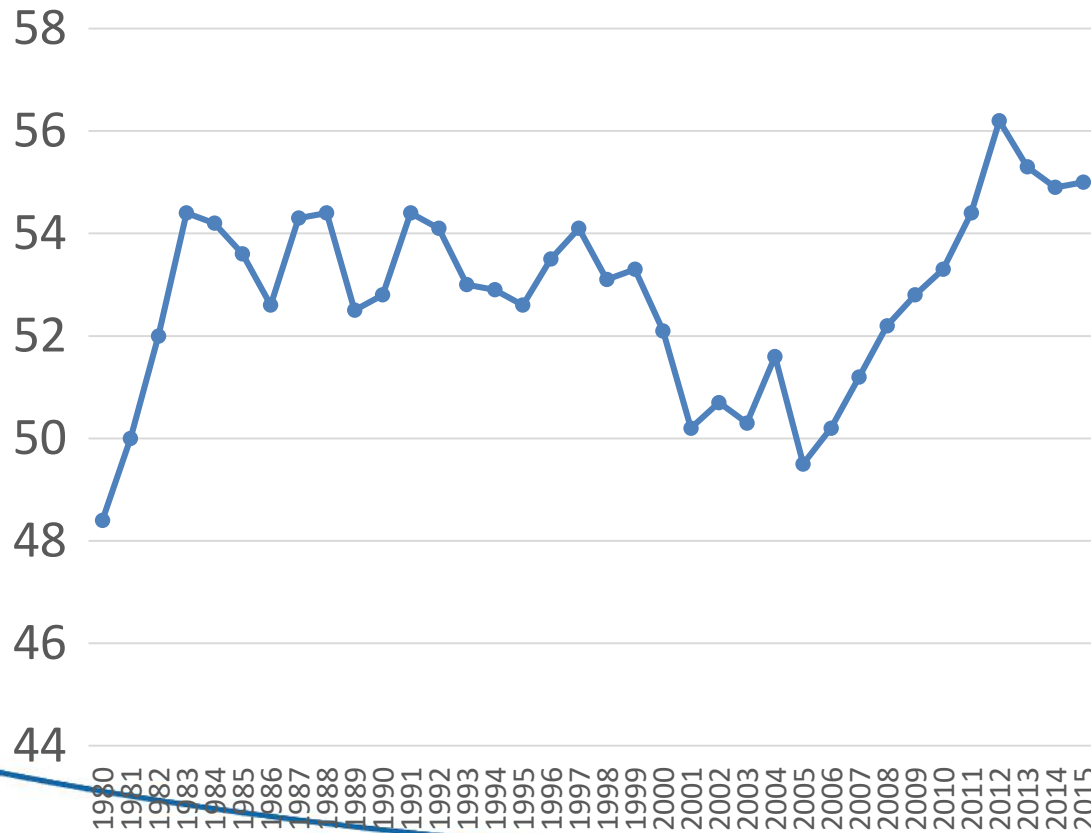
|                             | 2000 (Likely Normal) | 2015          |
|-----------------------------|----------------------|---------------|
| Existing Home Sales         | 5.2 million          | 5.2 million   |
| New Home Sales              | 900,000              | 500,000       |
| Population                  | 282 million          | 320 million   |
| Jobs                        | 132 million          | 144 million   |
| Total U.S. Household Wealth | \$44 trillion        | \$85 trillion |

# Age Composition (Rising # of First-time Buyers)

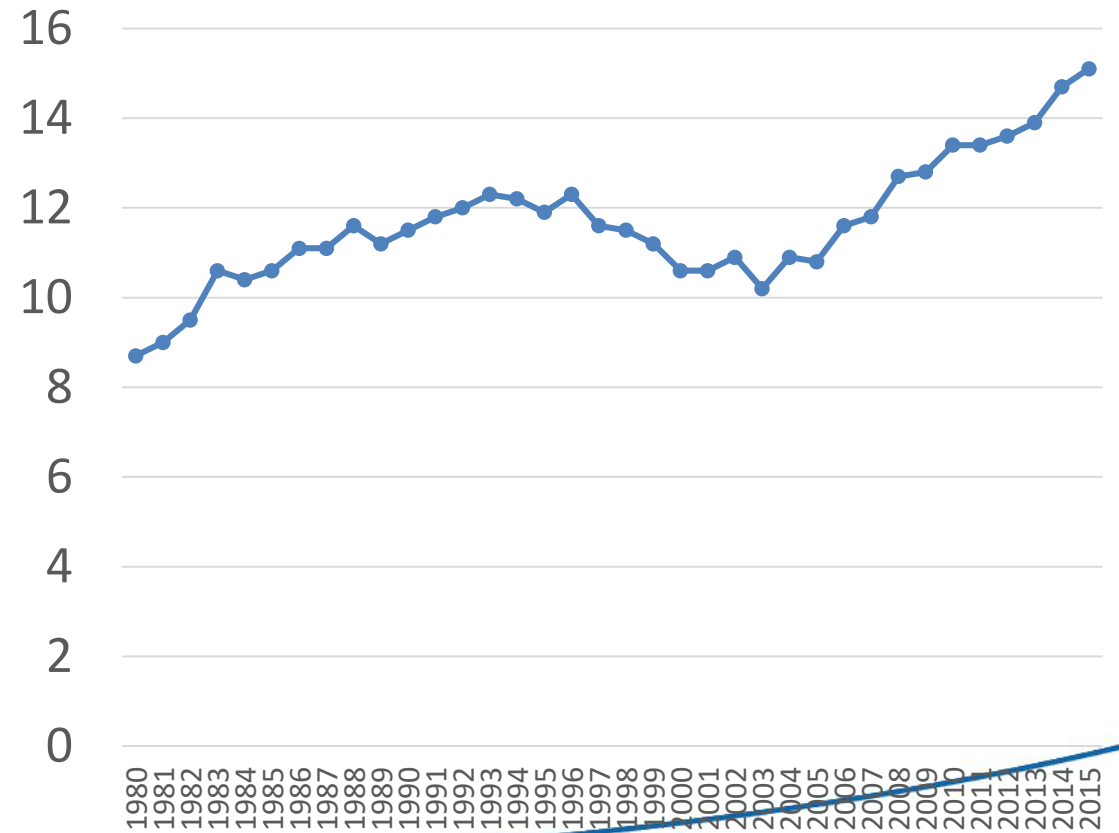


# Percentage Living with Mom

## 18-25



## 26-35



# Economic Forecast

|               | 2014            | 2015            | 2016<br>Forecast | 2017<br>Forecast | 2018<br>Forecast |
|---------------|-----------------|-----------------|------------------|------------------|------------------|
| GDP Growth    | 2.6%            | 2.1%            | 1.6%             | 2.2%             | 2.5%             |
| Job Growth    | +3.0<br>million | +2.6<br>million | +2.0<br>million  | +2.2<br>million  | +2.2<br>million  |
| CPI Inflation | 1.6%            | 0.3%            | 1.4%             | 2.7%             | 2.5%             |

# Housing Forecast

|                     | 2014        | 2015        | 2016 Forecast | 2017 Forecast | 2018 Forecast |
|---------------------|-------------|-------------|---------------|---------------|---------------|
| New Home Sales      | 437,000     | 500,000     | 540,000       | 600,000       | 700,000       |
| Existing Home Sales | 4.9 million | 5.3 million | 5.4 million   | 5.5 million   | 5.7 million   |
| Median Price Growth | + 5.7%      | + 6.8%      | +4.5%         | 3.2%          | 2.5%          |
| 30-year Rate        | 4.2%        | 3.9%        | 3.7%          | 4.1%          | 4.5%          |