

Current Economic Indicators and Commercial Real Estate Cycles

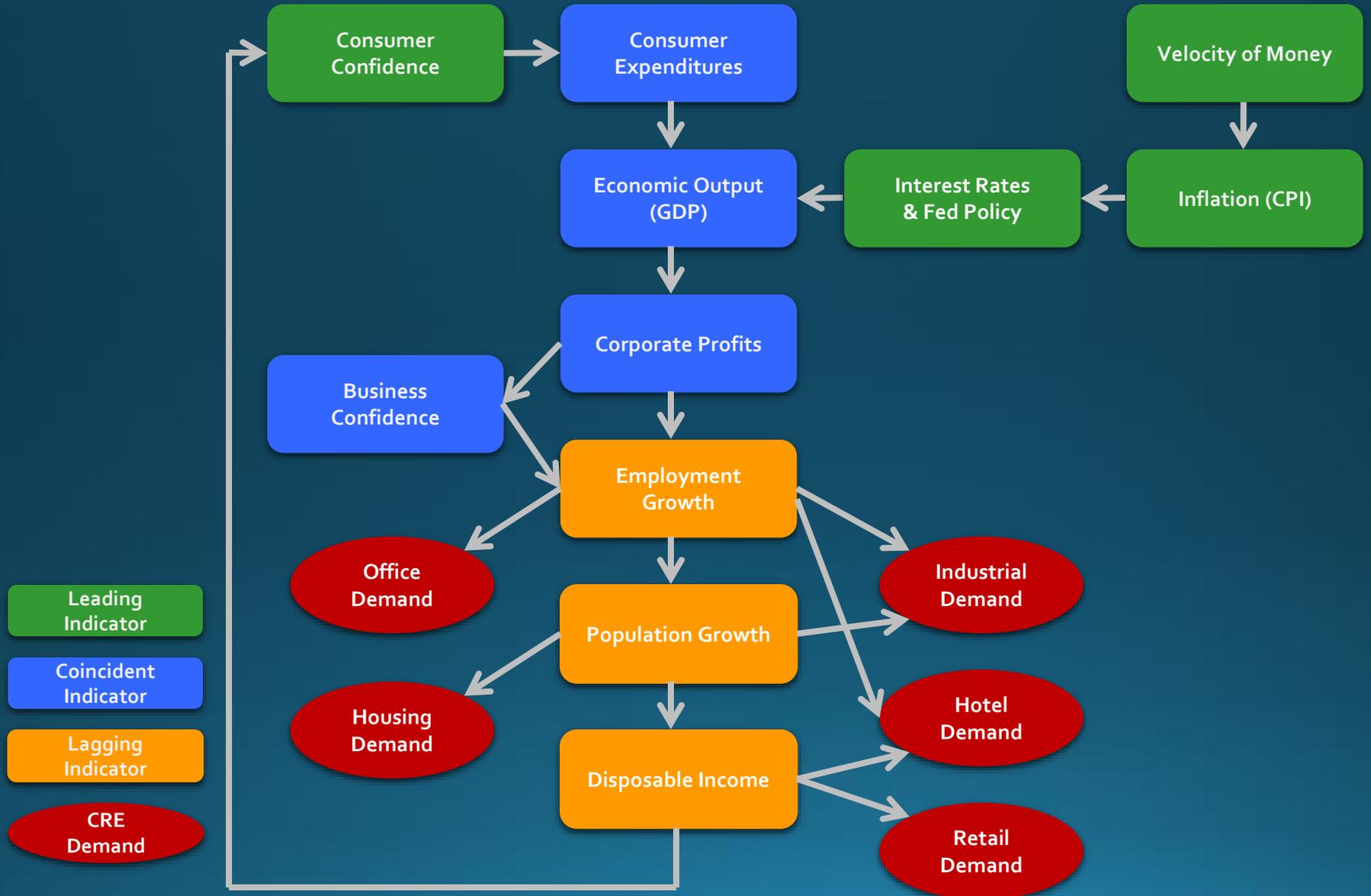
Presented to:

Advanced Market Analysis for Commercial Real Estate
Ward Center for Real Estate Studies – CCIM Institute
October 24, 2016

Presented by:

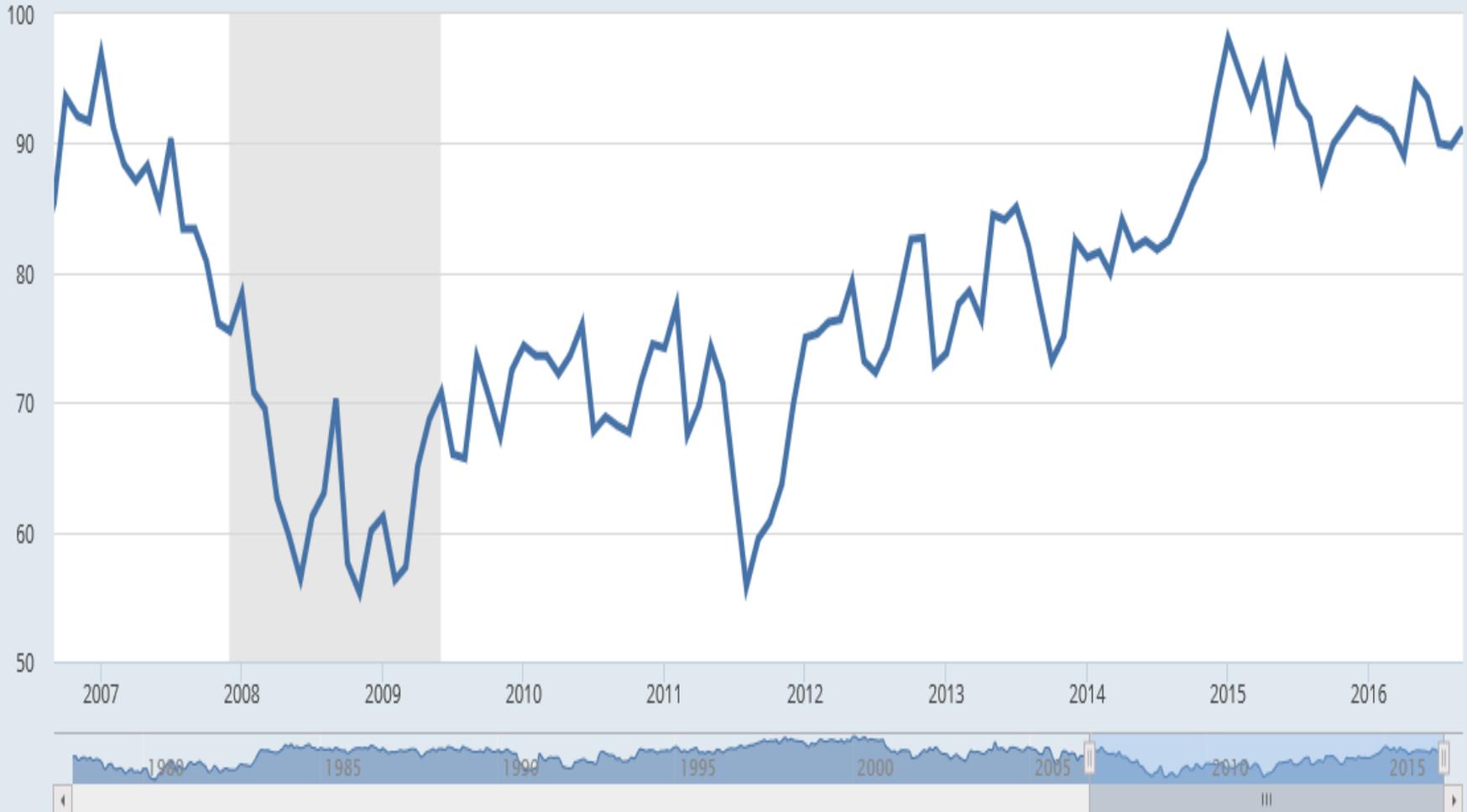
S. Mark Cypert, CCIM

Economic Indicators and Commercial Real Estate Demand Cycles

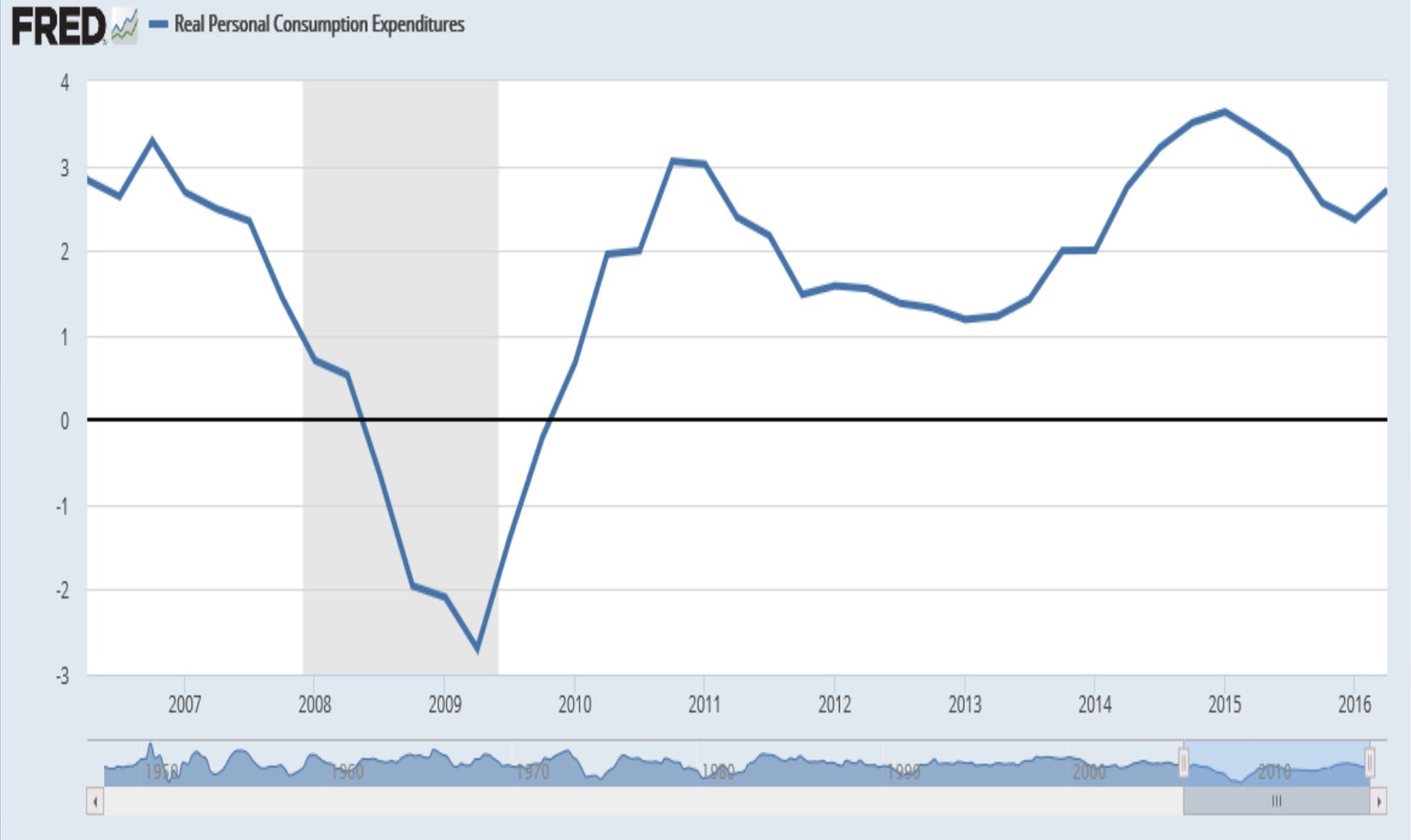


Consumer confidence has trended higher but has recently declined due to economic uncertainty

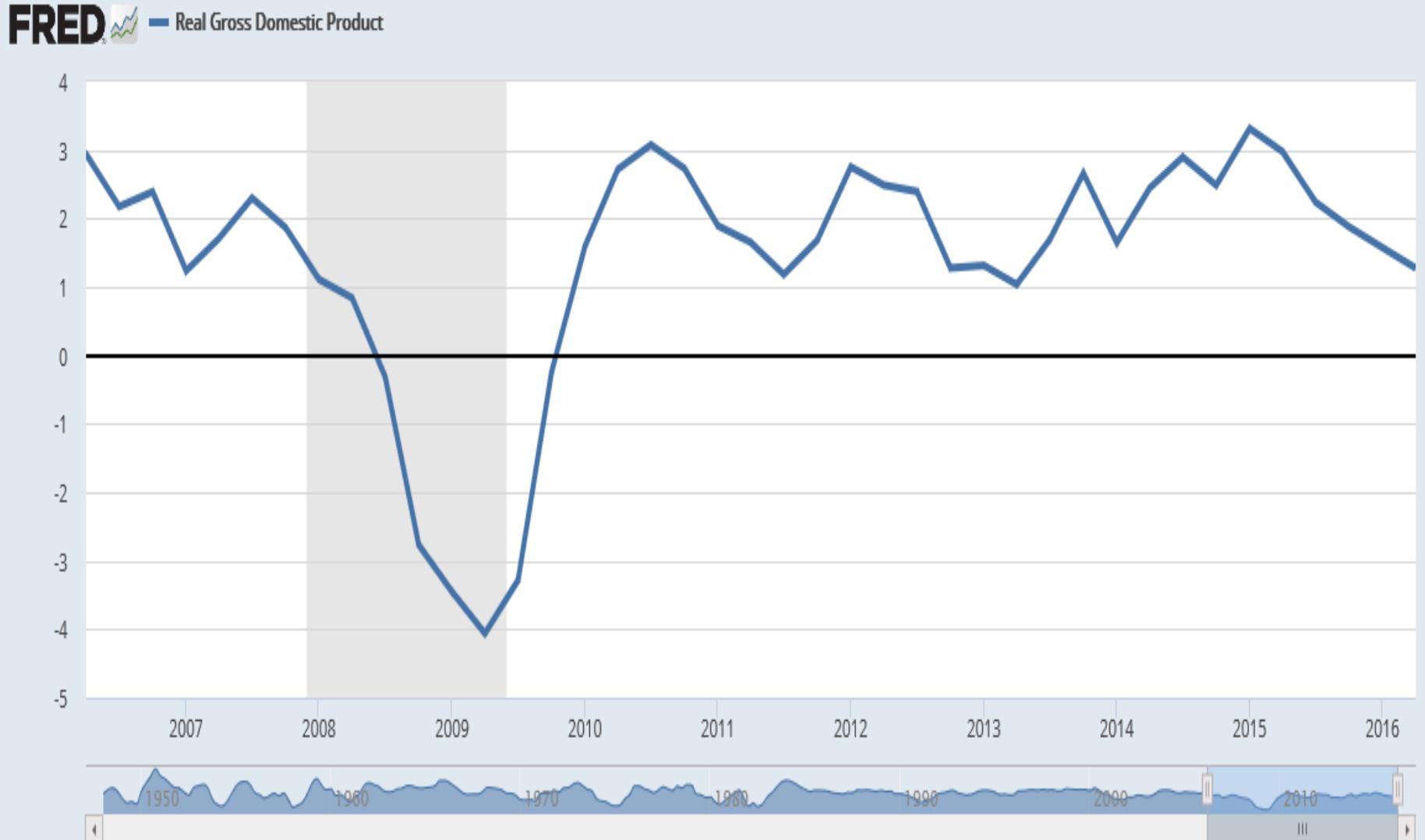
FRED  — University of Michigan: Consumer Sentiment®



Inflation adjusted consumer expenditures have moderated and are currently increasing at an annual rate of 2.7%

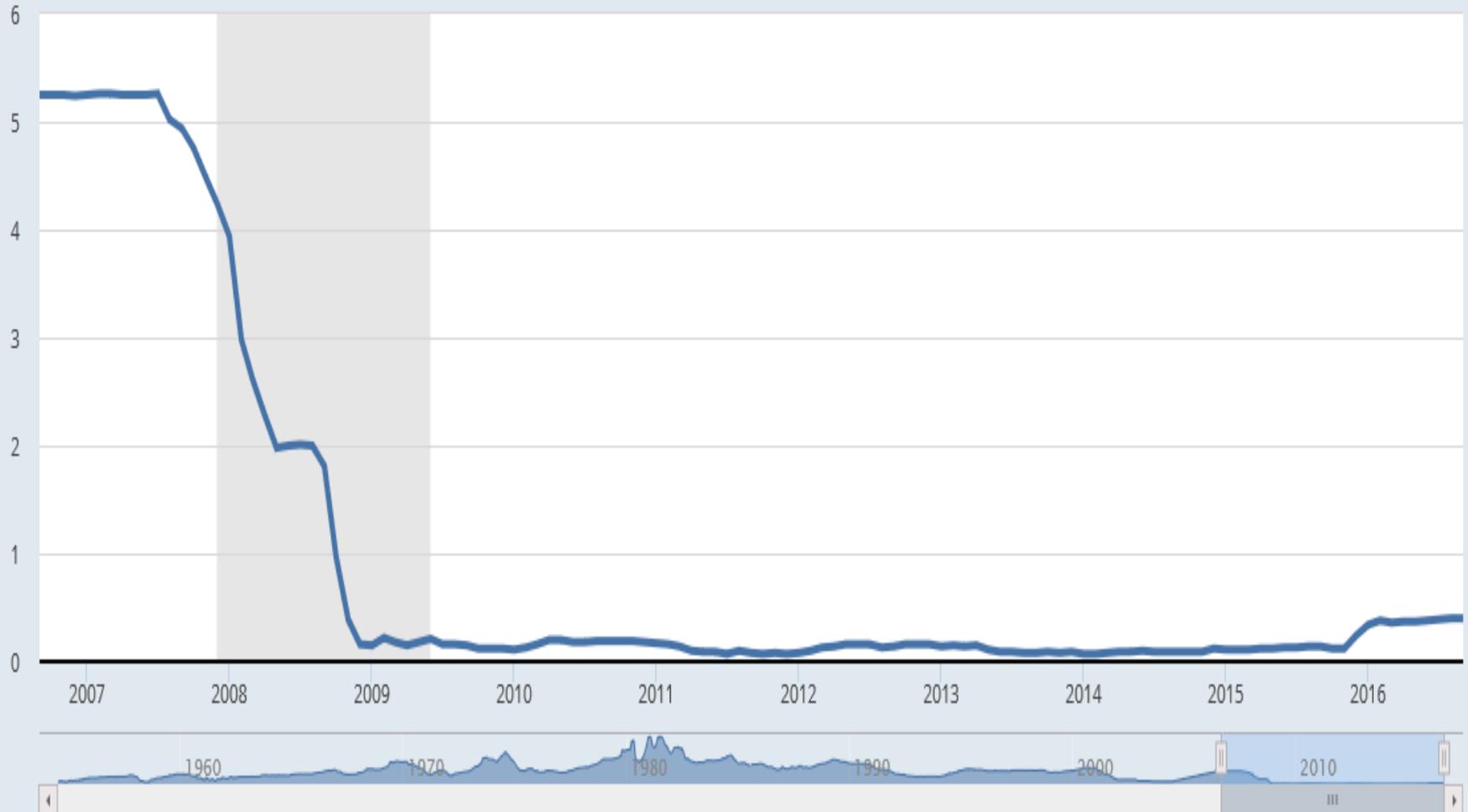


The U.S. economy is growing very slowly - real GDP increased at an annual rate of 1.3% in the 3rd quarter of 2016



The federal funds rate remains near historic lows but expect gradual increases to continue longer term

FRED  — Effective Federal Funds Rate



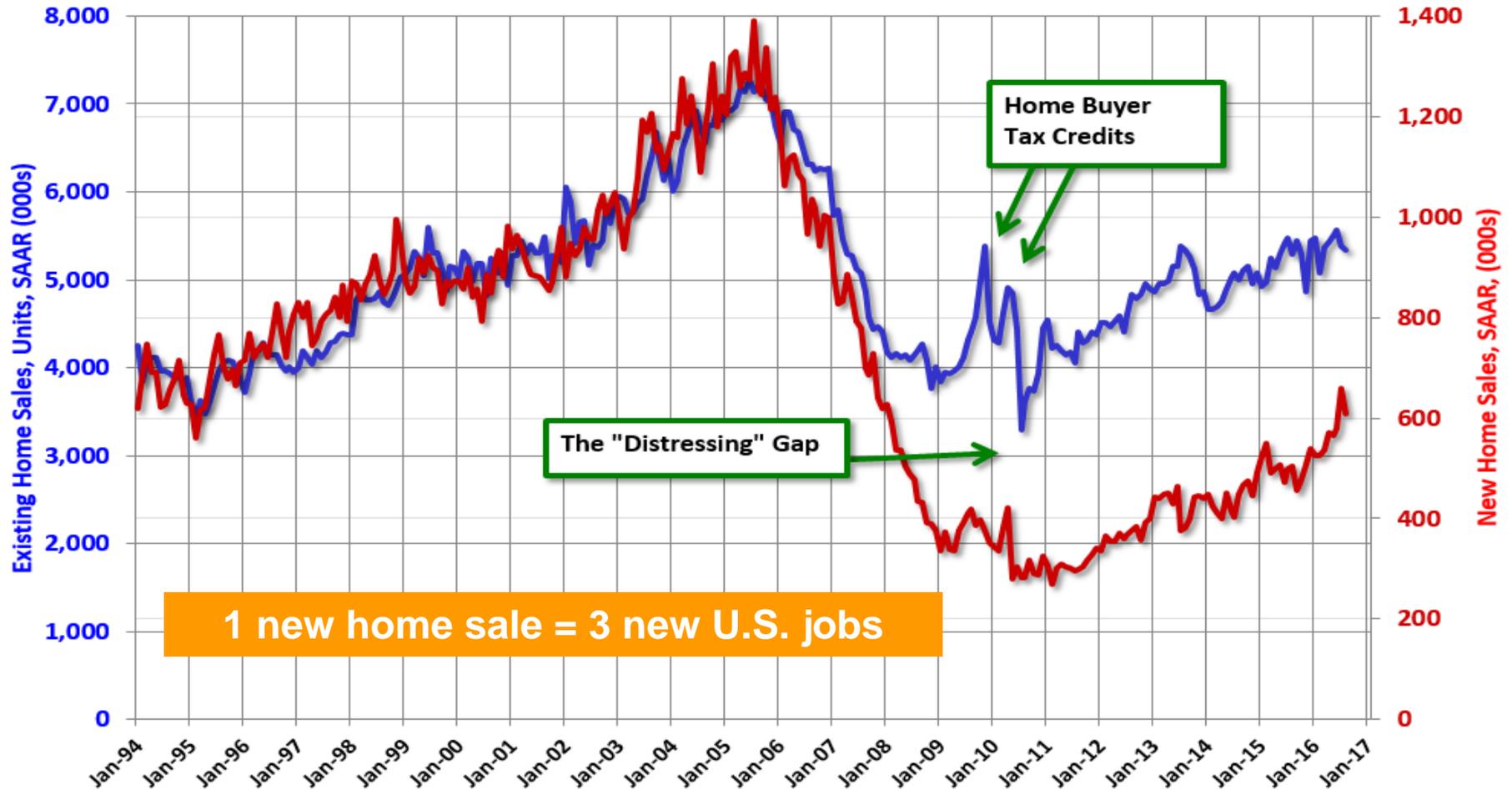
The Impact of Very Low Interest Rates Upon Economic Growth

- Low interest rates are reducing economic growth... especially in the housing sector
- Low interest rates make it difficult to save for a sufficient down payment
- Low interest rates result in lower wealth transfer rates from older generations to younger adults so they can buy or build a home

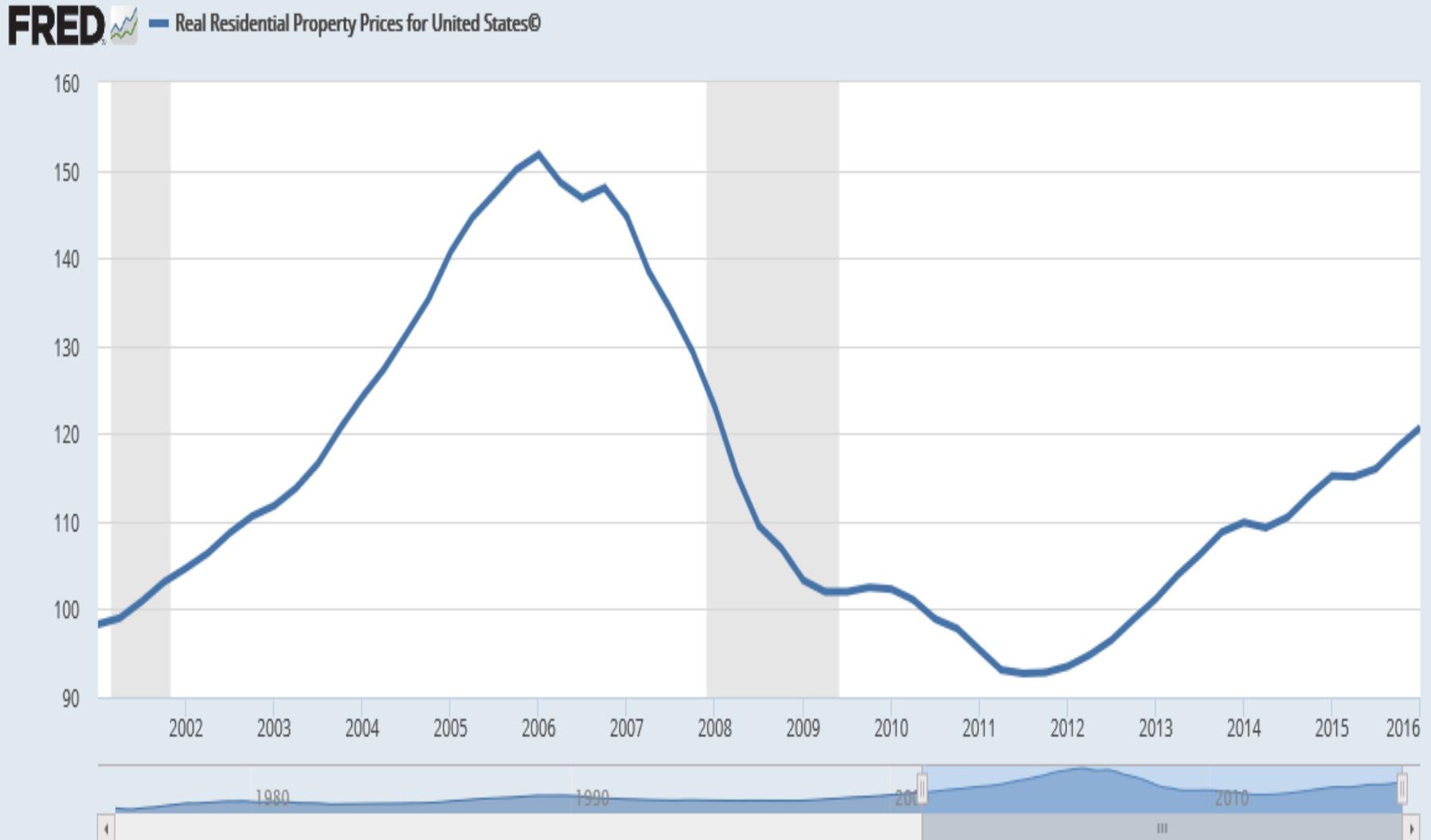
New home sales have lagged existing home sales for the past 9-years

New and Existing Home Sales

— Existing Home Sales (left axis) — New Home Sales (right axis)

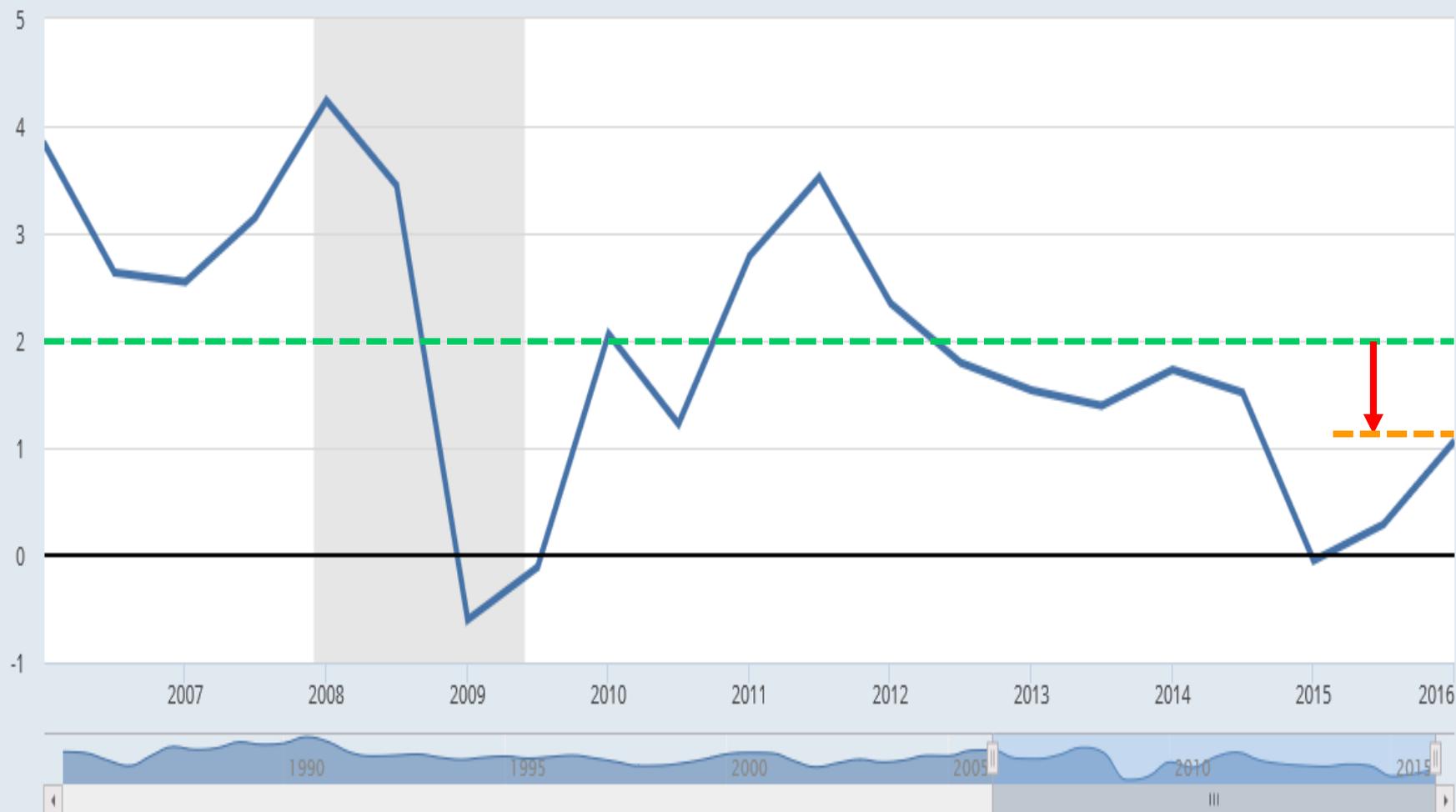


The U.S. housing market continues to recover but home prices are still 21% below the 2006 cyclical peak



Current inflation (CPI) at 1.1% is well below the Fed's targeted objective of 2.0% per year.

FRED — Consumer Price Index for All Urban Consumers: All Items



Contributing to lower inflation are low oil prices which are currently 55% lower than June 2014

FRED — Crude Oil Prices: West Texas Intermediate (WTI) - Cushing, Oklahoma



Why is Inflation Currently so Low?

Inflation results when too much capital (monetary base) is added to the economy, which then circulates quickly (velocity of money), resulting in price increases.

Although the monetary base has increased substantially, velocity has declined.

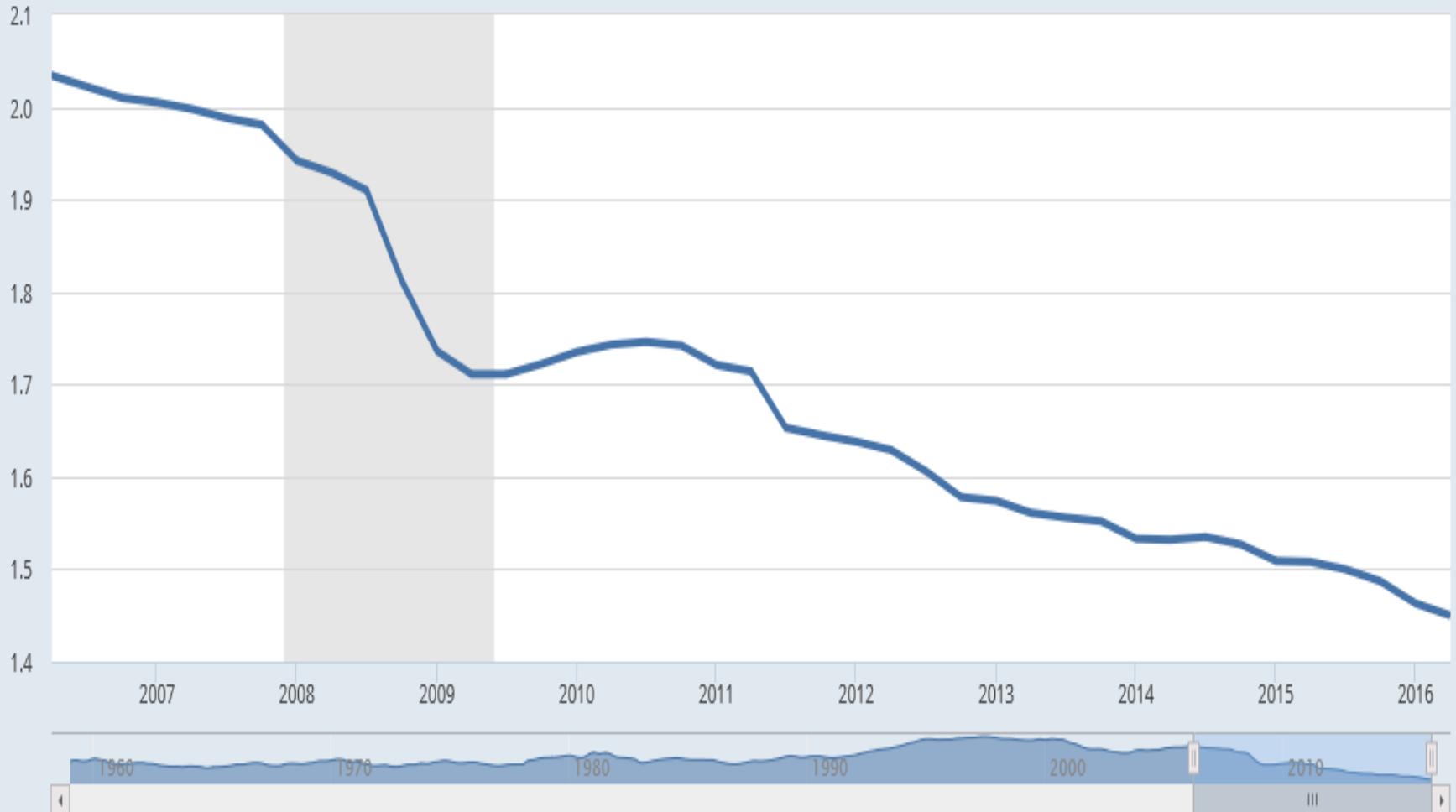
The U.S. monetary base is currently 4.5x larger that it was in 2008 - this would normally be inflationary

FRED  — Monetary Base; Total



However, velocity is 27% below 2008 levels and continues to trend lower as U.S. consumers increase their savings and pay down debt

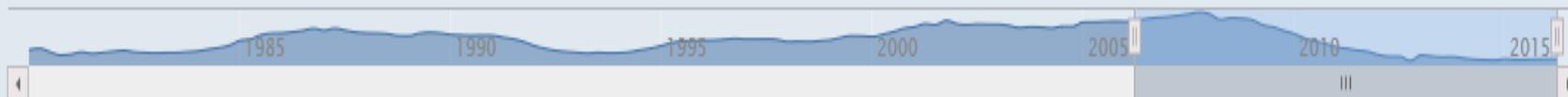
FRED  Velocity of M2 Money Stock



Household debt service payments relative to income have declined by 24% since the cyclical peak in 4Q-2007

FRED

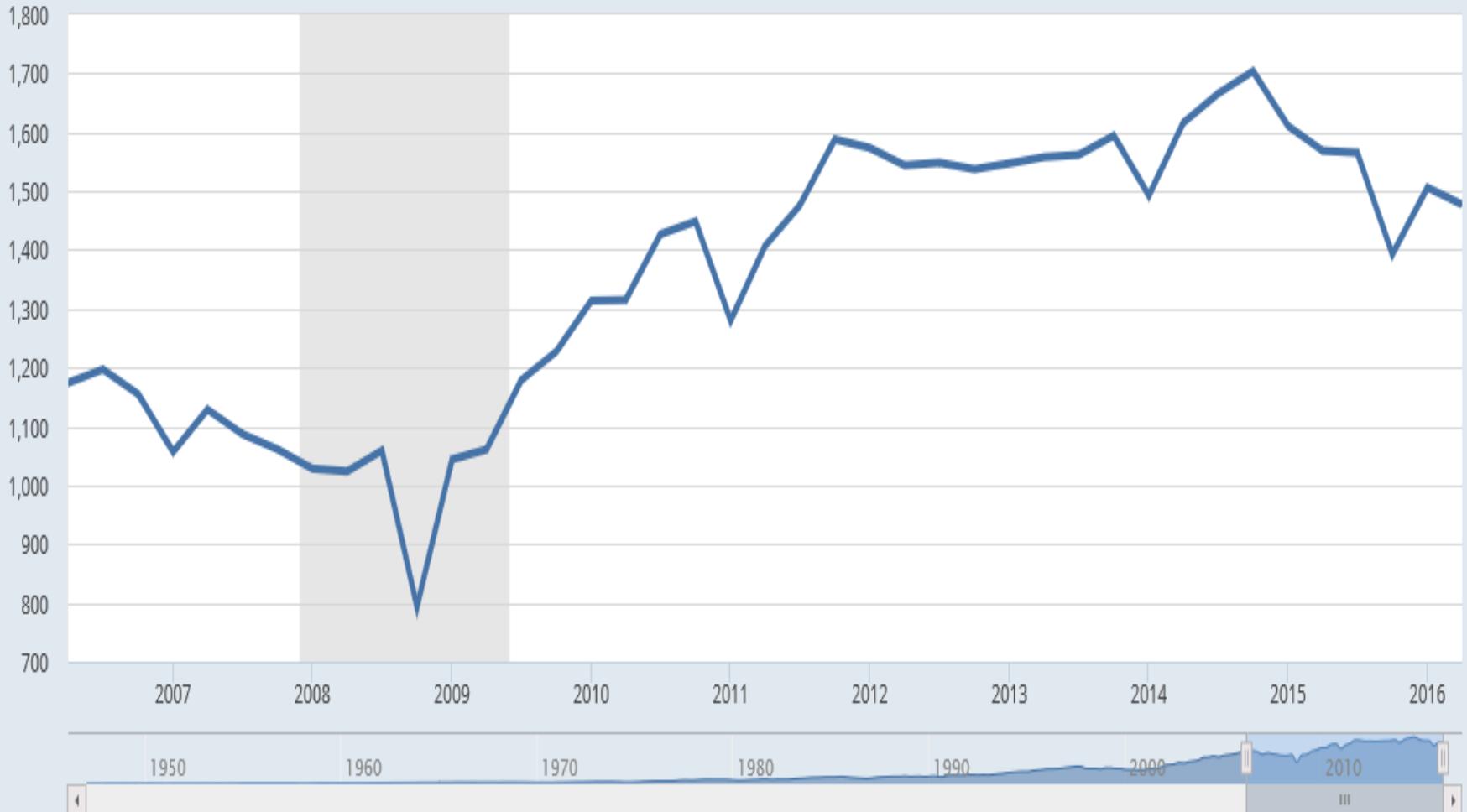
— Household Debt Service Payments as a Percent of Disposable Personal Income



U.S. corporate profits are currently 86% higher than their 2008 trough but have recently started to decline

FRED

— Corporate Profits After Tax with Inventory Valuation Adjustment (IVA) and Capital Consumption Adjustment (CCAdj)



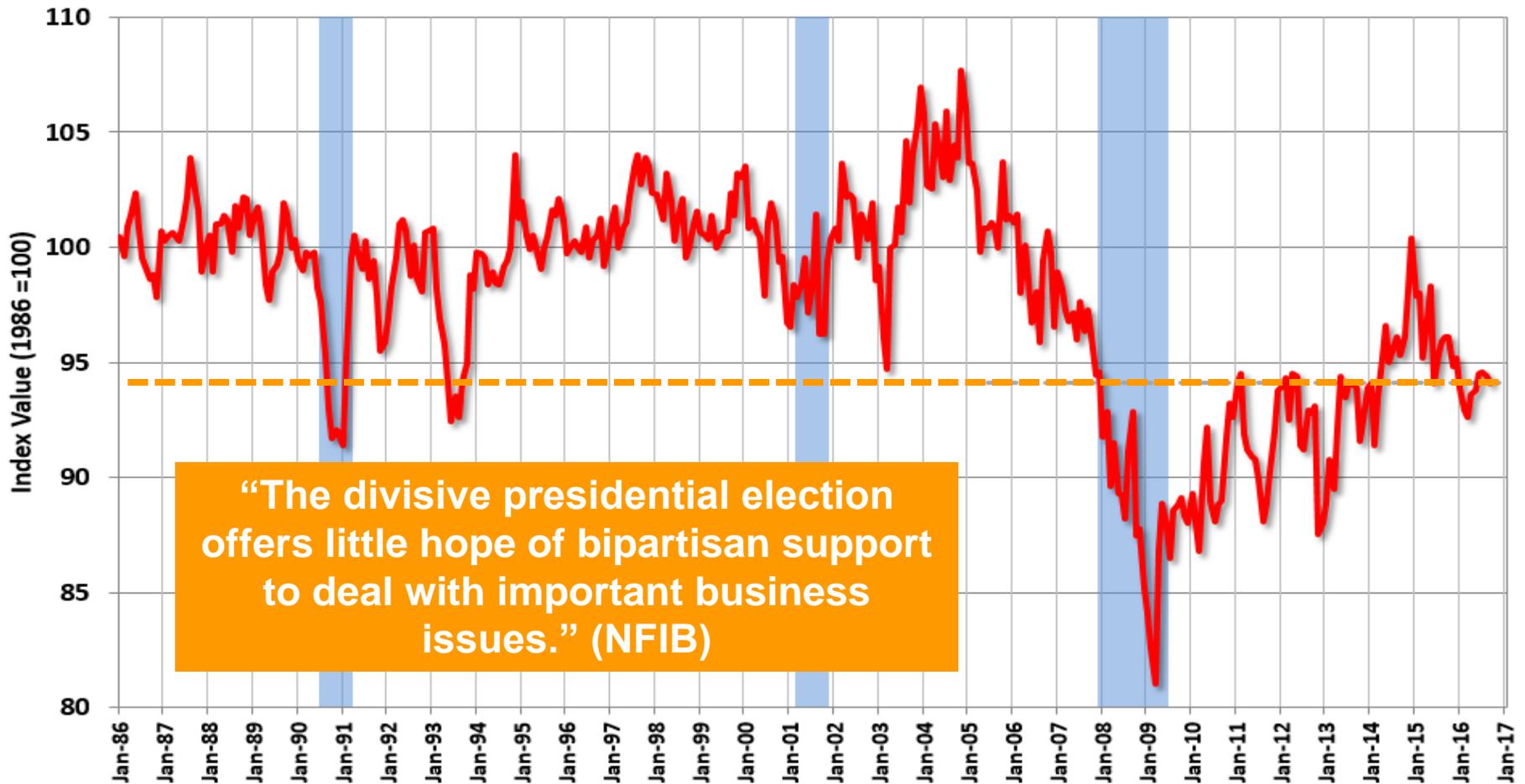
Contributing to a decline in corporate profits are labor costs which have increased by 2.6% over the past 12-months

FRED — Nonfarm Business Sector: Unit Labor Cost



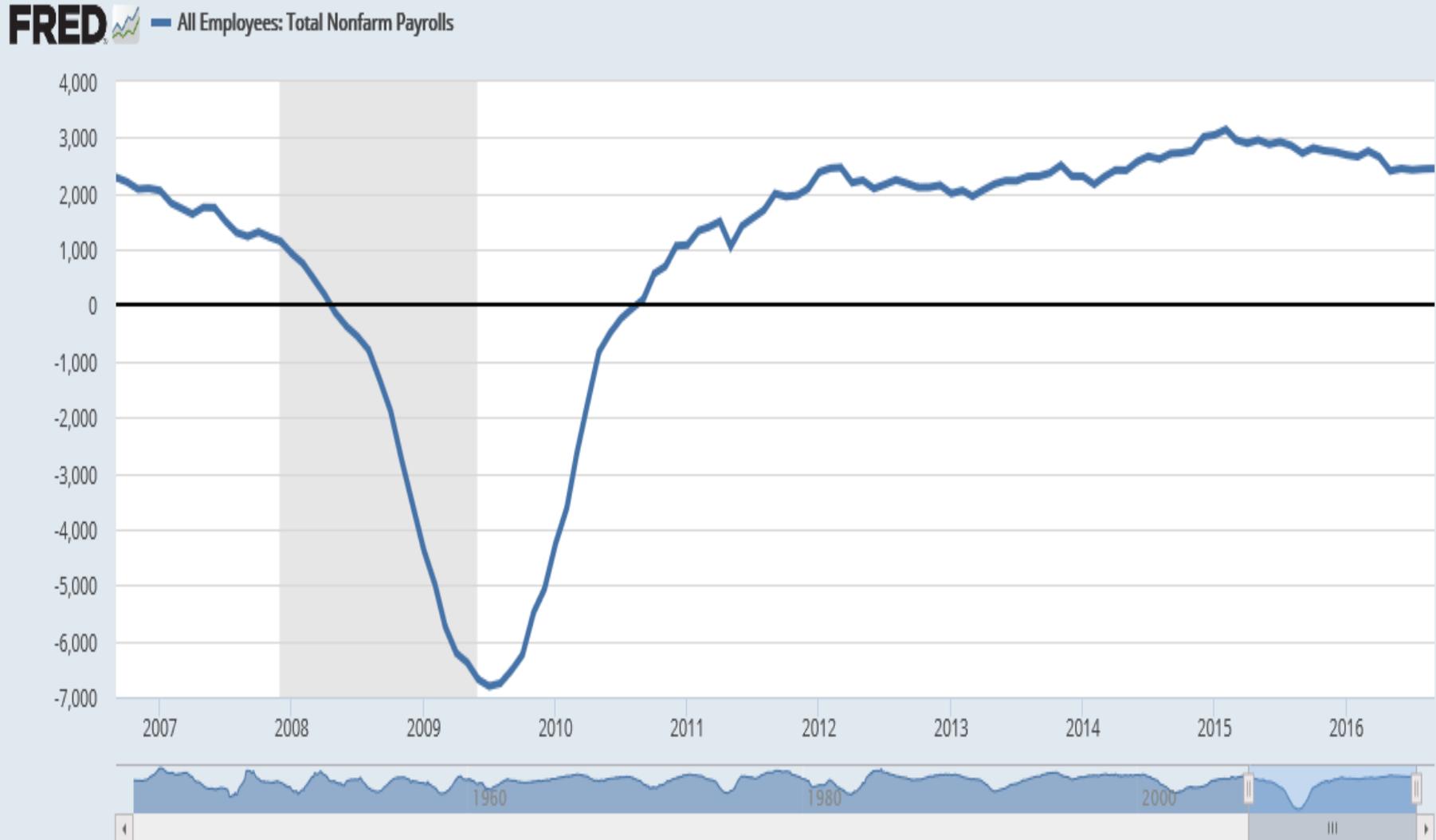
Business optimism has been negatively impacted by political, and economic uncertainties.

Small Business: Optimism Index



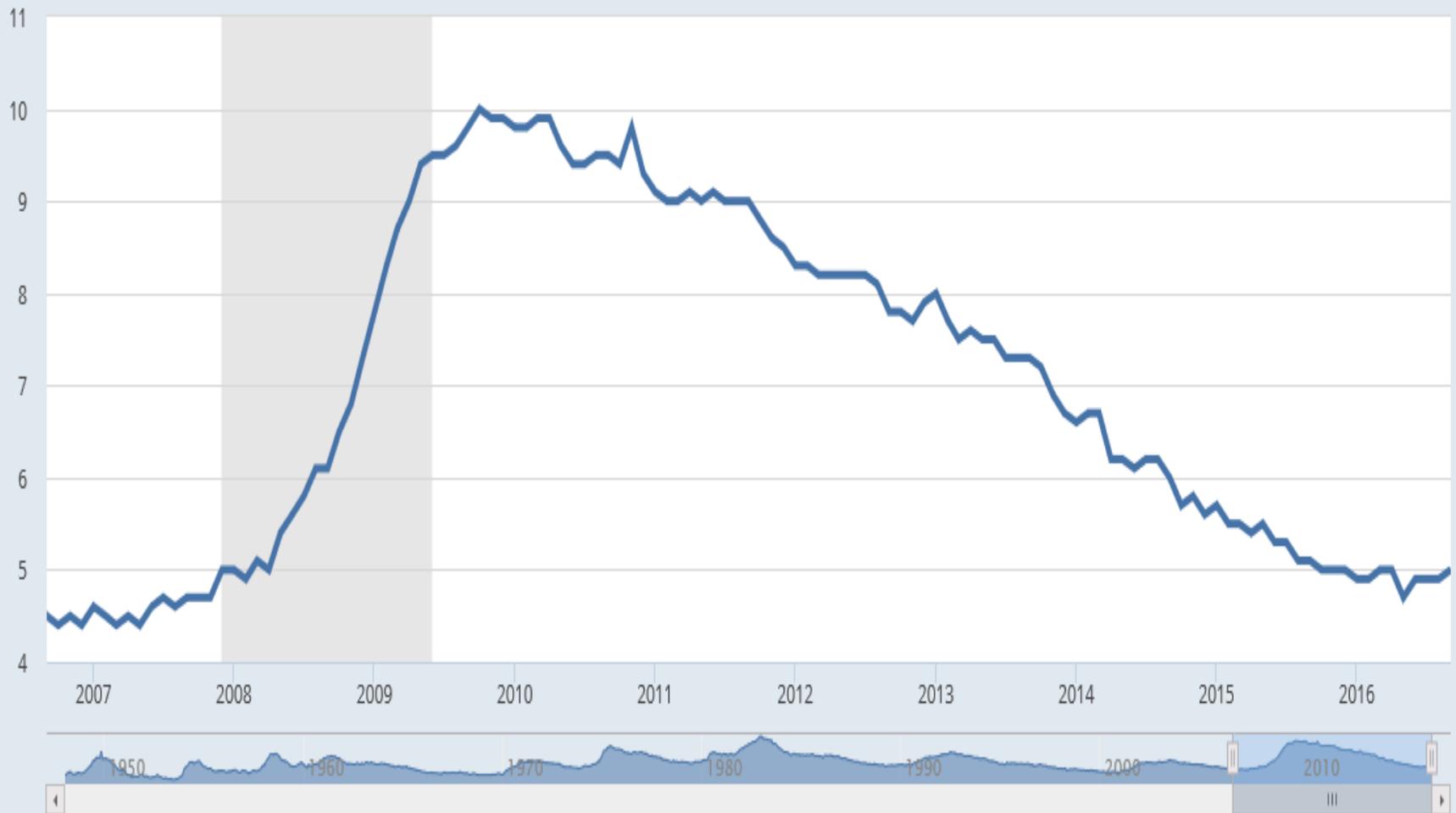
“The divisive presidential election offers little hope of bipartisan support to deal with important business issues.” (NFIB)

Over the past 12-months, the U.S. has gained an average of 204,000 jobs per month as we near full employment levels



The current U.S. unemployment rate is 5.0%

FRED  Civilian Unemployment Rate



Outlook for the U.S. Economy:

- The economic indicators remain generally positive but have flattened, thereby signaling slower growth ahead.
- Market fundamentals indicate no near term inflation worries – until oil prices start to recover.
- Interest rates remain near historical lows but the Federal Reserve is expected to gradually raise rates over time.
- The U.S. is currently at full employment, however both corporate profits and business optimism appear to have reached cyclical peaks.
- GDP remains positive and the U.S. economy is expected to continue to grow slowly over the foreseeable future.

U.S. Commercial Real Estate Market Cycle Positions of the 4th Quarter 2016

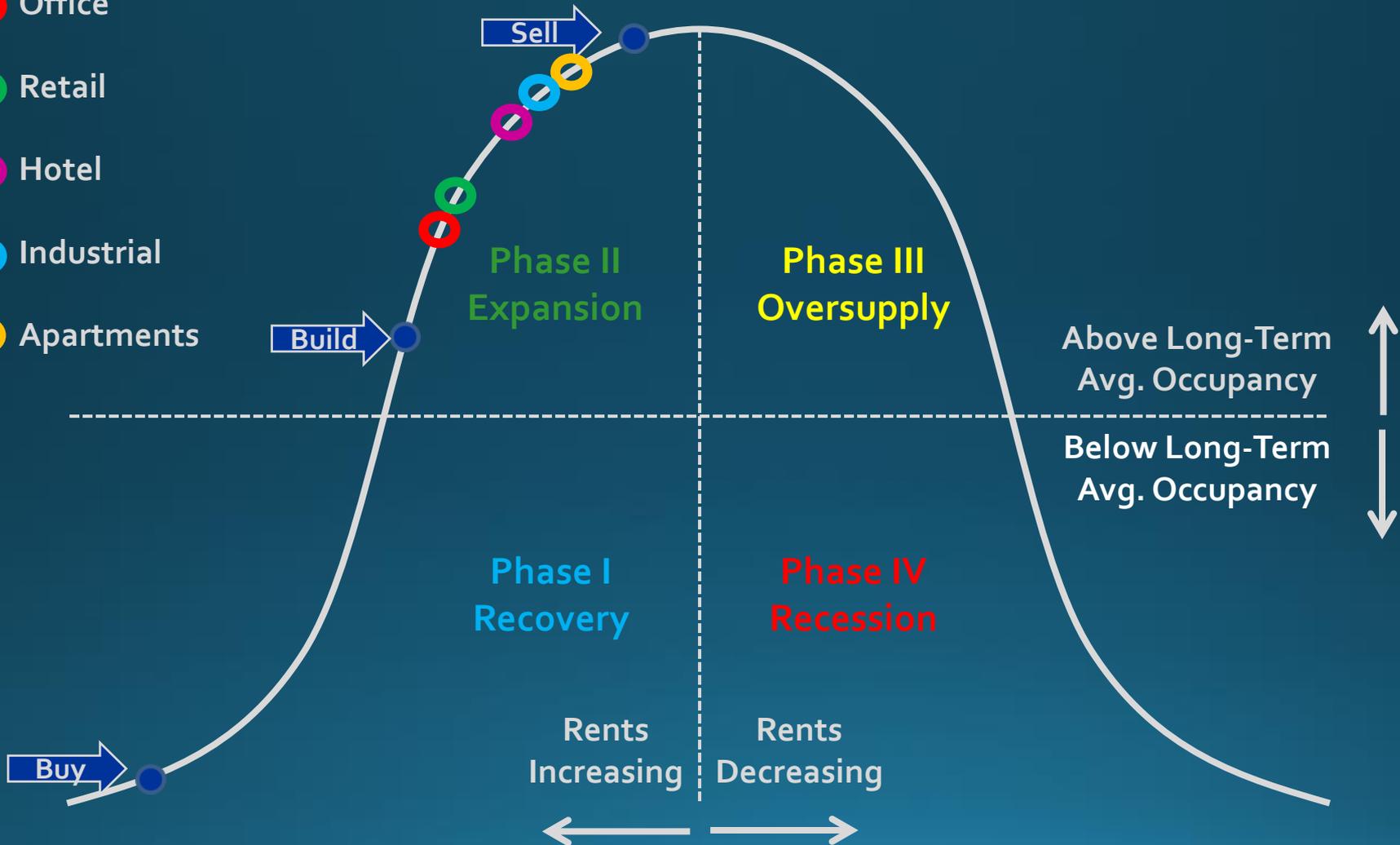
Office

Retail

Hotel

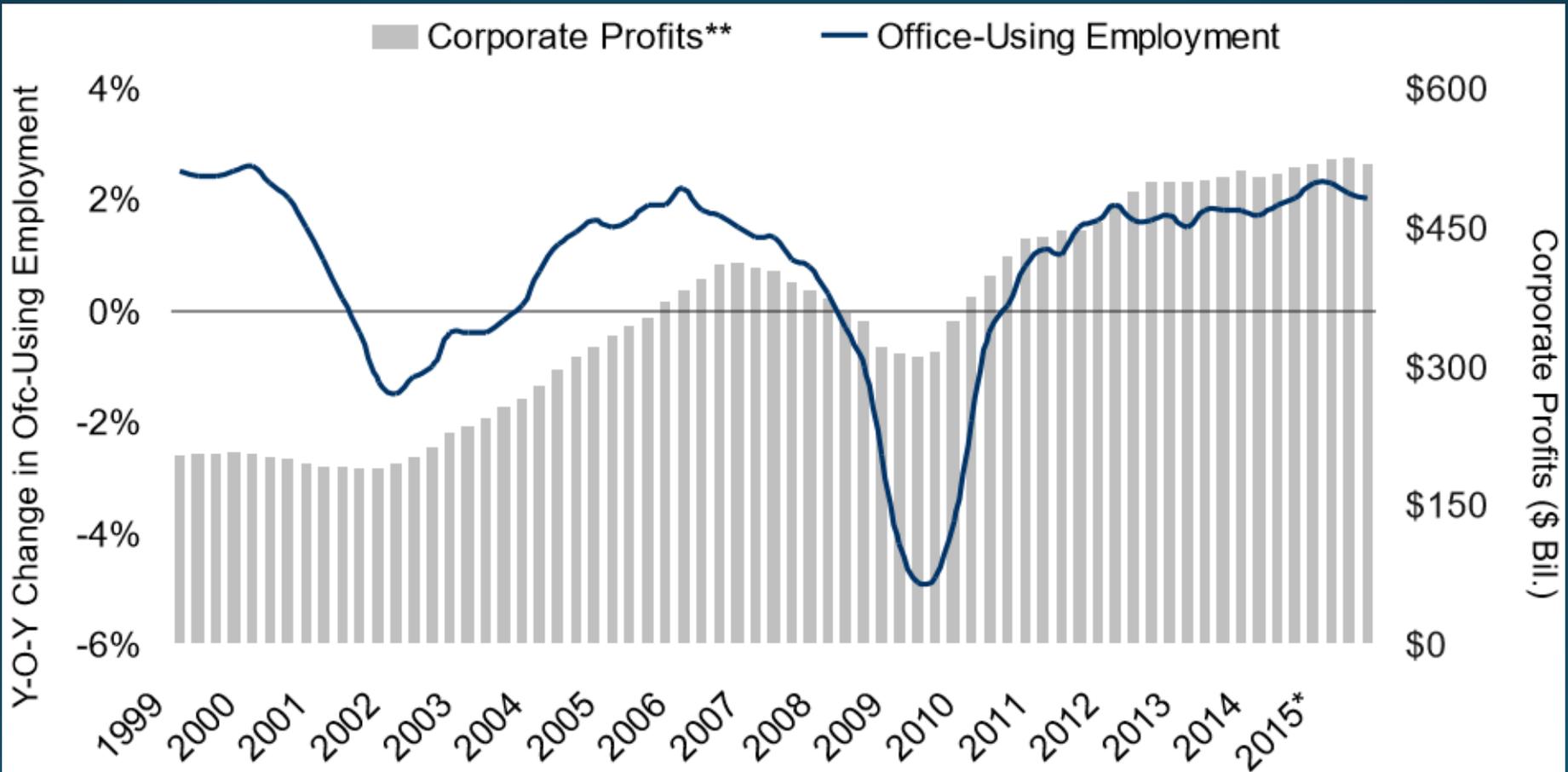
Industrial

Apartments



Office using employment growth drives office demand, particularly in the professional and business services, financial services, and information technology sectors.

Office using employment is closely correlated to corporate profits, which have been strong during the economic recovery

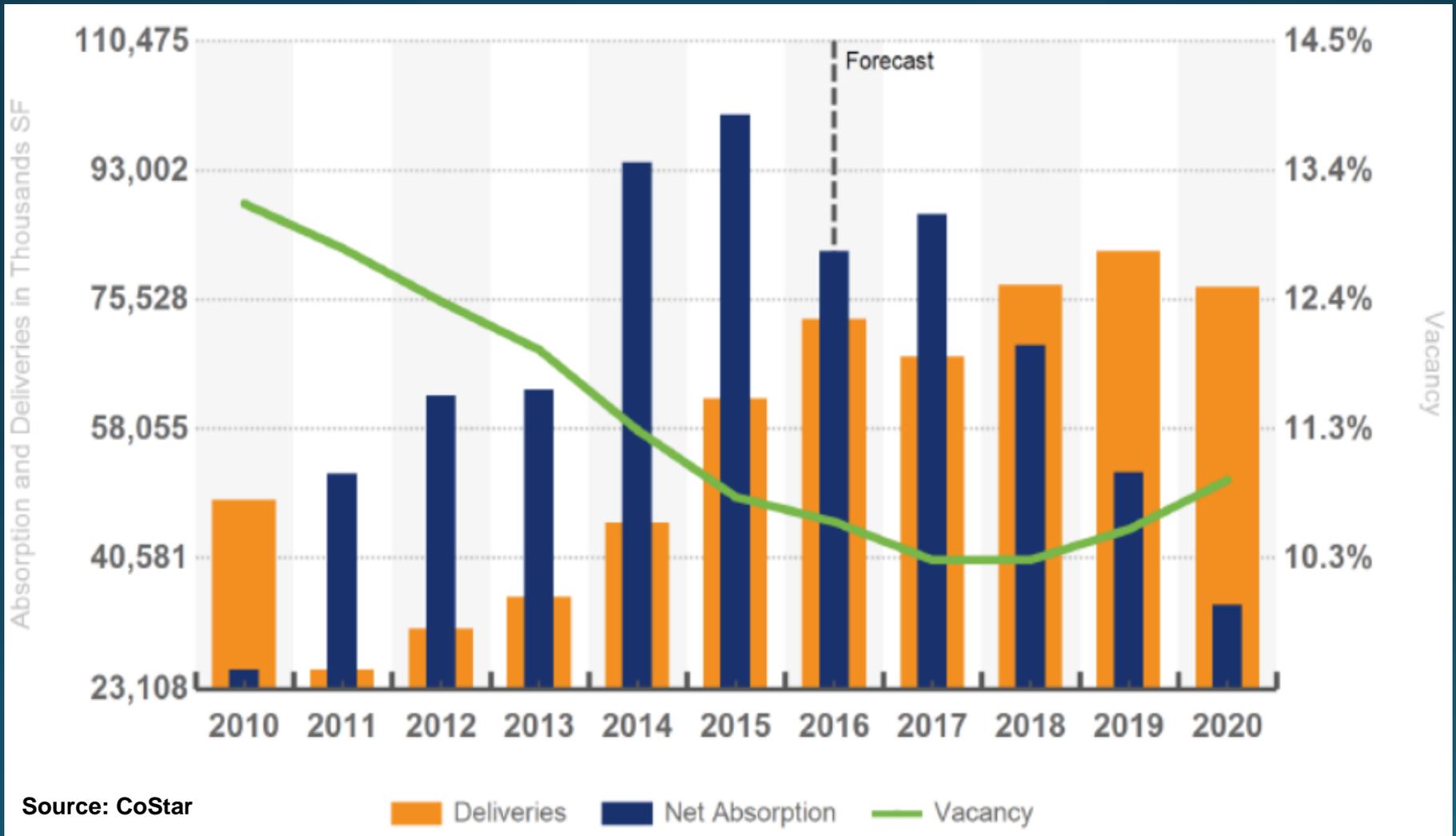


* Through 3Q

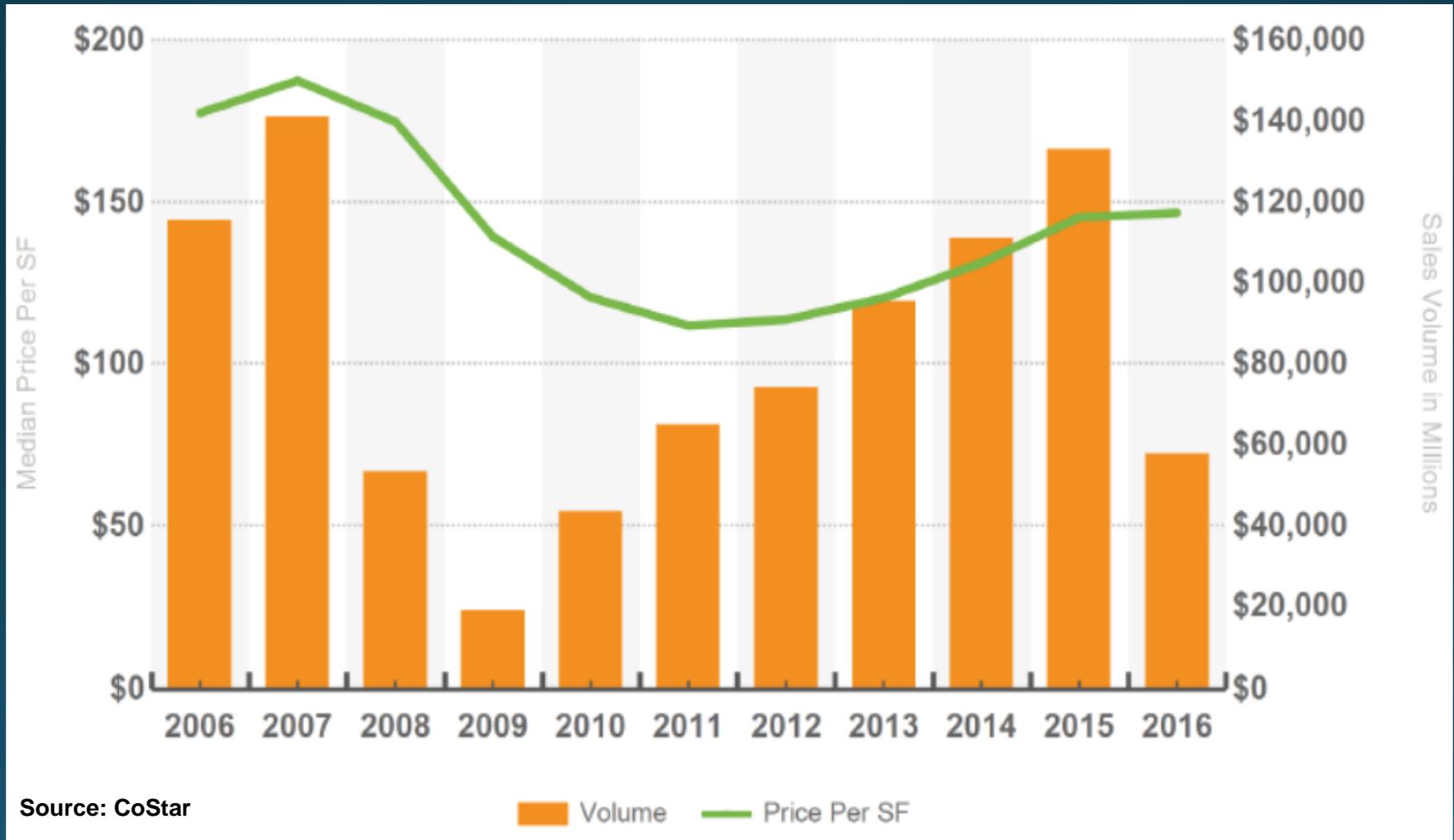
** Trailing 12-month average

Sources: Marcus & Millichap Research Services, BEA, BLS

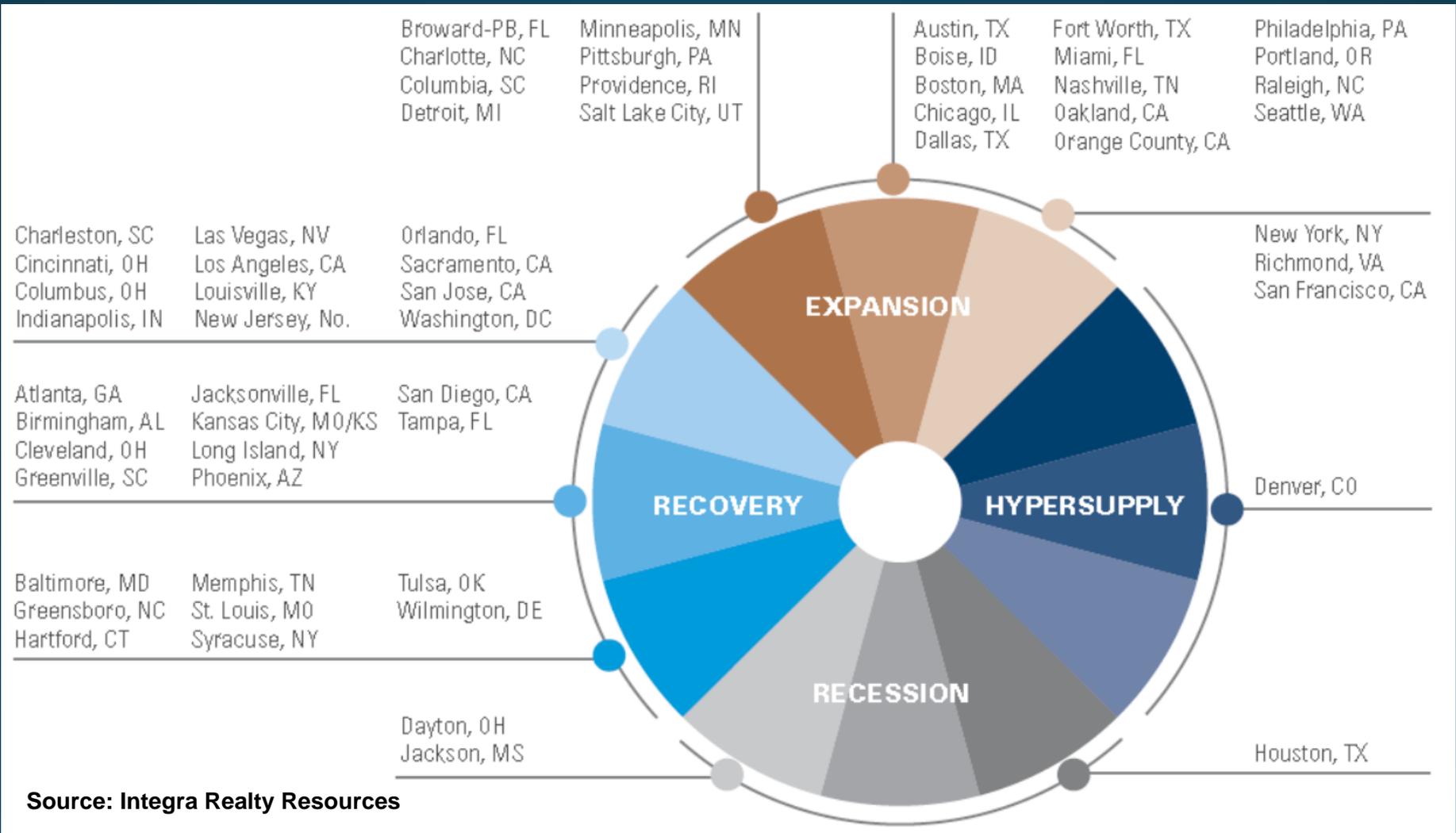
Office absorption is still exceeding supply and the current expansion phase is expected to last for the next 24-36 months



Office values remain around 15% below the last cyclical peak



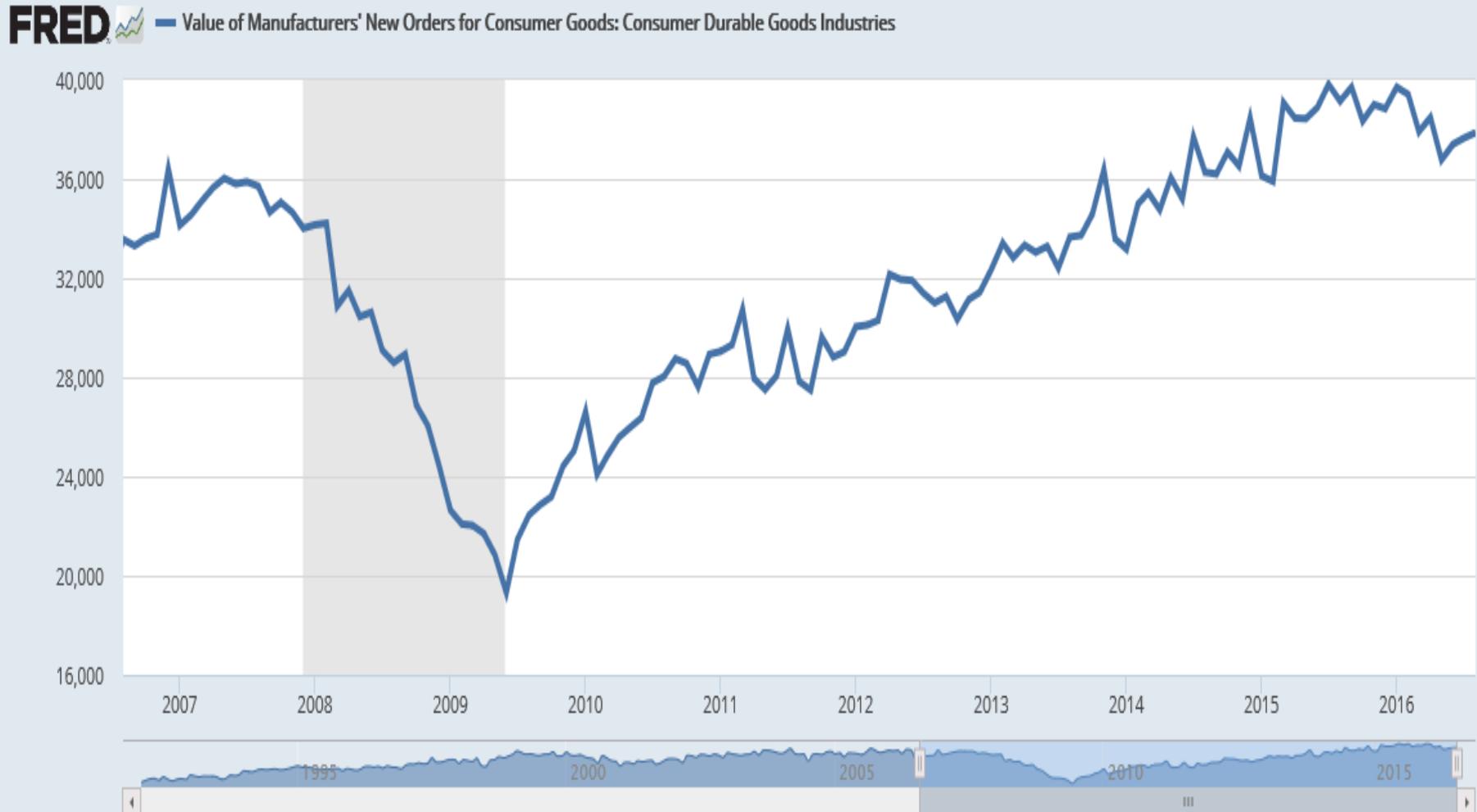
Office market cycles across the U.S.



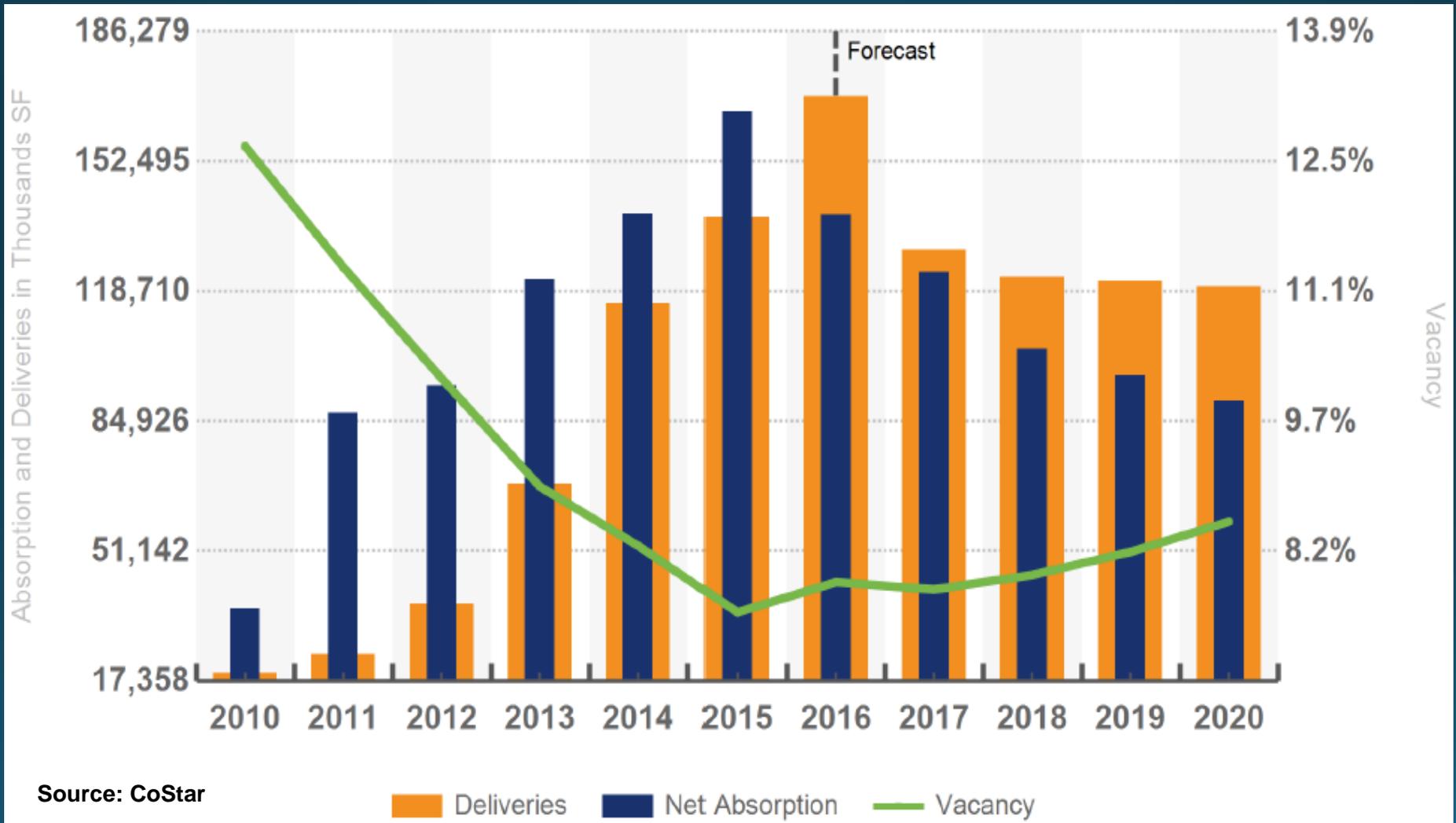
Source: Integra Realty Resources

Industrial warehouse and distribution demand typically moves in tandem with the overall U.S. economy.

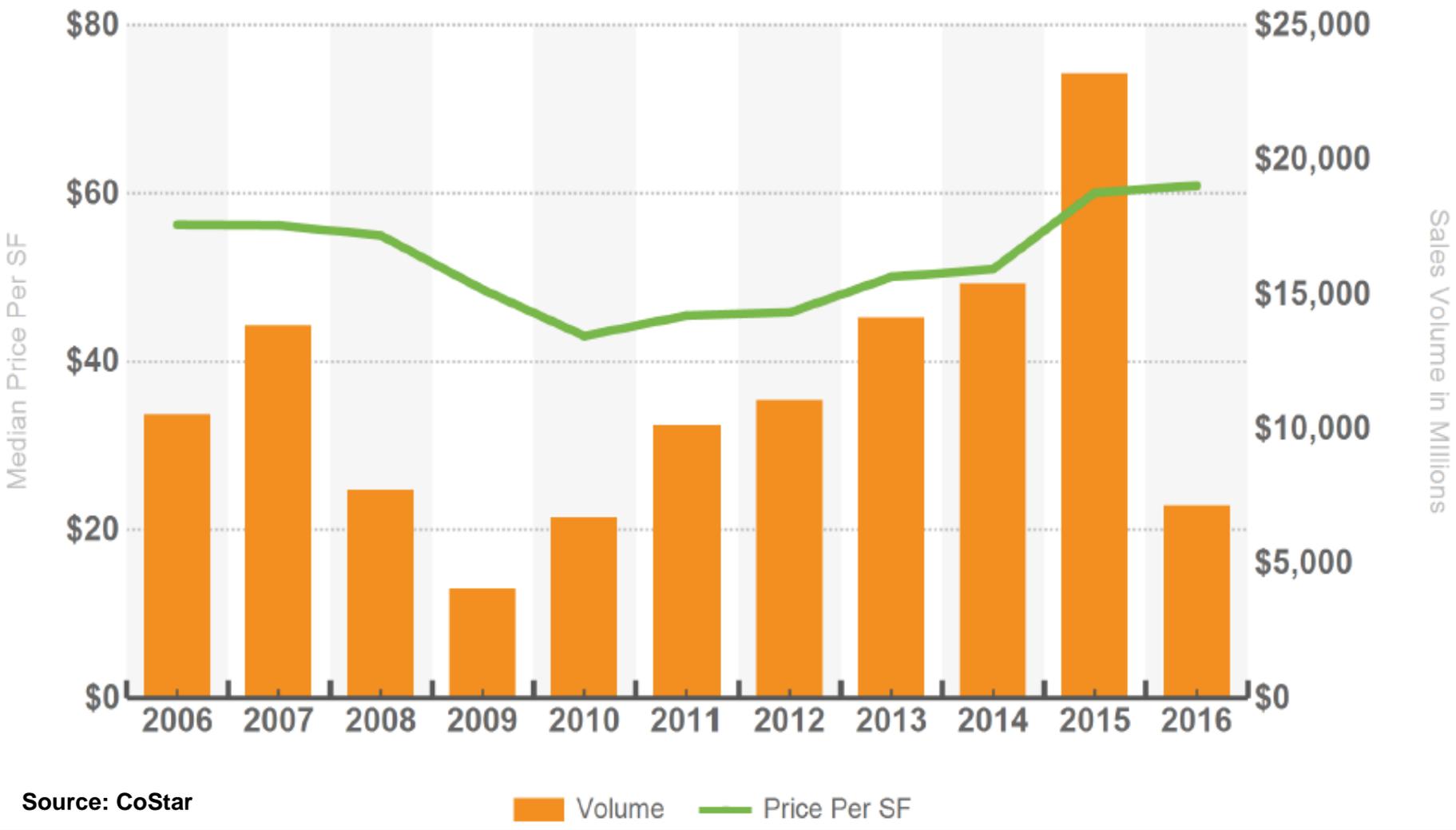
Manufactures orders for consumer goods have contributed to strong absorption of industrial warehouse and distribution space.



Industrial construction will exceed absorption this year and the sector is expected to enter the over-supply phase within the next 12-24 months



Industrial values are about 5% above the prior cyclical peak



Industrial market cycles across the U.S.

Baltimore, MD
 Boston, MA
 Charleston, SC
 Charlotte, NC
 Cincinnati, OH
 Columbus, OH
 Dayton, OH

Detroit, MI
 Houston, TX
 Las Vegas, NV
 Long Island, NY
 Orlando, FL
 Philadelphia, PA
 Pittsburgh, PA

Providence, RI
 Raleigh, NC
 Sacramento, CA
 Sarasota, FL
 St. Louis, MO
 Tampa, FL
 Tulsa, OK

Atlanta, GA
 Broward-PB, FL
 Cleveland, OH
 Columbia, SC
 Dallas, TX
 Denver, CO
 Fort Worth, TX

Greenville, SC
 Los Angeles, CA
 Louisville, KY
 Memphis, TN
 Miami, FL
 Minneapolis, MN
 Naples, FL

Nashville, TN
 New Jersey, No.
 Orange County, CA
 Portland, OR
 Richmond, VA
 Salt Lake City, UT
 Seattle, WA

Birmingham, AL
 Boise, ID
 Jacksonville, FL

New Jersey, Coastal
 Phoenix, AZ
 Washington, DC

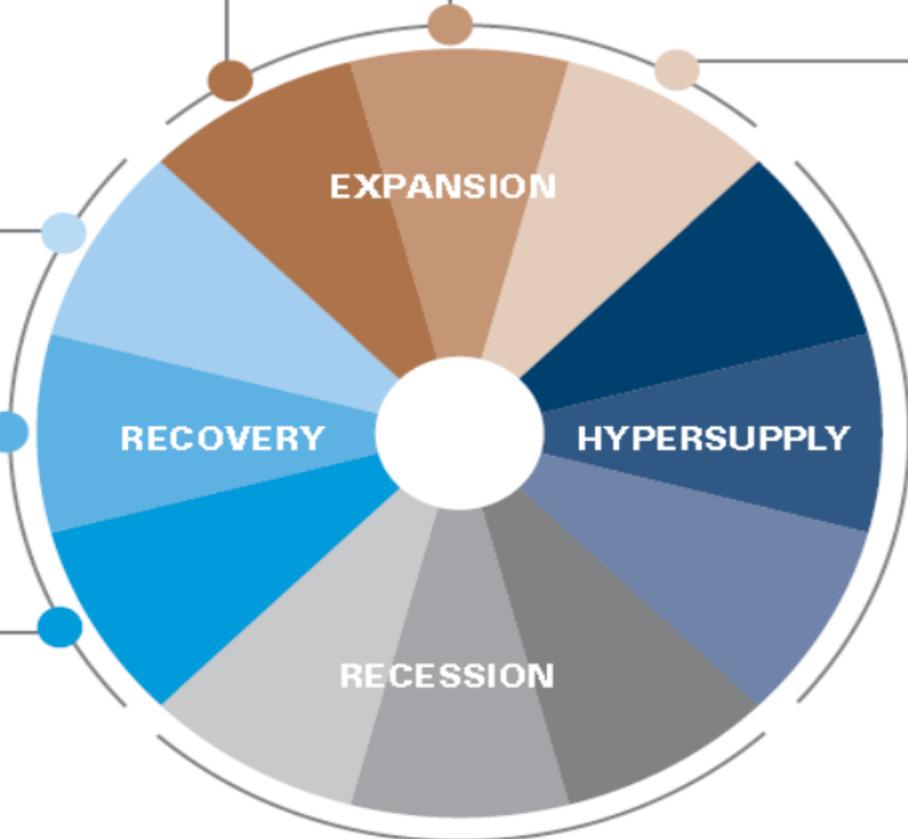
Greensboro, NC
 Jackson, MS

San Diego, CA
 Wilmington, DE

Hartford, CT

Syracuse, NY

Austin, TX
 Chicago, IL
 Indianapolis, IN
 Kansas City, MO/KS
 New York, NY
 Oakland, CA
 San Francisco, CA
 San Jose, CA



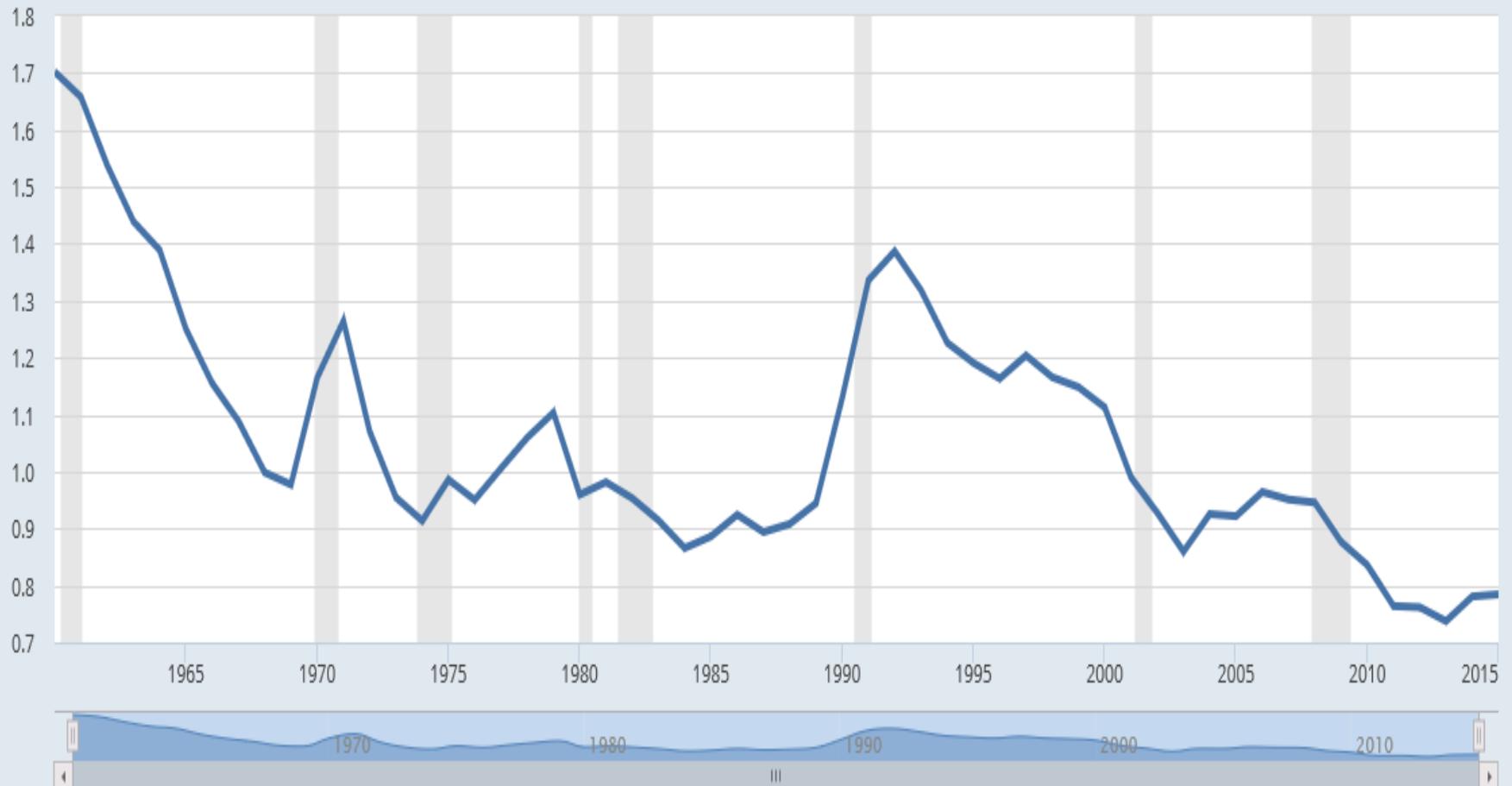
Source: Integra Realty Resources

Working age adults choose where to live primarily for employment related reasons.

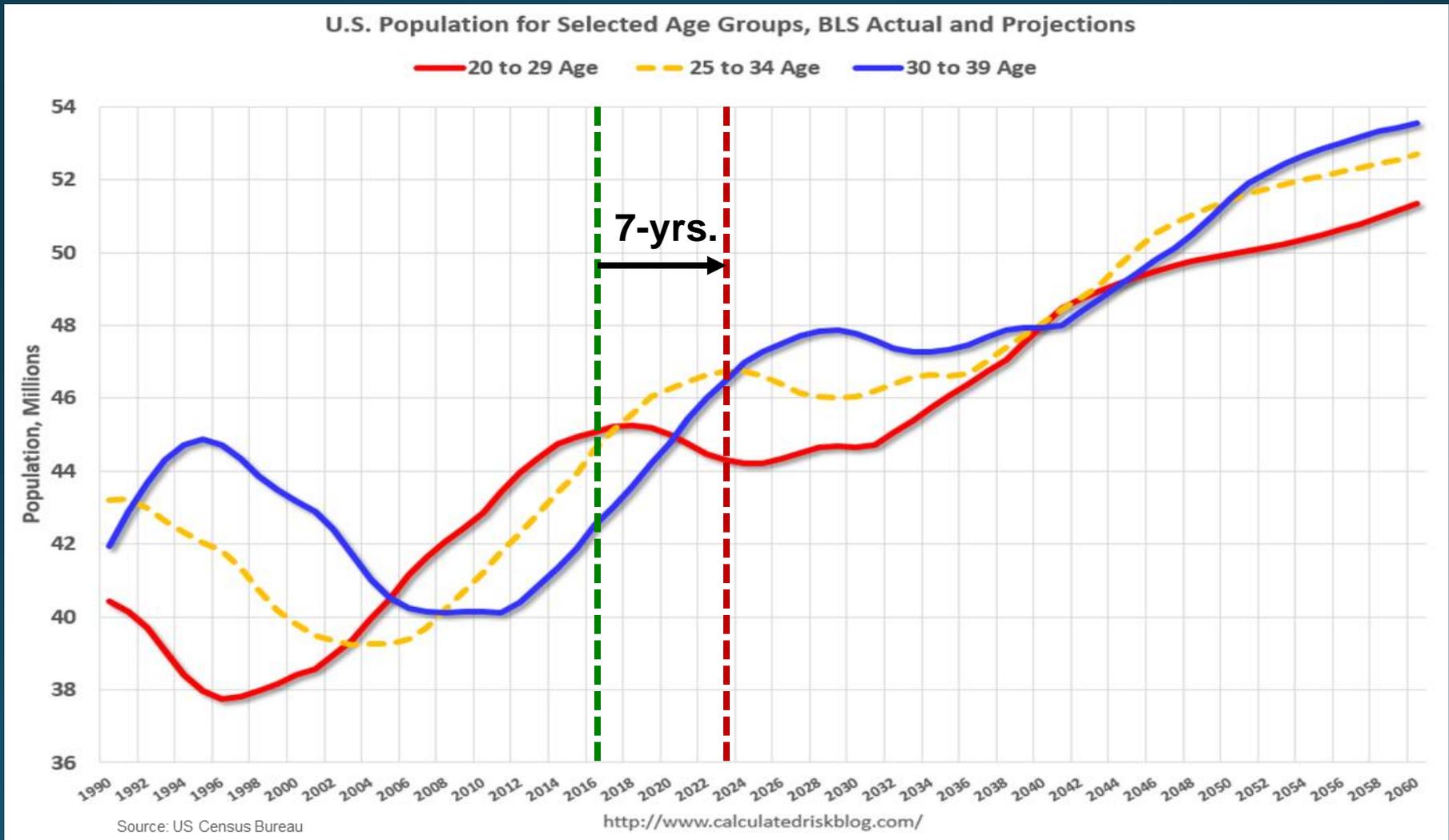
Employment growth drives population growth and new household formations drive demand for residential housing.

The U.S. population is currently growing at an annual rate of 0.8%

FRED  Population Growth for the United States

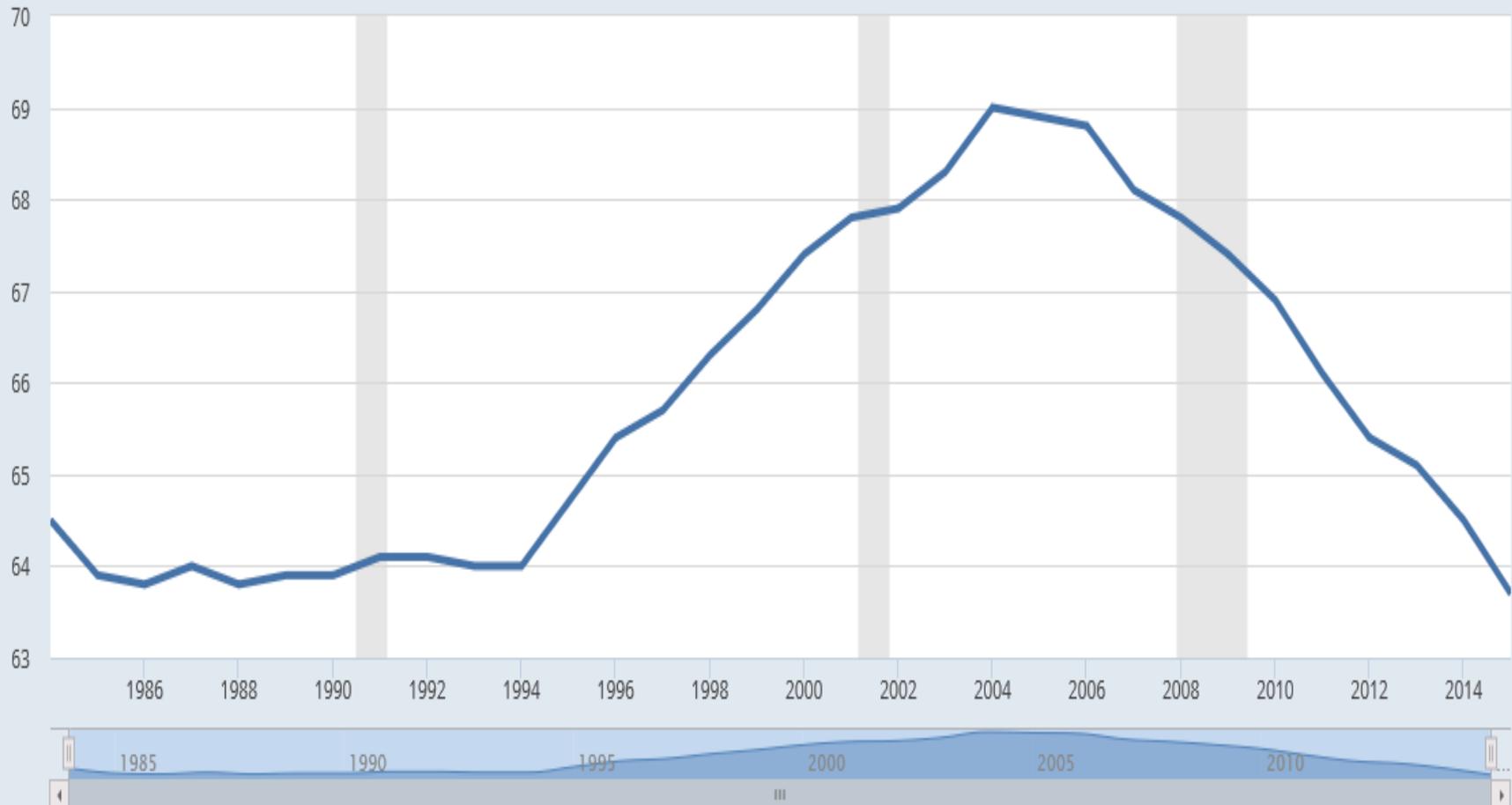


The growth in young adults (orange, dashed) will peak in 2023 and the strong demographic demand increase for apartments will start to soften

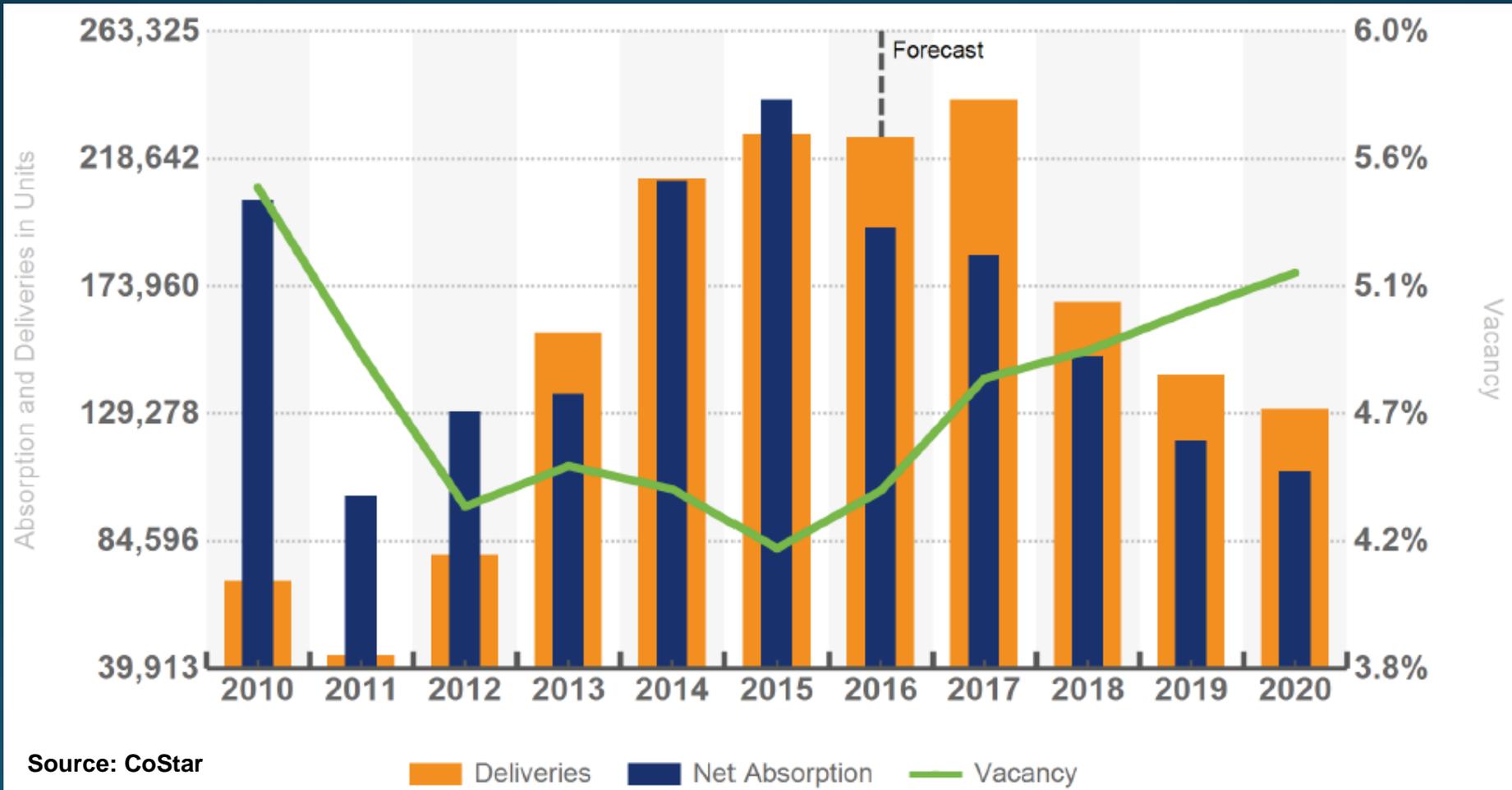


4.5 million households who previously owned a home are now renters again, creating a surge for rental housing during the past 10-years

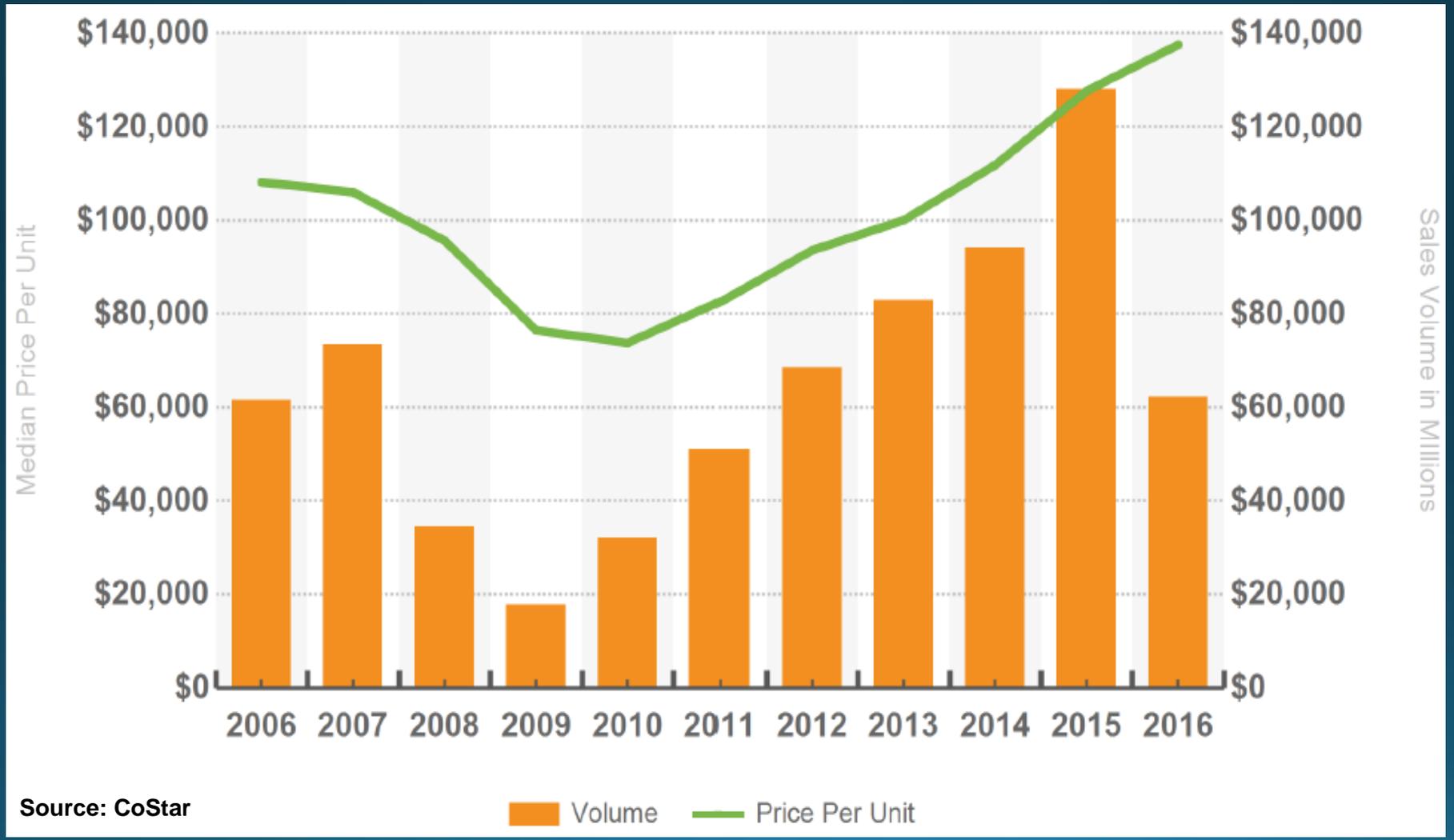
FRED Homeownership Rate for the United States



Multifamily construction will start to exceed absorption this year and the sector is expected to enter the over-supply phase within the next 12-24 months



Multifamily values are now over 20% higher than the last cyclical peak



Multifamily market cycles across the U.S.

Austin, TX
 Broward-PB, FL
 Charleston, SC
 Cleveland, OH
 Columbia, SC
 Greensboro, NC
 Greenville, SC
 Hartford, CT

Indianapolis, IN
 Long Island, NY
 Los Angeles, CA
 Memphis, TN
 Naples, FL
 New York, NY
 Orange County, CA
 Orlando, FL

San Diego, CA
 Sarasota, FL
 St. Louis, MO
 Tulsa, OK
 Wilmington, DE

Baltimore, MD
 Birmingham, AL
 Boise, ID
 Boston, MA
 Charlotte, NC
 Chicago, IL
 Cincinnati, OH
 Columbus, OH
 Dallas, TX
 Fort Worth, TX

Jacksonville, FL
 Kansas City, MO/KS
 Louisville, KY
 Miami, FL
 Minneapolis, MN
 Nashville, TN
 New Jersey, Coastal
 New Jersey, No.
 Oakland, CA
 Philadelphia, PA

Phoenix, AZ
 Pittsburgh, PA
 Portland, OR
 Richmond, VA
 Salt Lake City, UT
 San Francisco, CA
 San Jose, CA
 Seattle, WA
 Syracuse, NY
 Tampa, FL

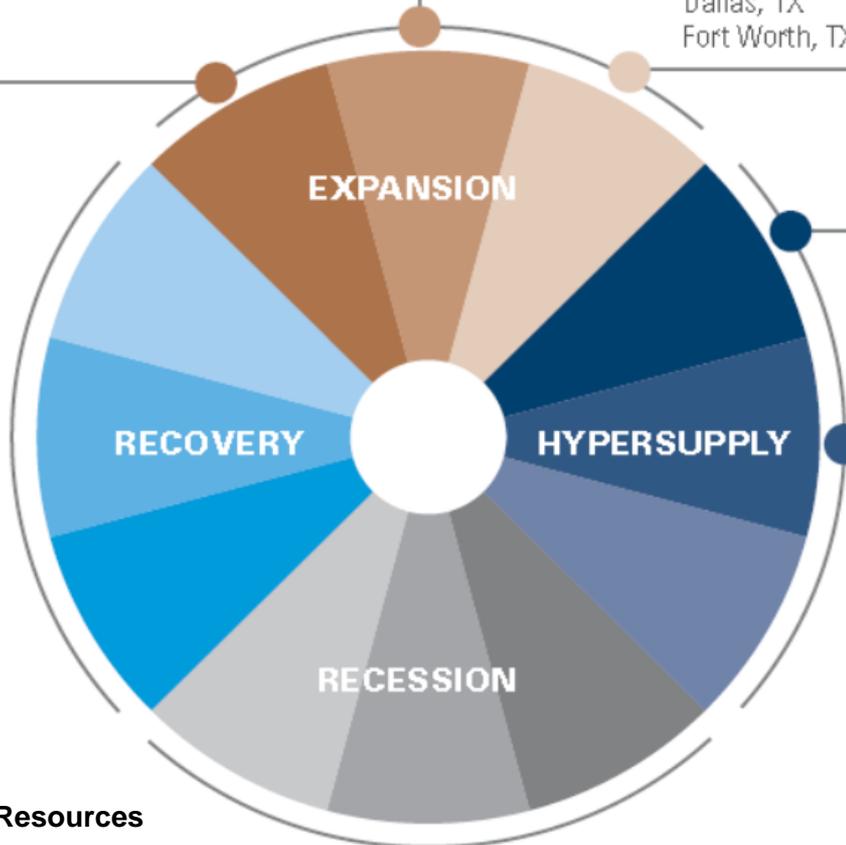
Dayton, OH
 Detroit, MI
 Jackson, MS
 Las Vegas, NV
 Providence, RI
 Sacramento, CA

Atlanta, GA
 Denver, CO

Houston, TX

Raleigh, NC

Washington, DC

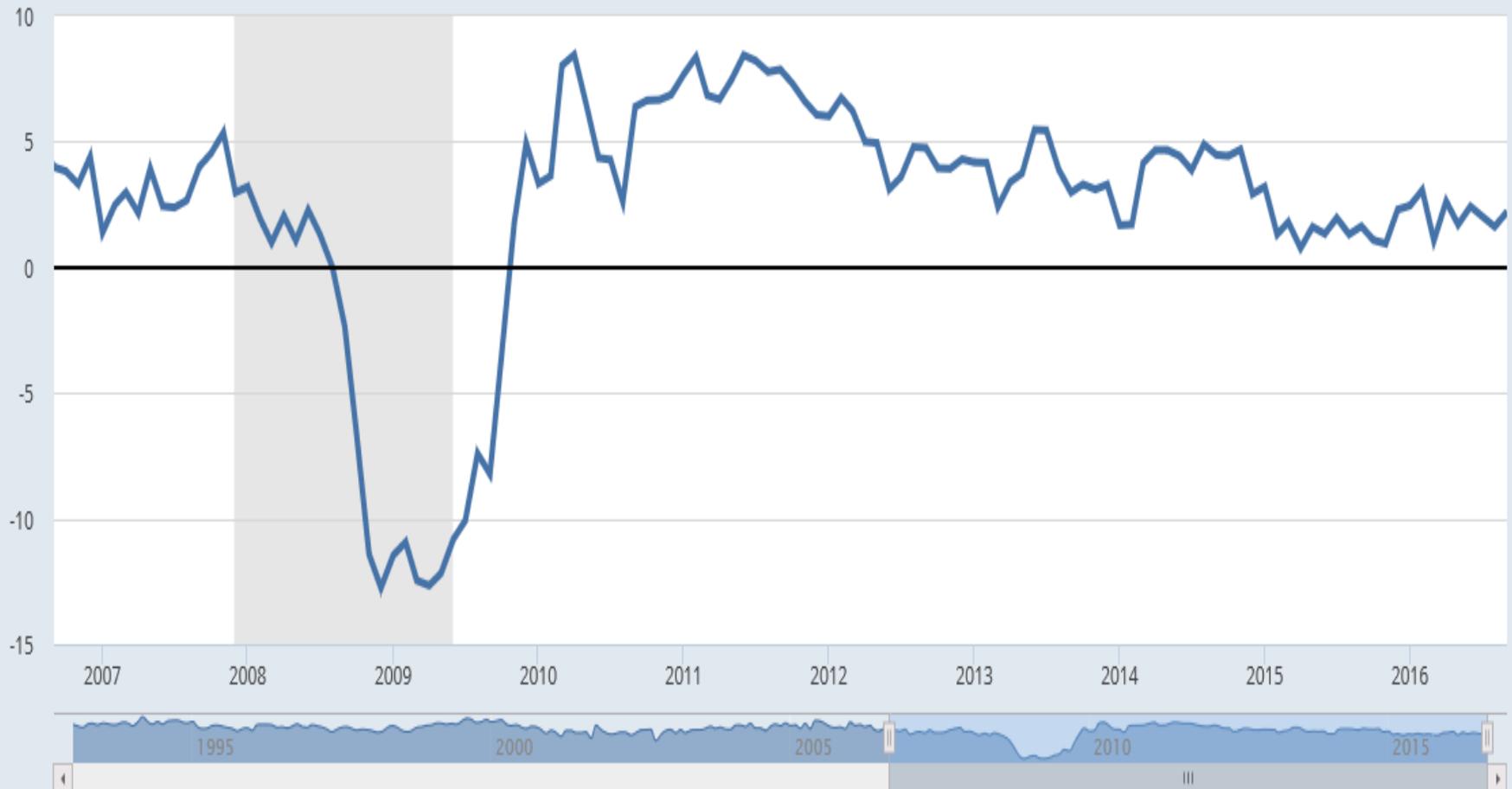


Source: Integra Realty Resources

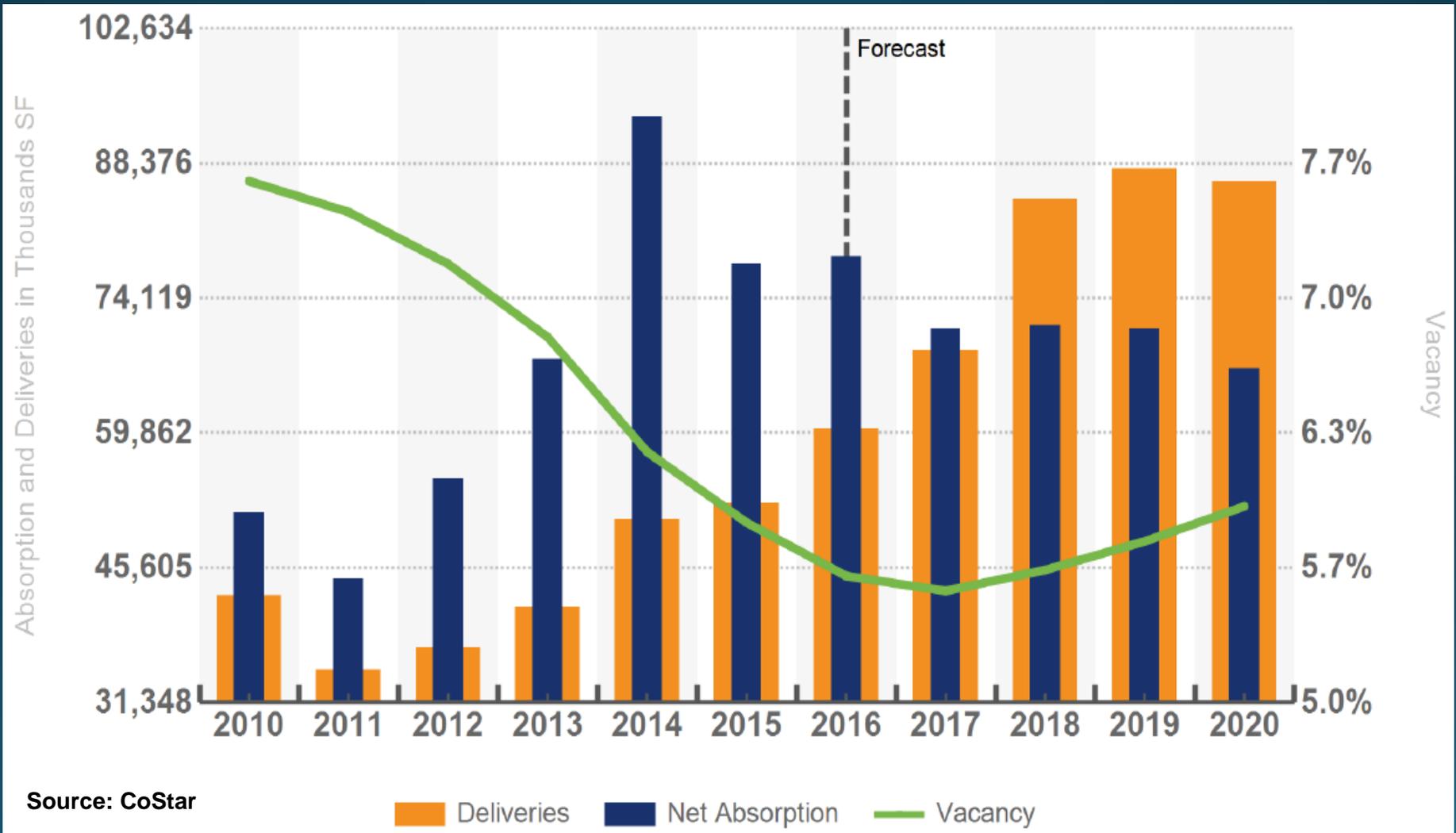
**Consumer spending drives retail sales
and improving retail sales have helped to
bolster the U.S. retail sector**

U.S. retail sales are currently growing at 2.2% annually.

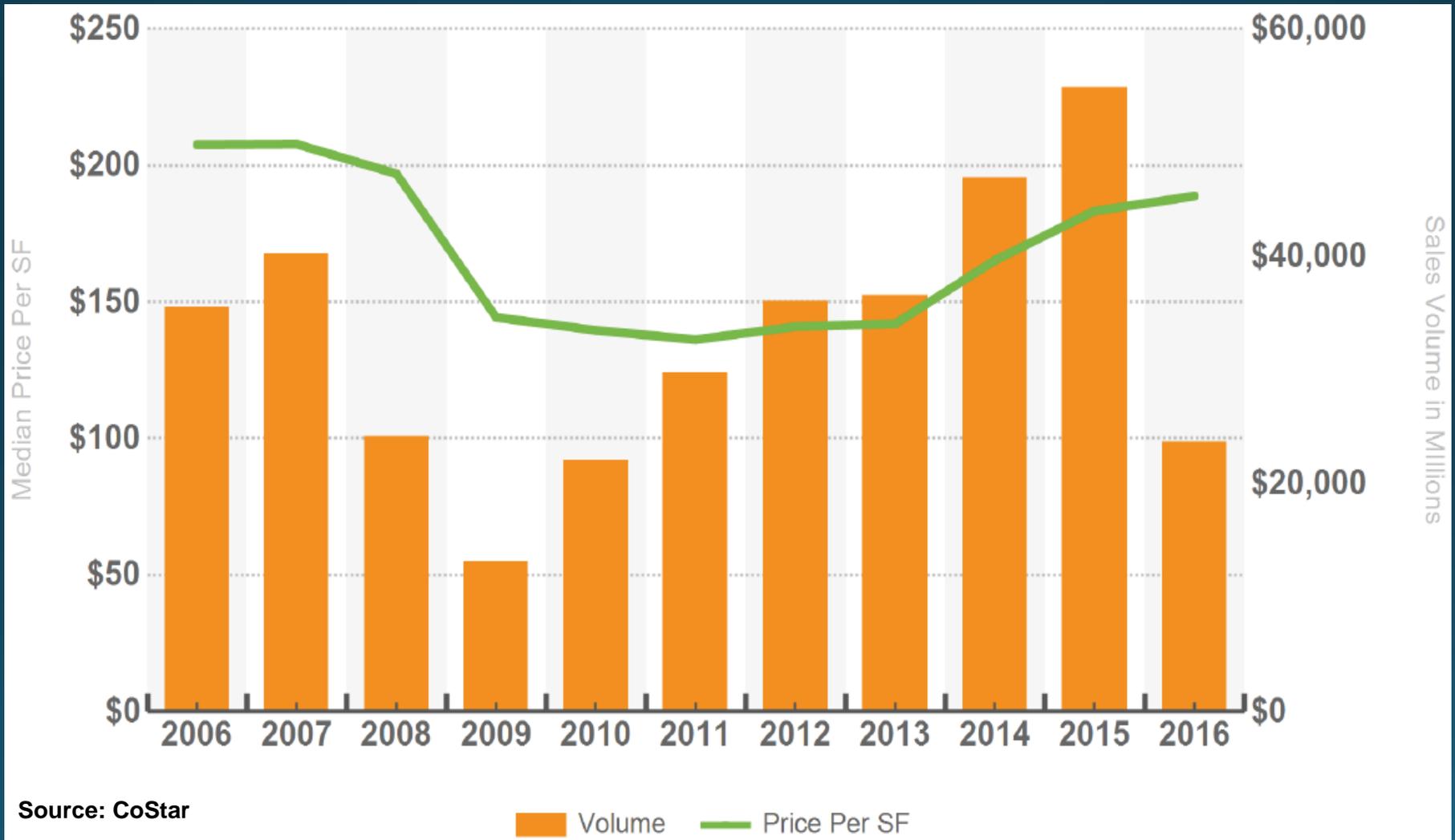
FRED  — Retail Sales: Total (Excluding Food Services)



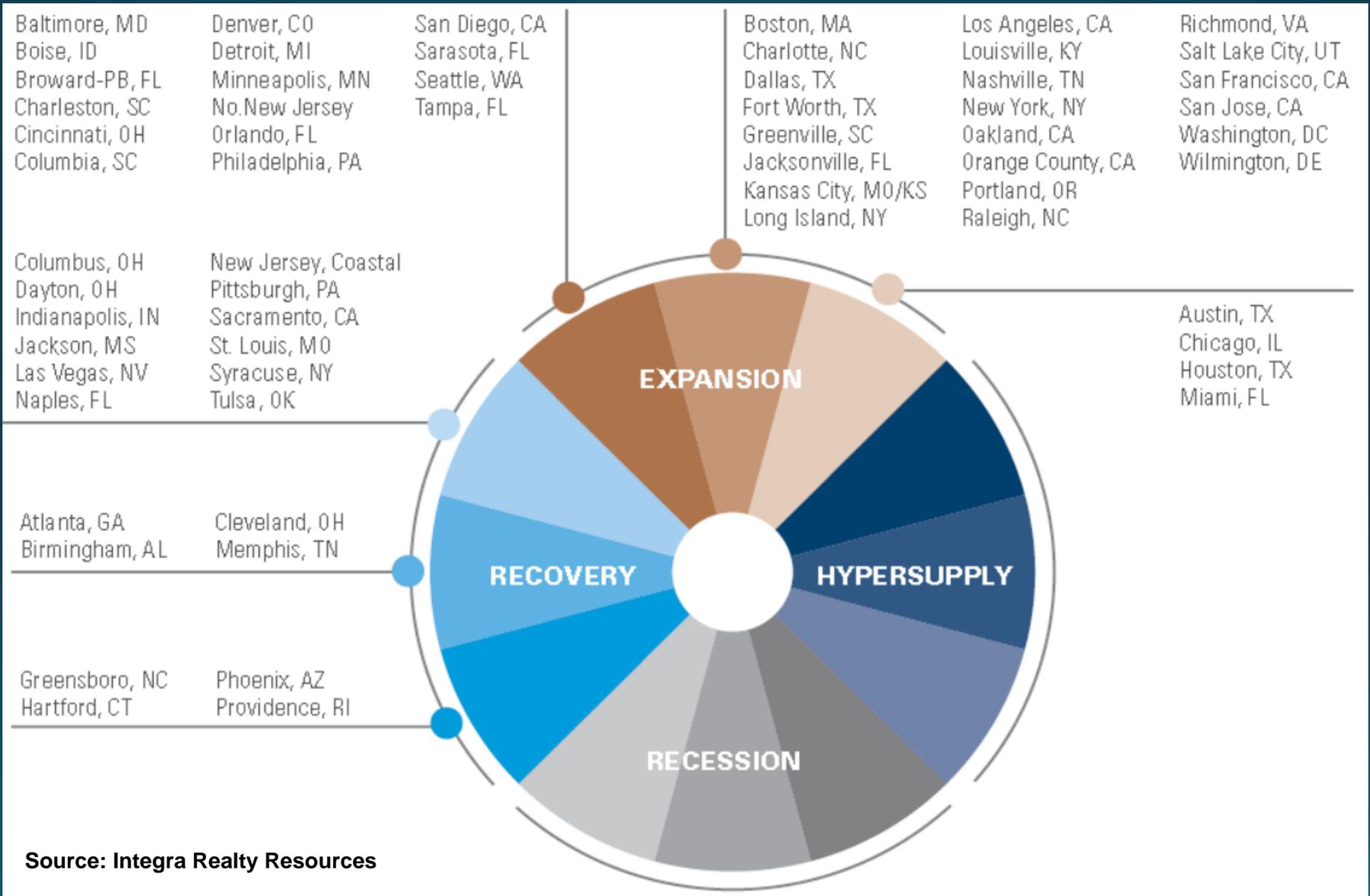
Retail absorption is still exceeding supply and the current expansion phase is expected to continue for the next 24-36 months



Retail values are around 10% below the prior cyclical peak



Retail market cycles across the U.S.



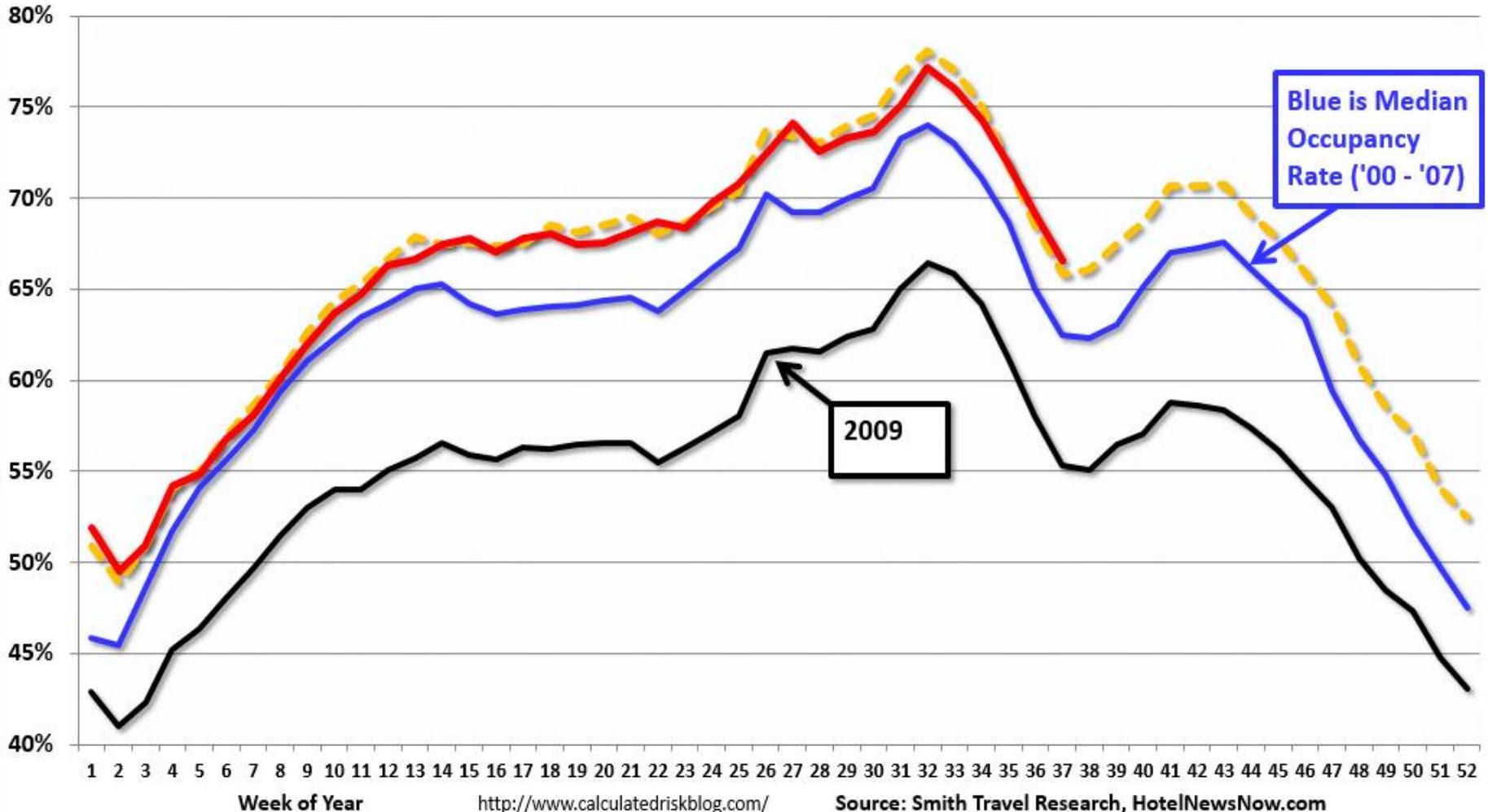
Source: Integra Realty Resources

Primarily driven by business travel, the hospitality sector tends to mirror the overall business cycle.

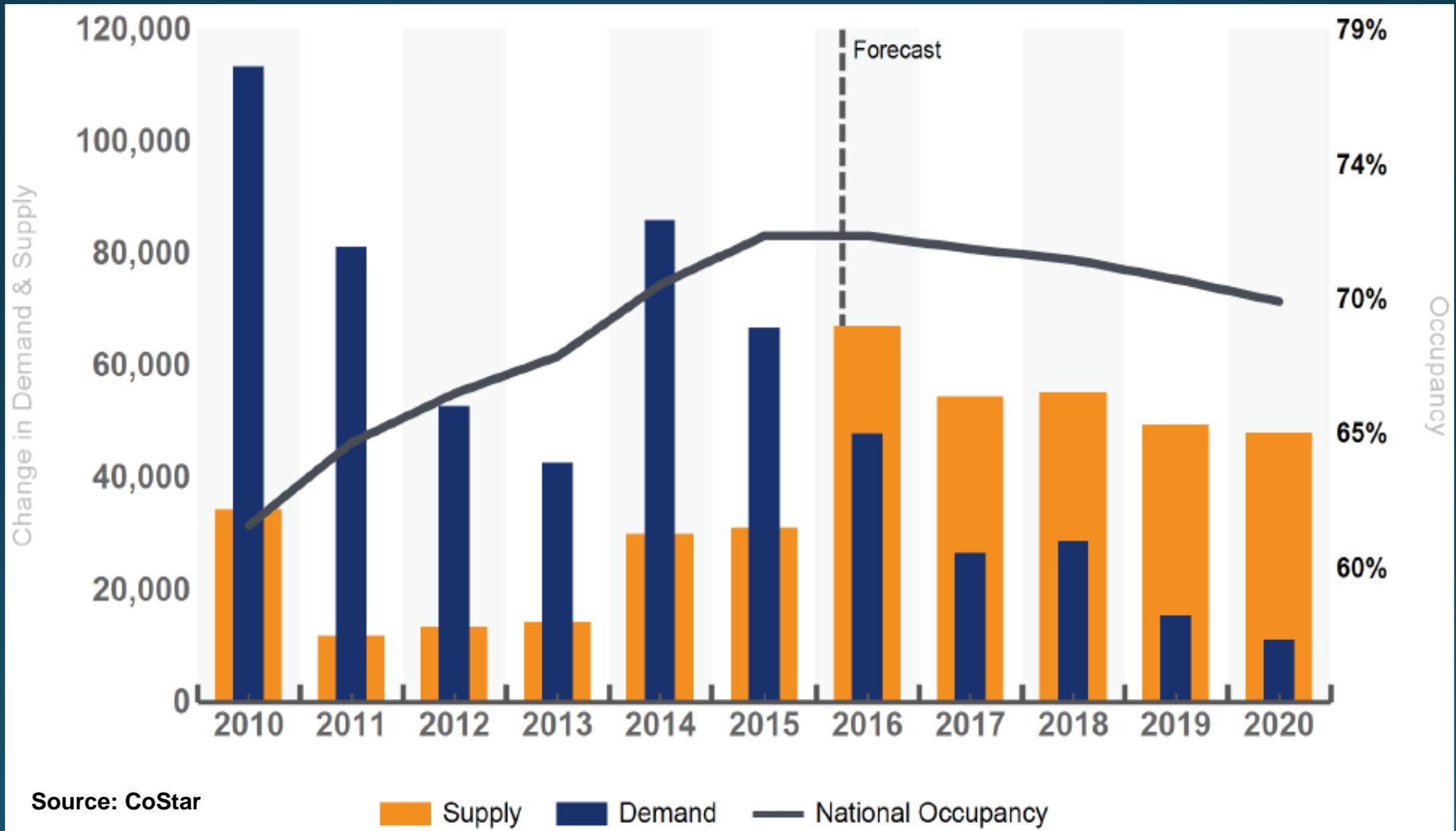
2016 has been a record year for hotel occupancy rates and RevPAR has reached a new peak

Hotel Occupancy Rate by Week of Year (4 week moving average)

— 2009 — Median (2000-2007) - - 2015 — 2016



New hotel construction is expected to exceed demand this year and the sector will likely enter the oversupply phase within the next 12-24 months



Hospitality market cycles across the U.S.

Cincinnati, OH
 Detroit, MI
 Jacksonville, FL
 Las Vegas, NV
 Long Island, NY
 New Jersey, No.

Orange County, CA
 Philadelphia, PA
 Providence, RI
 Sacramento, CA
 Salt Lake City, UT
 St. Louis, MO

Syracuse, NY
 Tampa, FL
 Tulsa, OK
 Wilmington, DE

Atlanta, GA
 Austin, TX
 Boise, ID
 Charleston, SC
 Charlotte, NC
 Columbus, OH

Dallas, TX
 Fort Worth, TX
 Houston, TX
 Louisville, KY
 Minneapolis, MN
 Orlando, FL

Raleigh, NC
 Richmond, VA
 San Diego, CA
 San Francisco, CA
 Seattle, WA

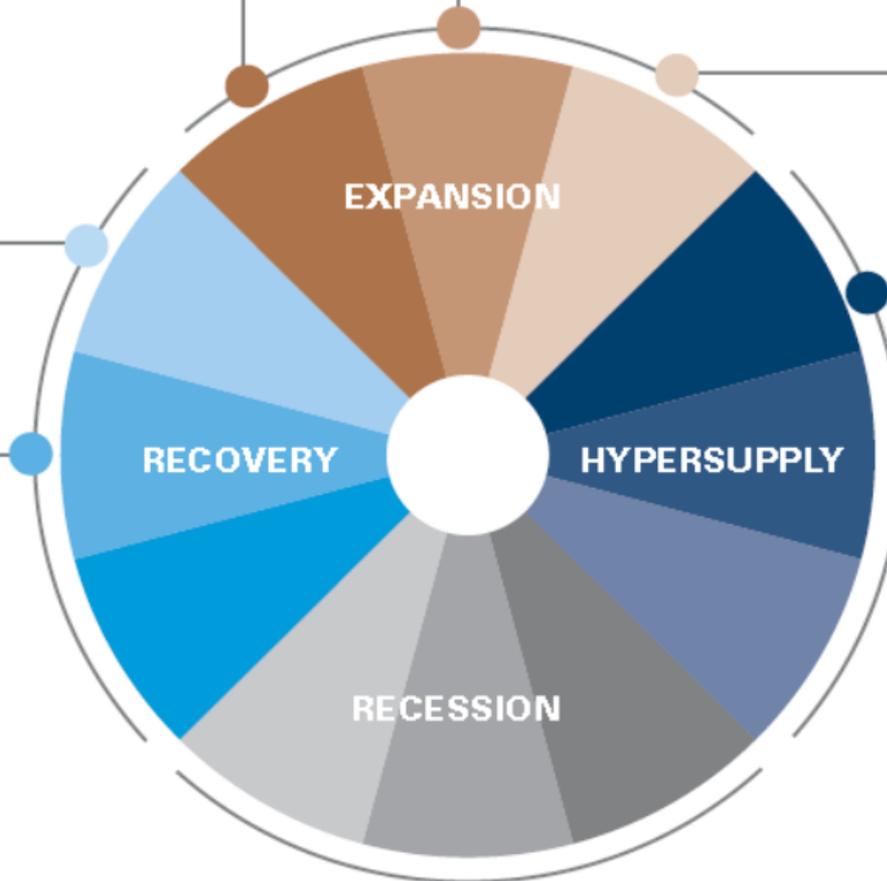
Columbia, SC
 Dayton, OH
 Jackson, MS

New Jersey, Coastal
 Phoenix, AZ

Greensboro, NC

Boston, MA
 Chicago, IL
 Denver, CO
 Indianapolis, IN
 Portland, OR

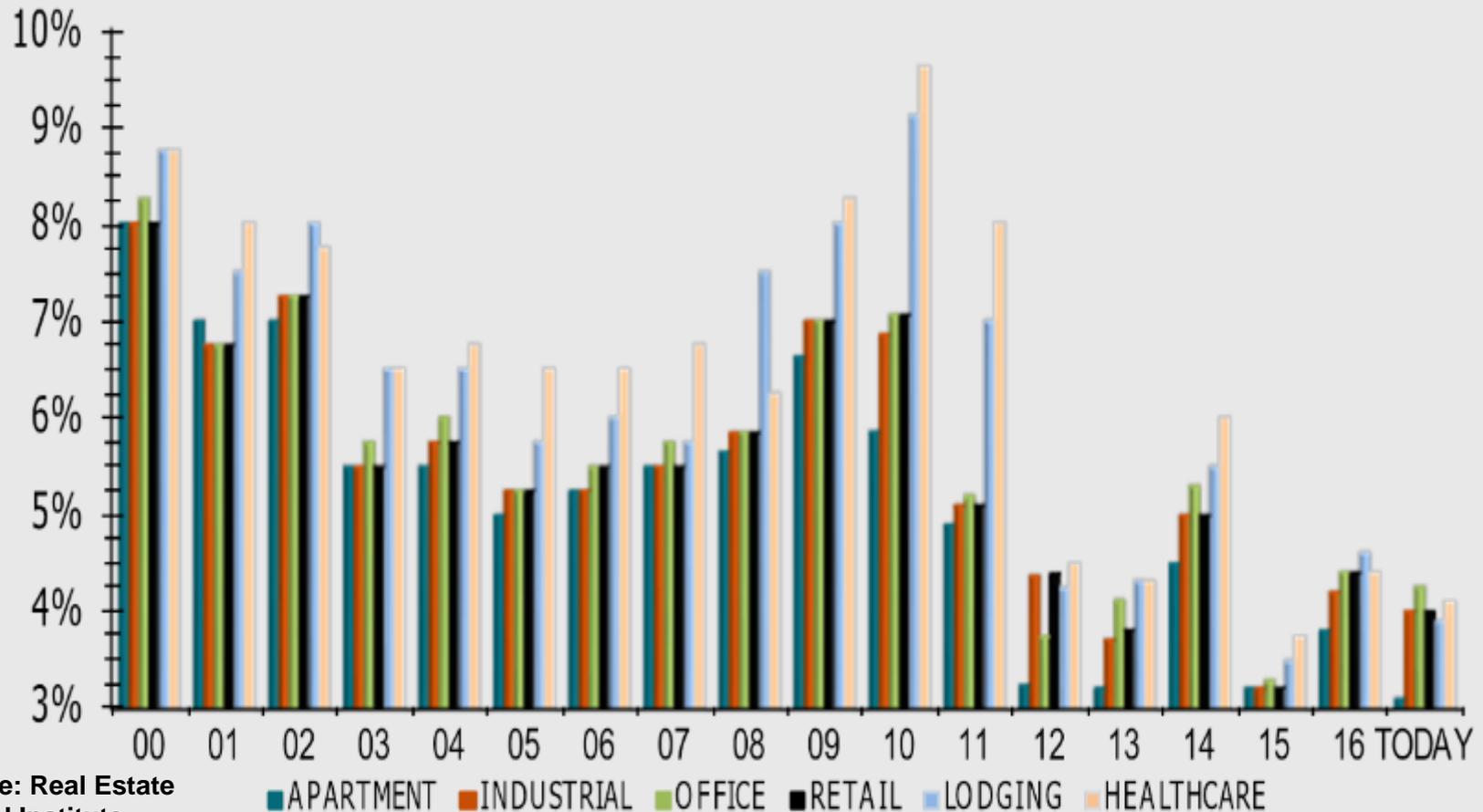
Miami, FL
 New York, NY
 Pittsburgh, PA



Source: Integra Realty Resources

Mortgage rates remain low and ample debt capital is available, however banks are reducing inventory for new construction loans.

Mortgage Rates by Property Type



Source: Real Estate
Capital Institute

Outlook for U.S. Commercial Real Estate Markets:

- Office and retail demand continues to increase but industrial, apartments and hotels are expected to enter the oversupply phase within the next 12-24 months.
- The industrial, apartment and hotel values are currently above their previous cyclical peak.
- Capital seeking to invest in commercial real estate is diverse and plentiful
- Recent FIRPTA reforms (removed tax penalty imposed on foreign pension funds) has increased foreign demand for U.S. real estate.
- Interest rates remain low but banks are starting to cut back on construction lending.
- Local market areas with the strongest competitive advantages to attract employment will continue to grow at the fastest rates.