ABOUT VIEWPOINT

Integra Realty Resources (IRR) is one of the largest independent commercial real estate valuation and consulting firms in North America, with over 180 MAI-designated members of the Appraisal Institute among over 600 professionals based in our more than 50 offices throughout the United States and the Caribbean. Founded in 1999, the firm specializes in real estate appraisals, feasibility and market studies, expert testimony, and related property consulting services across all local and national markets. Our valuation and counseling services span all commercial property types and locations, from individual properties to large portfolio assignments. For more information, visit www.irr.com.

COMPREHENSIVE COMMERCIAL REAL ESTATE MARKET RESEARCH, VALUATION AND ADVISORY SERVICES

ABOUT IRR

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These designations from the most prestigious real estate organizations in the world mean that from a culture of quality and ongoing professional development, we can offer unparalleled expertise in appraisals, feasibility and market studies, expert testimony, and related property consulting services across all local and national markets. IRR stands ready to serve you with unmatched Local Expertise...Nationally.

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CRE TRENDS

3 Chairman’s Letter

5 Economy 2020
In the face of mixed signals, deceleration seems to be the trend

9 Employment
Joblessness is at a decades-level low, and a dramatic slowdown seems sure to follow

11 Housing
The way we live is changing—and supply must adjust to meet new demands

PROPERTY REPORTS

16 Office
Perception of what the market needs is bumping up against the reality

20 Multifamily
We recognize the rise of the renter, and optimism rises accordingly

24 Retail
Exploring the who, what, where, how, and why helps us see the horizon

28 Industrial
As e-commerce explodes, the physical and logistical support keeps pace

32 Hospitality
There is a surge of supply in the pipeline, awaiting the demand to meet it

MARKET DATA

36 2020 Investor Rates Table
Our comprehensive guide to all capitalization, discount, and reversion rates by market

SPECIALTY REPORTS

39 Healthcare & Senior Housing
The Boomers are getting ready to make their needs known in a big way

42 Caribbean Hospitality
Most signs are pointing to a tenuous health, as long as the American market keeps visiting

45 Marijuana Real Estate
There are growing pains to navigate, and the initial thrills are appropriately tempered
CHAIRMAN’S LETTER

Anthony M. Graziano, MAI, CRE
CEO and Chairman of the Board
Integra Realty Resources, Inc.
As I reflected upon 27 years of reporting trends and forecasts on the U.S. national landscape, I thought about a speech I had heard a few years back by Steven Drubner, author of the best-seller “Freakonomics,” on the Folly of Prediction. Drubner observed that 1) Humans love to make predictions; 2) Human beings are not very good at predicting the future; and 3) Because the incentives to predict are quite imperfect, bad predictions are rarely punished—a situation unlikely to change.

Real estate experts, including all my esteemed colleagues throughout Integra and our competitors large and small, are asked to observe market prices, then forecast values based on the future economic opportunity of owning an interest in real property. As a matter of professional discipline, we are trained in the theory and mathematics used to explain why real estate possesses a certain value at a certain point in time to the market at large. This leads inevitably to the question: What is changing that could make values go higher or lower? In good times, when will the next recession hit? In bad times, when will the recession end?

I’d like to take a page from Drubner and say the entire dialogue around the next recession is predictive folly. Economists are often asked to gauge the timing and probability of the next recession. At present, Comerica Bank’s economists place the probability of a recession at 23% within 6 months; 53% within 12 months; and 63% over the next 36 months. In other words, there’s about a 50% chance that everything in 2020 will be just fine.

Short-term, the components of the economy that are seen to be warding off recession include very low unemployment, gains in existing home sales data, low mortgage rates, and improving incomes measured as wage growth. The headline harbinger of U.S. economic health is personal consumption’s 70% contribution to GDP. Of course, the problem is that all of these factors are inter-related and rely upon the U.S. consumer’s ability to earn and spend. Dramatic changes to the employment picture can easily eradicate all of these other “strengths” currently buoying the market psychology (including the stock market), and these changes can occur very quickly. Add global economic malaise, political turmoil in Great Britain and the Eurozone, U.S. tariff and immigration policy, and an upcoming presidential election year shadowed by an impeachment trial, and it might seem difficult to remain optimistic about the other side of our 50/50 coin-toss for 2020.

As experts, we must identify and examine these large-scale trends that could have an impact on the use and utility of real estate. We must challenge ourselves to ask how this might impact real estate values—ever mindful that prediction is folly.

Since Drubner assures me I won’t be punished for being wrong, I choose to be optimistic that the sun will remain shining in 2020. Nevertheless, I’m bringing an umbrella.

Our clients will do well to remember that identifying potential risks is not the same as experiencing them, but the knowledge gained in understanding risk helps mitigate the pain of the experience if it does come. Build responsibly, underwrite responsibly, go deeper on your market study requirements, question all assumptions, don’t over-leverage, understand exit strategies and sensitivities, and above all else, pay attention to the local market fundamentals.

We hope you enjoy the 2020 Viewpoint, and continue to desire balanced advice from Integra, where knowledge is power.
We begin our national overview with a closer look at a very big picture—the U.S. economy, where we explore the factors affecting our continued economic expansion, and discover opportunities among the challenges.
The opening of a new decade is an arbitrary beginning in the continuum of time. But, occasionally, such a turn does name the advent of an era whose import will only be known in retrospect. The turbulent 1960s and the disinflationary 1980s were such periods. The disruptive first decade of the 21st century was marked by the September 11th attacks and then the Global Financial Crisis. Let’s provisionally label the 2020s as “the decade of deceleration,” awaiting events ahead to birth its proper name.

Demography, technology, and shifting understandings about the shape of the future constitute the dominant forces influencing the economy in 2020 and the years ahead. And—this being a U.S. presidential election year—there is also politics.
Age cohorts are typically depicted in “population pyramids.” But the U.S. population no longer arrays itself as a “pyramid” with a large base of young people tapering to an apex of seniors. That shape has been shifting over the past several decades, and now we have a “population tower” with approximately equal cohort sizes from 0 – 4 years of age through 60 – 64 years. Economically, that implies a relatively steady-state based upon sheer headcount, with only greater longevity providing expansion in key variables including number of households, the base of consumers, and the workforce.

The U.S. population no longer arrays itself as a “pyramid” with a large base of young people tapering to an apex of seniors...now we have a “population tower.”

Of course, headcount is not the only determinant of growth, but sheer market size should not be discounted either. Nations with slow-growth populations—or, worse yet, negative change—have not fared well. Think Japan (since 1990), Italy, Spain, and the United Kingdom. Especially concerning for the United States is the slippage of our fertility rate (the number of births per woman over the child-bearing years) to 1.8, which is below the “zero population growth” standard of 2.1. This means the future population expansion of the U.S., a key foundation for economic demand, is totally dependent upon robust immigration volumes. Yet, as a matter of current policy, both legal and undocumented immigration is being constrained. This is one critical reason to see “deceleration” as the basic trend for the 2020s.

U.S. business investment growth is shrinking, with a 2.2% rate of increase in 2019 expected to drop by half to 1.1% in 2020.

GDP IN THE SHORT AND INTERMEDIATE TERM

The November 2019 Blue Chip Economists’ consensus forecast was titled, “Very Slow Growth Outlook for U.S. and Elsewhere.” Overall GDP growth for the United States was predicted at a meager 1.8%. Comerica Bank’s economists, also in November, placed the probability of a U.S. recession at 23% over the next six months (i.e., though May 2020), 40% over the 12 months through November 2020, 53% over 24 months, and 63% over 36 months. More startlingly, though, the Congressional Budget Office is pegging the entire decade of the 2020s as a period where GDP growth will average just 1.5%, and two percent growth will represent a rarely achieved peak.

WHAT’S GOING ON?

The economy is mixed as we turn into the New Year. John Donne famously penned “No man is an island,” and that applies to the American economy—the largest in the world, but still linked inextricably with other nations around the globe. According to the timeline maintained by the Peterson Institute for International
Economics, the U.S. administration, which had run on a “repeal NAFTA” platform in 2016, was quick to address foreign trade in 2017, beginning with the safeguard tariff recommendations on solar panel and washing machine imports that year. In 2018, those tariffs were imposed, followed by steel and aluminum exactions and wider tariffs on “intermediate goods” and consumer goods from China.

By 2019, almost 15% of all U.S. imports were subject to trade protection, with China, Canada, the European Union, South Korea, and Mexico the biggest targets. The administration has responded with subsidies, particularly in the U.S. agricultural sector, which is especially dependent upon export markets. Late 2019 has seen partial relief, with the new Mexico-Canada-United States trade pact replacing NAFTA passed in the House and a round of tariffs targeting China taken off the table as “Phase One” of a prospective bilateral agreement. The stock markets, which have been sensitive to the ups and downs of trade tensions throughout the year, find themselves at or close to historic highs.

As of this writing (mid-December 2019), the Blue Chip Economists’ survey still identified international issues—including trade but energy and currency factors as well—as the primary risk to the economic outlook. Because of the range and seriousness of these unknowns, U.S. business investment growth is shrinking, with a 2.2% rate of increase in 2019 expected to drop by half to 1.1% in 2020. This is reflective of CEO confidence, which in the Third Quarter of 2019 had dropped to its lowest level since 2009, according to The Conference Board.

WHAT ARE OUR STRENGTHS?

Personal consumption expenditures account for approximately 70% of U.S. GDP, and the consumer continues to do the heavy lifting for the economy as a whole. By far, consumption registered the greatest contribution to GDP growth in the most recent tallies published by the Bureau of Economic Analysis. Consumers are confident, reflecting an unemployment rate that has reached the lowest levels in a half-century and a stock market which has flirted with historical highs as 2019 moves towards its close. As of November, consumer confidence as reported by The Conference Board was still fairly high, despite a four-month trend toward softening.

Recognizing the disturbing signal of an inverted yield curve in mid-2019, the Federal Reserve took the exceptional step of lowering interest rates three times between July and October. Lowering the cost of money is a stimulative move taken prophylactically to forestall the recessionary risk signaled by the yield curve inversion. While this does use up some of the “dry powder” available to the Fed should other economic forces trigger a downturn, a lower cost of capital does strengthen the economy heading into 2020, much as the fiscal policy expansion buoyed conditions in 2018. The benchmark 10-year Treasury yield was a skinny 1.9% as of December 12th, down a full percentage point from a year ago. This is a sign of significant inflow of capital into the perceived safe harbor of “risk-free Treasuries” by both domestic and international investors.
The Central Bank’s hand has been freed, in part, by continuing low inflation across the economy. As of November, the year-over-year change in the Consumer Price Index stood at two percent. Although this was the highest point in twelve months for this measure, it was still at the lower end of the Fed’s target range and below the 2.5 – 2.9% peaks touched during 2017 and 2018. Relatively low inflation helps households as they manage their budgets and helps support measures of the economy such as “real” (inflation-adjusted) Gross Domestic Product.

### 3 ECONOMIC INDICATORS

**JOBS**

The benchmark unemployment rate at November 2019 was 3.5%, its lowest level since briefly touching 3.4% in 1968.

**GDP**

The Congressional Budget Office is pegging the entire decade of the 2020s as a period where GDP growth will average just 1.5%.

**MARKETS**

Pricing adjustments for both stocks and for real estate investments are anticipated, according to the Congressional Budget Office projections.
Unquestionably, it is the headline condition of labor markets that has earned the spotlight for those seeing the economy as spectacularly robust. The benchmark unemployment rate at November 2019 was 3.5%, its lowest level since briefly touching 3.4% in 1968. You would have to go back to 1952 to find a lower sustained level of joblessness.

Tightness in the labor markets is, candidly, one of the reasons why the absolute amount of job increases is already decelerating across the economy. Even as monthly job change numbers fluctuate, sometimes dramatically, employment increases have displayed a downward trajectory since peaking cyclically in 2015. Year-over-year job change peaked in February of that year at 3,122,000. After cooling through 2017, tax cuts and federal deficit spending spurred growth temporarily in 2018. But in 2019 the downward slope resumed and, at November 2019, year-over-year job change stood at 2,204,000.
FISCAL STIMULUS OF 2018 NOW DISSIPATING; JOBS TREND DECELERATING INTO THE 2020S

Employment increases have displayed a downward trajectory since peaking cyclically in 2015. These trends can also be seen in the Bureau of Labor Statistics JOLTS (Job Openings and Labor Turnover Survey) figures. The effects of the fiscal stimulus provided during an on-going economic expansion helped push the 2018 level of job openings up from 4.2% of the employment base in early 2018 to 4.8% by year-end. The dissipation of the temporary stimulus effect brought the number of openings back down to 4.4% as of the end of 2019’s Third Quarter. New hires have been narrowly fluctuating around 3.9%, while job separations (which include layoffs, retirements, and voluntary “quits”) have typically ranged around 3.7%. The spread between the hires and separations largely accounts for the reduction in the headline unemployment rate.

Readers of financial prospectuses are familiar with the common disclaimer, “past performance may not be indicative of future results,” a caveat to investors required by the Securities and Exchange Commission. This principle should be borne in mind while anticipating job growth in the year—and indeed in the decade—ahead. For while most casual observers of the economy may think that even if there is a recession, the aftermath would be a return to the job creation trajectory of 2013 – 2019, the baseline forecast of the non-partisan Congressional Budget Office begs to differ. As indicated in the accompanying table, the most dramatic deceleration in the 2020 – 2029 period is the shift from the approximately 200,000 jobs per month gains seen in recent years to a decade-long average of about 50,000 jobs per month.

To say that the equities markets and the real estate markets have not been factoring such a radical slowdown into current pricing would be a significant understatement. Current price-earnings ratios on Wall Street and capitalization rates manifestly do not compensate for this risk. The implications for final demand across the economy, and for both commercial and residential property utilization, are potentially alarming. If we have been considering markets “priced to perfection,” the assumptions governing future demand may prove imperfect to a hazardous degree. If the CBO projections are even approximately accurate, pricing adjustments for both stocks and for real estate investments should be anticipated, once the markets acknowledge a sharply slower long-term rate of growth.

### BY THE NUMBERS: THE ECONOMIC DECELERATION

<table>
<thead>
<tr>
<th>Economic Indicator</th>
<th>2017 - 2019</th>
<th>2020 - 2024</th>
<th>2025 - 2029</th>
</tr>
</thead>
<tbody>
<tr>
<td>Real GDP Annual % Change</td>
<td>2.5</td>
<td>1.8</td>
<td>1.8</td>
</tr>
<tr>
<td>Unemployment Rate (%)</td>
<td>4.0</td>
<td>4.2</td>
<td>4.7</td>
</tr>
<tr>
<td>Monthly Job Change (thousands)</td>
<td>195</td>
<td>48</td>
<td>50</td>
</tr>
<tr>
<td>Private Wage &amp; Salary Annual % Change</td>
<td>3.0</td>
<td>3.5</td>
<td>3.1</td>
</tr>
<tr>
<td>Net Exports (end of period, in $ billions)</td>
<td>-633</td>
<td>-790</td>
<td>-972</td>
</tr>
<tr>
<td>3-Month Treasuries (avg for period, in %)</td>
<td>1.7</td>
<td>2.3</td>
<td>2.5</td>
</tr>
<tr>
<td>10-Year Treasuries</td>
<td>2.5</td>
<td>2.7</td>
<td>3.2</td>
</tr>
<tr>
<td>FHFA House Price Index, End of Period (1990 = 100)</td>
<td>272.1</td>
<td>315.9</td>
<td>375.1</td>
</tr>
</tbody>
</table>
Among the many bifurcations describing the economy as we enter the 2020s, housing affordability grabs deserved attention. After all, housing is the one form of real estate immediately affecting everyone in the U.S. population.
Part of the housing problem is the mismatch between product on offer and the preferences of purchasers. As older homeowners seek to downsize, the McMansions preferred by the Boomer generations have little appeal to Millennials with later marriages, fewer children, and more urban lifestyles. Homebuilders, meanwhile, have little incentive to provide smaller and lower-profit “affordable” houses, especially given the high cost of land in many markets and uneven job and population growth patterns.

The National Association of Realtors cites factors such as low mortgage rates, a recent improvement in incomes, and continued job expansion as positive factors in gains registered by Existing Home Sales data. The “aftermarket” for U.S. houses reduced the number of unsold properties by 80,000 over the 12 months ending October 2019, to 1.77 million, about a four months’ supply at the current sales pace. The homeownership rate has returned to 64.8%, up from the trough of 62.9% in the second quarter of 2016 and solidly in the “normal” range which persisted in the quarter-century from 1970 to 1995. This is important to recall, when the “bubble peak” of 69.2% is considered in the housing discussion.

Part of the housing problem is the mismatch between product offered and the preferences of purchasers. As older homeowners seek to downsize, the McMansions preferred by the Boomer generations have little appeal to Millennials with later marriages, fewer children, and more urban lifestyles. Homebuilders, meanwhile, have little incentive to provide smaller and lower-profit “affordable” houses, especially given the high cost of land in many markets and uneven job and population growth patterns.

Demographics, again, must be considered in the evaluation of the current housing market and in expectations for the years ahead. Much has been made of the competitive gap between lower-cost housing markets—typically in the Sunbelt—and the extremely high prices prevailing in markets on both the East and West Coasts. This gap has been underscored in discussions of migration prompted not only by housing prices but also by the impact of the “SALT” (State and Local Taxes) Federal provisions limiting property and income tax deductibility, provisions creating downward pressure on the coastal markets.

One example of this perspective can be found in the accompanying graphic “Where Can Renters Find the Largest Supply of Affordable Homes?” Markets shown on the left (more affordable) end of the graph are disproportionately Sunbelt metros, while the right side (less affordable) is dominated by the coasts.
However, this needs to be put into some population perspective. As seen in the table of “Most Affordable and Least Affordable” metros (displaying the top and bottom 10 markets, among the 50 largest U.S. metros), the population gains in the more affordable areas have totaled just 1.8 million since 2010, a seven percent increase. Atlanta, Tampa, and Oklahoma City have been growing at an impressive double-digit percentage. But four of the “affordable” markets show population change ranging between Pittsburgh’s negative 1.3% to Birmingham’s 2.1%.

Meanwhile the larger and typically denser “bottom 10” display a 3.5 million population gain, or a net increase of six percent. Denver, Los Angeles, New York, and Seattle have posted population increases of 400,000 or more—followed closely by San Francisco and Riverside—a threshold exceeded only by Atlanta among the “top 10” affordability metros. Denver and Seattle post growth rates higher than any of the “top 10,” and even slower-growing New York metro matches the population percentage change of Birmingham.

The demographic expansion in the higher-cost housing markets suggests continued demand diversion into the rental apartment sector. This, in turn, has pushed several coastal states, including Oregon, California, and New York, to introduce or expand residential rental controls, much to the chagrin of investors in the multifamily sector. The path going forward is still uncertain. Will more states move in this direction? Will those states with rent control tweak their regulations as impacts become clearer? One thing seems sure, however—the supply/demand imbalances in the housing markets are at a critical point and the years ahead will see us come to a flashpoint where those imbalances will require urgent correction.

### MOST AFFORDABLE AND LEAST AFFORDABLE METROS – POPULATION PATTERNS 2010 - 2018

<table>
<thead>
<tr>
<th>METRO</th>
<th>2018 POP</th>
<th>2010 POP</th>
<th>CHANGE</th>
<th>% CHANGE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oklahoma City</td>
<td>1,396,445</td>
<td>1,252,987</td>
<td>143,458</td>
<td>11.45%</td>
</tr>
<tr>
<td>Louisville</td>
<td>1,297,310</td>
<td>1,235,708</td>
<td>61,602</td>
<td>4.99%</td>
</tr>
<tr>
<td>Memphis</td>
<td>1,350,620</td>
<td>1,324,829</td>
<td>25,791</td>
<td>1.95%</td>
</tr>
<tr>
<td>Birmingham</td>
<td>1,151,801</td>
<td>1,128,047</td>
<td>23,754</td>
<td>2.11%</td>
</tr>
<tr>
<td>Kansas City</td>
<td>2,143,851</td>
<td>2,009,342</td>
<td>134,309</td>
<td>6.68%</td>
</tr>
<tr>
<td>Pittsburgh</td>
<td>2,324,743</td>
<td>2,356,285</td>
<td>-31,542</td>
<td>-1.34%</td>
</tr>
<tr>
<td>Tampa</td>
<td>3,142,663</td>
<td>2,783,243</td>
<td>359,420</td>
<td>12.91%</td>
</tr>
<tr>
<td>Atlanta</td>
<td>5,949,951</td>
<td>5,286,728</td>
<td>663,223</td>
<td>12.55%</td>
</tr>
<tr>
<td>Indianapolis</td>
<td>2,048,703</td>
<td>1,887,877</td>
<td>160,826</td>
<td>8.52%</td>
</tr>
<tr>
<td>St. Louis</td>
<td>2,805,465</td>
<td>2,787,701</td>
<td>17,764</td>
<td>0.64%</td>
</tr>
<tr>
<td>Top Ten</td>
<td>23,611,352</td>
<td>22,052,747</td>
<td>1,558,605</td>
<td>7.07%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>13,291,486</td>
<td>12,828,837</td>
<td>462,649</td>
<td>3.61%</td>
</tr>
<tr>
<td>San Jose</td>
<td>1,999,107</td>
<td>1,838,991</td>
<td>162,116</td>
<td>8.83%</td>
</tr>
<tr>
<td>San Francisco</td>
<td>4,729,484</td>
<td>4,335,391</td>
<td>394,093</td>
<td>9.09%</td>
</tr>
<tr>
<td>San Diego</td>
<td>3,343,364</td>
<td>3,095,313</td>
<td>248,051</td>
<td>8.01%</td>
</tr>
<tr>
<td>Sacramento</td>
<td>2,345,210</td>
<td>2,149,127</td>
<td>196,083</td>
<td>9.12%</td>
</tr>
<tr>
<td>New York</td>
<td>19,979,477</td>
<td>19,567,410</td>
<td>412,067</td>
<td>2.11%</td>
</tr>
<tr>
<td>Denver</td>
<td>2,932,415</td>
<td>2,532,415</td>
<td>400,000</td>
<td>15.80%</td>
</tr>
<tr>
<td>Seattle</td>
<td>3,939,363</td>
<td>3,439,809</td>
<td>499,554</td>
<td>14.52%</td>
</tr>
<tr>
<td>Riverside</td>
<td>4,622,361</td>
<td>4,224,851</td>
<td>397,510</td>
<td>9.41%</td>
</tr>
<tr>
<td>Minneapolis</td>
<td>3,629,190</td>
<td>3,348,958</td>
<td>280,232</td>
<td>8.37%</td>
</tr>
<tr>
<td>Bottom Ten</td>
<td>60,811,457</td>
<td>57,359,102</td>
<td>3,452,355</td>
<td>6.02%</td>
</tr>
</tbody>
</table>

The supply/demand imbalances are at a critical point.
Much has been made of America’s divisions, frequently now labeled “tribalism.” Writ somewhat larger, this has been expressed in greater nationalism, set in contrast to “globalization.” A world of winners and losers is a common paradigm, and this is as common on one end of the political spectrum as the others.

Technology is a powerful force potentially countering the drifting apart, even if a digital divide still exists both in America and around the world. Technology as a tool can still be used as a wedge, but technology as a common milieu and a common language has great power to build bridges for us. The early 2018 unraveling of the New York City Amazon HQ deal has much to teach us about both those possibilities. The old-school deal-making that was publicly announced was exploded by the wedge-oriented groups excluded from the planning process. Intriguingly, most of the deal’s opponents can be assumed to be major users of Amazon Prime and plugged into Amazon’s Web Services. For all the huffing and puffing the company exhibited when pulling out of the agreement, Amazon spent the rest of the year hiring and signing leases elsewhere in the New York market. Technology’s search for talent rises above politics.

Ultimately, it should be expected that the pain of dysfunction, now so evident in the divisions of politics, the economy, and bifurcated real estate markets, will find itself confronting an equilibrium need far more powerful than the pricing equilibrium modeled by neo-classical economics. That more fundamental equilibrium need is for the internal balance we require as humans to sustain ourselves as individuals and as communities. This is already being expressed in the increasing influence of the ESG (Environmental, Social, and Governance) movement in the investment community.

It is also evident in the Business Roundtable’s August 2018 statement of “The Purpose of a Corporation,” which commits to “an economy that serves all Americans” and was signed by 181 CEOs. The business community has looked into the maw of dysfunction and declared “enough is enough.”

If “the decade of deceleration” is one potential label for the 2020s, then an alternative is a “decade of determined interdependence.” That’s a root American principle, after all. In 1776, signing America’s founding document, Benjamin Franklin said, “We must hang together, or assuredly we will all hang separately.” That spirit, termed “the soul of America” by historian Jon Meacham of Vanderbilt University, has sustained us for nearly 250 years and calls us beyond a win/lose approach to an economic view recognizing we are all in this together.

### LINKAGE OF ESG TO VALUE CREATION (PER MCKINSEY)

<table>
<thead>
<tr>
<th></th>
<th><strong>STRONG ESG PROPOSITION</strong></th>
<th><strong>WEAK ESG PROPOSITION</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Top Line Growth</td>
<td>Attracts customers with sustainable products; better access to resources due to government/community relations</td>
<td>Reputational risk stemming from human rights or product safety issues</td>
</tr>
<tr>
<td>Cost Reductions</td>
<td>Lower energy/water consumption</td>
<td>Higher waste output and disposal costs</td>
</tr>
<tr>
<td>Regulatory/</td>
<td>Earn subsidies and/or lesser unexpected compliance actions</td>
<td>Incur fines/penalties, and suffer restrictions on marketing</td>
</tr>
<tr>
<td>Legal Interventions</td>
<td>Higher employee motivation; greater talent attraction</td>
<td>Need to deal with social stigma</td>
</tr>
<tr>
<td>Productivity Uplift</td>
<td>Capital allocation with long-term payoffs: sustainable plant and equipment; control of environmental hazard</td>
<td>Exposure to premature write-downs; falling behind competitors as ROI falters over time</td>
</tr>
</tbody>
</table>

A generation of economists has stressed the need for scientific rigor in the study of societies, with the objectivity of the physical sciences as a model. Over the past quarter century, though, the behavioral economists have revealed, both by experiment and by convincing theory, that human societies and the individuals which comprise them act upon both rational and affective motivations. In simple terms, both psychology and profit count in the performance of markets.
We have come, for the time being, to the end of our economy-wide surge, as most segments see a slowdown.

The threats to commerce are real. By necessity, the retail sector has responded with creativity—to stay in place, and to stick to old strategies, means to falter.

Everything old must become new again to satisfy the requirements of a talented and nimble workforce. And everything new must address the access and sustainability needs of the future.

Whether due to affordability or changing social priorities, the apartment sector is in demand, and has specialists upbeat about the coming year.

The ending decade saw supply/demand measures at near peaks. There is enviable strength in the industrial real estate, and little reason to dampen interest in the coming year, despite an expected slowdown.

The signals are clear: Decelerating demand and data cross-currents indicate risk. Will 2020 surprise us with the occupancy and rates to hold the sector steady?
Buildings are fairly permanent. What goes on in buildings, however, changes. One of the great shifts of the 20th century was the eclipse of blue collar employment by tens of millions of white collar jobs. This shift accounts for the skylines of our great cities and the proliferation of office parks across our suburbs. In the early 21st century, the organization of the work performed in office properties began to shift as well. The “gig economy,” symbolized by the now-troubled We Work model, began superseding corporate tenancy. We are just beginning to discern the value impact of this transition.
TRANSACTION VOLUME

Transitions can be tricky. When the market discerns a turn for the better, acquisitions are bets on the future. When the market is concerned about trouble on the horizon, investors hedge their bets. Shifts in the allocation of investment, the provision or withdrawal of liquidity, can be signals of those market judgments.

Integra’s tracking of investment volume shows that the East and West regions found office deals up 14.9% and 14.03%, respectively. Aggregate sales for the year ending September 30th were greatest in the West, at $51.2 billion, followed by the East at $48.6 billion. The South was relatively flat with $30 billion in office transactions, less than 1% changed year-over-year. The Central region showed the most lassitude, with just $11.9 billion in office deals, down 14.9% from the prior year. So even though the year’s total of $141.6 billion, recorded by Real Capital Analytics, was moderately up (8.2%) for the period, the location of the “Bulls and Bears” gives us an important hint about expectations.

Size matters, especially in uncertain times. Investors favor markets that maintain liquidity even when troubles strike, and institutional investors craft their “exit strategies” accordingly. Thus, Manhattan, San Francisco, Seattle, Boston, Los Angeles, San Jose, and Washington, DC were the strongest capital magnets in 2019 (through the end of November). Of these, only L.A. and San Jose saw suburban volume exceed CBD activity.

Nevertheless, don’t count the suburbs out, especially in the automobile-heavy Sunbelt metros. In Texas, all the major metros (Austin, Dallas, Houston, San Antonio) saw suburban office volume outstrip their downtowns. The same was true for Atlanta and Charlotte in the Southeast, for Denver and Phoenix in the Intermountain West, and California markets, including San Diego and the East Bay. Markets with greater balance between CBD and suburban office deals can be found in Philadelphia, Chicago, Minneapolis, Miami, Nashville, and Sacramento.

MARKET CYCLE

Macroeconomic basics are considered strong for the office sector.

In last year’s Viewpoint we noted end-of-cycle signals, including “cash is king” behaviors. That can be seen in the relative steadiness of cap rates since last year (discussed below) despite the reduction in the benchmark Treasury rates. Leverage, as reported by Real Capital Analytics, has improved with the lowering of commercial mortgage rates, although this was partially offset by lenders ratcheting up the loan-to-value ratio on the margin. The effect has been to push debt service coverage ratios up, indicating a conservative posture toward future performance.

The majority of markets, both CBD and suburban, are considered to be in the Expansion phase of the cycle, according to this year’s Integra survey. Only five out of the 52 markets reviewed are deemed in Recession or Hypersupply.

<table>
<thead>
<tr>
<th>REGIONAL RATES COMPARISON – OFFICE</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CAP RATE</strong></td>
</tr>
<tr>
<td>CBD Class A</td>
</tr>
<tr>
<td>CBD Class B</td>
</tr>
<tr>
<td>Suburban Class A</td>
</tr>
<tr>
<td>Suburban Class B</td>
</tr>
</tbody>
</table>

**SOUTH REGION**
- CBD Class A: 6.55% (9.05%) $38.96 11.53% 1 bps
- CBD Class B: 7.63% (8.68%) $28.34 14.75% 9 bps
- Suburban Class A: 7.08% (8.19%) $27.46 14.83% -4 bps
- Suburban Class B: 8.07% (9.24%) $21.79 15.69% 3 bps

**CENTRAL REGION**
- CBD Class A: 7.82% (9.05%) $24.02 17.74% -7 bps
- CBD Class B: 8.52% (9.57%) $18.29 18.27% -5 bps
- Suburban Class A: 7.66% (8.80%) $23.86 16.27% -5 bps
- Suburban Class B: 8.41% (9.52%) $17.71 17.86% -9 bps

**WEST REGION**
- CBD Class A: 5.75% (7.46%) $41.90 11.31% -6 bps
- CBD Class B: 6.38% (8.00%) $31.55 15.87% -7 bps
- Suburban Class A: 6.18% (7.84%) $35.78 12.88% -5 bps
- Suburban Class B: 6.77% (8.54%) $28.12 14.51% -7 bps

**NATIONAL AVERAGES/SPREADS**
- CBD Class A: 6.66% (8.05%) $32.99 13.15% -2 bps
- CBD Class B: 7.52% (8.78%) $24.87 15.82% 0 bps
- Suburban Class A: 7.00% (8.30%) $28.02 13.86% -2 bps
- Suburban Class B: 7.77% (9.08%) $21.71 15.44% -3 bps
The most optimistic evaluations of asset appreciation in 2020 are for Sunbelt markets including Atlanta, Birmingham, Nashville, and Phoenix, as well as West Coast markets like San Francisco, the East Bay, and Seattle. As an outlier, Philadelphia’s older CBD properties are considered to have near-term appreciation potential of more than 4%.

Macroeconomic basics are considered strong for the office sector: low unemployment, expectations of continued job growth, and solid local economies are the most frequently cited factors for a positive outlook. The wild card, of course, is whether the economic trajectory in 2020 continues upward or instead begins the retrenchment suggested by many economists.

**CAP RATES AND VALUES**

We find a rational spread of rates, higher for Class B offices than for Class A, and higher for suburban markets than for CBDs.

On balance, our survey shows the end of the cap rate compression era, with 79% of markets expecting rates to remain stable (consistent with last year’s outlook), and 11% of markets anticipating a rise in rates. We find a rational spread of rates, higher for Class B offices than for Class A, and higher for suburban markets than for CBDs. Investors appear to be pricing risk more warily than earlier in this cycle.

In keeping with the liquidity preferences mentioned earlier, the lowest cap rates are in CBD capital magnets like Manhattan, San Francisco, Washington DC, Boston, and Miami. For suburbs, on the other hand, Orange County CA, Memphis, and San Jose post cap rates of 5.5% or lower.

**SUBURBAN OFFICE MARKET CYCLE**

<table>
<thead>
<tr>
<th>EXPANSION</th>
<th>HYPERSUPPLY</th>
<th>RECESSION</th>
<th>RECOVERY</th>
</tr>
</thead>
<tbody>
<tr>
<td>Decreasing Vacancy Rates</td>
<td>Increasing Vacancy Rates</td>
<td>Increasing Vacancy Rates</td>
<td>Decreasing Vacancy Rates</td>
</tr>
<tr>
<td>Moderate/High New Construction</td>
<td>Moderate/High New Construction</td>
<td>Moderate/High New Construction</td>
<td>Low New Construction</td>
</tr>
<tr>
<td>High Absorption</td>
<td>Low/Negative Absorption</td>
<td>Low Absorption</td>
<td>Moderate Absorption</td>
</tr>
<tr>
<td>Moderate/High Employment Growth</td>
<td>Moderate/Low Employment Growth</td>
<td>Low/Negative Employment Growth</td>
<td>Low/Moderate Employment Growth</td>
</tr>
<tr>
<td>Med/High Rental Rate Growth</td>
<td>Med/Low Rental Rate Growth</td>
<td>Low/Neg Rental Rate Growth</td>
<td>Low/Moderate Rental Rate Growth</td>
</tr>
</tbody>
</table>
Measuring the price of risk over time, the Central region displays the highest discount rates across all categories of office markets, while the West typically shows the lowest discount rates. This is a convenient way to estimate the overall expectations of actually receiving the cash flows generated by income-expense projections.

In general, the survey reveals lower levels of inflation in both rents and expenses than was the case in last year’s report. Intuitively, then, the responses align with the deceleration scenario discussed in this year’s Economic Overview.

As a takeaway observation, the putative change in the nature of office work seems to be accorded minimal weight in the minds of those performing quantitative analysis on office building values. Just as the buildings themselves prove themselves operationally adaptive, so too does continuity outweigh disruption over time. Nature does not take great leaps.

### TOP MARKETS BY OFFICE TRANSACTION VOLUME BASED ON YOY PERCENTAGE CHANGE

<table>
<thead>
<tr>
<th>Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19</th>
<th>Vol. Rank*</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Hartford</td>
<td>187.3%</td>
<td>$226.5 M</td>
<td>51</td>
</tr>
<tr>
<td>2</td>
<td>Kansas City</td>
<td>169.7%</td>
<td>$1,155.4 M</td>
<td>27</td>
</tr>
<tr>
<td>3</td>
<td>NYC Boroughs</td>
<td>142.7%</td>
<td>$2,624.8 M</td>
<td>17</td>
</tr>
<tr>
<td>4</td>
<td>Memphis</td>
<td>105.5%</td>
<td>$230.1 M</td>
<td>50</td>
</tr>
<tr>
<td>5</td>
<td>Salt Lake City</td>
<td>103.3%</td>
<td>$726.9 M</td>
<td>35</td>
</tr>
<tr>
<td>6</td>
<td>San Francisco</td>
<td>99.3%</td>
<td>$8,743.3 M</td>
<td>4</td>
</tr>
<tr>
<td>7</td>
<td>Birmingham (AL)</td>
<td>95.3%</td>
<td>$380.3 M</td>
<td>48</td>
</tr>
<tr>
<td>8</td>
<td>Austin</td>
<td>94.7%</td>
<td>$3,281.4 M</td>
<td>11</td>
</tr>
<tr>
<td>9</td>
<td>Stamford</td>
<td>90.4%</td>
<td>$596.5 M</td>
<td>39</td>
</tr>
<tr>
<td>10</td>
<td>Boston</td>
<td>82.0%</td>
<td>$9,474.7 M</td>
<td>3</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19</th>
<th>Vol. Rank*</th>
</tr>
</thead>
<tbody>
<tr>
<td>43</td>
<td>Detroit</td>
<td>-21.9%</td>
<td>$417.2 M</td>
<td>45</td>
</tr>
<tr>
<td>44</td>
<td>Phoenix</td>
<td>-24.8%</td>
<td>$2,759.8 M</td>
<td>16</td>
</tr>
<tr>
<td>45</td>
<td>Minneapolis</td>
<td>-31.1%</td>
<td>$1,764.3 M</td>
<td>22</td>
</tr>
<tr>
<td>46</td>
<td>Orlando</td>
<td>-32.1%</td>
<td>$666.2 M</td>
<td>36</td>
</tr>
<tr>
<td>47</td>
<td>Houston</td>
<td>-35.7%</td>
<td>$2,574.6 M</td>
<td>18</td>
</tr>
<tr>
<td>48</td>
<td>Chicago</td>
<td>-39.2%</td>
<td>$3,599.6 M</td>
<td>10</td>
</tr>
<tr>
<td>49</td>
<td>Raleigh/Durham</td>
<td>-41.0%</td>
<td>$1,245.4 M</td>
<td>24</td>
</tr>
<tr>
<td>50</td>
<td>Indianapolis</td>
<td>-42.7%</td>
<td>$443.8 M</td>
<td>43</td>
</tr>
<tr>
<td>51</td>
<td>Columbus</td>
<td>-47.2%</td>
<td>$199.3 M</td>
<td>52</td>
</tr>
<tr>
<td>52</td>
<td>Las Vegas</td>
<td>-52.4%</td>
<td>$431.1 M</td>
<td>44</td>
</tr>
</tbody>
</table>

* Volume Ranking is based on the overall transaction volume among 52 markets nationally
While it may not yet compare with Joe DiMaggio’s 56-game hitting streak, there can be no doubt that the rental apartment sector has enjoyed an exceptional range of success. There is no sign that 2020 will end that performance. Investors continue to pump capital into multifamily assets, even if headline transaction volume was off in late 2019 due to a falloff in megadeals. Cap rates remain exceptionally low, and the upward trend in pricing has been unabated. The hunt for yield and for solid individual asset stays active.
Mid-market and affordable housing generally remains in short supply...leading to optimism about further rent growth in most markets.

TRANSACTION VOLUME

Abundant capital in search of attractive product is the main storyline for 2019 and into 2020 for the multifamily sector. While luxury apartments suffer from overbuilding in spots, especially in the hot coastal cities, in general mid-market and affordable housing remains in short supply. This is leading to optimism about further rent growth in most markets, with the national average holding at 2.24% according to Integra’s survey results. However, a reaction is building in the form of more aggressive rent regulation due to both tenant activism and widespread concerns about homelessness across the nation.

Investor activity is exploding across the South and West, especially in suburban dominant markets such as Atlanta, Dallas, and Phoenix which feature large inventories of garden apartments. By contrast, mid-and high-rise multifamily assets are selling most vigorously in Manhattan, Los Angeles, and Seattle. But perhaps the most dramatic indicator of the search for yield is the composite transaction volume registered in so-called “tertiary markets” (those below the top 50 markets in size): those smaller metros accounted for $27.7 billion in apartment property deals through November 2019, according to Real Capital Analytics. With the exception of the Central region, all parts of the country are stepping up in acquisition volume in the multifamily property type.

A look at the buyers shows widespread interest. While nearly two-thirds of 2019 acquisitions have been made by private equity funds managed by the likes of Blackstone, Goldman Sachs, and Bridge Investment, other capital sources have been busy as well. Institutional investment managers such as Brookfield, TIAA, and Invesco have a market share of 22%, with cross-border investors capturing 7.1% of deal volume. Both the institutions and international buyers have ceded some market share to the private equity players, and to REITs such as BREIT, Equity Residential, and UDR.

The long bull market in multifamily means that there are tremendous profits to be captured, a factor that also fuels transaction volume as owners bring their properties to market. Interestingly, the distribution of sellers, by major category, closely resembled that of the buyers. This indicates two additional factors in the market. First, investors are seeking to rationalize their portfolios by asset substitution rather than by reallocation across asset categories. Second, existing properties rather than volumes of new construction are the supply-side to be considered in the multifamily capital investment space, which indicates the flow of funds could continue at a quite high level in 2020.

<table>
<thead>
<tr>
<th>REGIONAL RATES COMPARISON – MULTIFAMILY</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
</tr>
<tr>
<td>CAP RATE</td>
</tr>
<tr>
<td>SOUTH REGION</td>
</tr>
<tr>
<td>Urban Class A</td>
</tr>
<tr>
<td>Urban Class B</td>
</tr>
<tr>
<td>Suburban Class A</td>
</tr>
<tr>
<td>Suburban Class B</td>
</tr>
<tr>
<td>EAST REGION</td>
</tr>
<tr>
<td>Urban Class A</td>
</tr>
<tr>
<td>Urban Class B</td>
</tr>
<tr>
<td>Suburban Class A</td>
</tr>
<tr>
<td>Suburban Class B</td>
</tr>
<tr>
<td>CENTRAL REGION</td>
</tr>
<tr>
<td>Urban Class A</td>
</tr>
<tr>
<td>Urban Class B</td>
</tr>
<tr>
<td>Suburban Class A</td>
</tr>
<tr>
<td>Suburban Class B</td>
</tr>
<tr>
<td>WEST REGION</td>
</tr>
<tr>
<td>Urban Class A</td>
</tr>
<tr>
<td>Urban Class B</td>
</tr>
<tr>
<td>Suburban Class A</td>
</tr>
<tr>
<td>Suburban Class B</td>
</tr>
<tr>
<td>NATIONAL AVERAGES/SERIES</td>
</tr>
<tr>
<td>Urban Class A</td>
</tr>
<tr>
<td>Urban Class B</td>
</tr>
<tr>
<td>Suburban Class A</td>
</tr>
<tr>
<td>Suburban Class B</td>
</tr>
</tbody>
</table>
Roughly 35% of U.S. households fall into the renter pool. As discussed in our Economic Overview, macro forces are certainly shaping the demand side for rental apartments. The return of homeownership to its long-term historical average means that roughly 35% of U.S. households fall into the renter pool, that is approximately 45 million households. Even slow growth in that demand bumps up against the tepid pace of rental housing construction, about 360,000 units as 2019 comes to a conclusion. That’s a 1.2% increase in supply, even if we don’t consider demolitions or conversions taking units out of the inventory. No wonder the optimists remain in ascendency in the multifamily arena.

Integra’s survey evaluation of market cycles reflect this. The overwhelming majority of markets across the country are deemed to be in expansion. The only market considered to be mired in Recession is Little Rock, Arkansas. And there are few markets pegged as being in Hypersupply: Baltimore, Philadelphia, Atlanta, Charleston, Tampa, and Denver. That condition reflects excess inventory compared with absorption, leading to weakness in rent growth.

Expectations for rent growth are especially strong in the West and South regions, and fairly steady at about 2% increase the East and Central areas. Of particular note is the expected strength in suburban markets. This ratifies the overweighting of investment toward suburbs and toward garden apartments discussed in the Transaction Volume section immediately above.

### Multifamily Market Cycle

**Expansion**
- Decreasing Vacancy Rates
- Moderate/High New Construction
- Moderate/High Employment Growth
- Med/High Rental Rate Growth

**Hypersupply**
- Increasing Vacancy Rates
- Moderate/High New Construction
- Low/Negative Absorption
- Moderate/Low Employment Growth
- Med/Low Rental Rate Growth

**Recession**
- Increasing Vacancy Rates
- Moderate/Low New Construction
- Low Absorption
- Low/Negative Employment Growth
- Low/Neg Rental Rate Growth

**Recovery**
- Decreasing Vacancy Rates
- Low New Construction
- Moderate Absorption
- Low/Moderate Employment Growth
- Neg/Low Rental Rate Growth

---

**Multifamily Market Cycle Map**

- **Expansion**
  - Austin, TX
  - Jackson, MS
  - New Orleans, LA
  - Providence, RI

- **Hypersupply**
  - Indianapolis, IN
  - Las Vegas, NV
  - Long Island, NY
  - Los Angeles, CA
  - Memphis, TN
  - Nashville, TN
  - New York, NY
  - Orange County, CA
  - Orlando, FL
  - Sacramento, CA
  - San Diego, CA
  - Sarasota, FL
  - Tulsa, OK
  - Washington, DC
  - Birmingham, AL
  - Boise, ID
  - Broward-Palm Beach, FL
  - Charlotte, NC
  - Cincinnati, OH
  - Columbus, OH
  - Dallas, TX
  - Detroit, MI
  - Fort Worth, TX
  - Hartford, CT
  - Jacksonville, FL
  - Kansas City, MO/KS
  - Louisville, KY
  - Miami, FL
  - Minneapolis, MN
  - Naples, FL
  - New Jersey, Coastal
  - New Jersey, No.
  - Oakland, CA
  - Phoenix, AZ
  - Pittsburgh, PA
  - Portland, OR
  - Raleigh, NC
  - Richmond, VA
  - Salt Lake City, UT
  - San Francisco, CA
  - San Jose, CA
  - Seattle, WA
  - St. Louis, MO
  - Syracuse, NY
  - Wilmington, DE

- **Recession**
  - Austin, TX
  - Jackson, MS
  - New Orleans, LA
  - Providence, RI
  - Little Rock, AR

- **Recovery**
  - Austin, TX
  - Jackson, MS
  - New Orleans, LA
  - Providence, RI
**TOP MARKETS BY MULTIFAMILY TRANSACTION VOLUME BASED ON YOY PERCENTAGE CHANGE**

<table>
<thead>
<tr>
<th>Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19 Vol.</th>
<th>Vol. Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Long Island</td>
<td>615.1%</td>
<td>$914.5 M</td>
<td>42</td>
</tr>
<tr>
<td>2</td>
<td>Cleveland</td>
<td>119.4%</td>
<td>$711.0 M</td>
<td>45</td>
</tr>
<tr>
<td>3</td>
<td>Broward</td>
<td>119.0%</td>
<td>$2,275.4 M</td>
<td>26</td>
</tr>
<tr>
<td>4</td>
<td>Pittsburgh</td>
<td>67.8%</td>
<td>$552.5 M</td>
<td>47</td>
</tr>
<tr>
<td>5</td>
<td>Inland Empire</td>
<td>65.1%</td>
<td>$2,484.6 M</td>
<td>22</td>
</tr>
<tr>
<td>6</td>
<td>San Francisco</td>
<td>57.8%</td>
<td>$2,854.4 M</td>
<td>21</td>
</tr>
<tr>
<td>7</td>
<td>Westchester</td>
<td>53.3%</td>
<td>$823.2 M</td>
<td>43</td>
</tr>
<tr>
<td>8</td>
<td>Charlotte</td>
<td>47.5%</td>
<td>$3,486.7 M</td>
<td>15</td>
</tr>
<tr>
<td>9</td>
<td>Raleigh/Durham</td>
<td>42.4%</td>
<td>$3,531.4 M</td>
<td>14</td>
</tr>
<tr>
<td>10</td>
<td>Philadelphia</td>
<td>41.2%</td>
<td>$3,267.4 M</td>
<td>17</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19 Vol.</th>
<th>Vol. Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>43</td>
<td>Columbus</td>
<td>-8.2%</td>
<td>$972.6 M</td>
<td>40</td>
</tr>
<tr>
<td>44</td>
<td>Detroit</td>
<td>-10.3%</td>
<td>$442.0 M</td>
<td>50</td>
</tr>
<tr>
<td>45</td>
<td>Hartford</td>
<td>-12.6%</td>
<td>$291.9 M</td>
<td>52</td>
</tr>
<tr>
<td>46</td>
<td>St Louis</td>
<td>-14.3%</td>
<td>$730.9 M</td>
<td>44</td>
</tr>
<tr>
<td>47</td>
<td>Chicago</td>
<td>-14.4%</td>
<td>$4,176.4 M</td>
<td>12</td>
</tr>
<tr>
<td>48</td>
<td>Memphis</td>
<td>-17.4%</td>
<td>$522.6 M</td>
<td>49</td>
</tr>
<tr>
<td>49</td>
<td>Orlando</td>
<td>-24.6%</td>
<td>$3,110.5 M</td>
<td>18</td>
</tr>
<tr>
<td>50</td>
<td>Palm Beach</td>
<td>-28.1%</td>
<td>$1,009.2 M</td>
<td>39</td>
</tr>
<tr>
<td>51</td>
<td>Orange Co</td>
<td>-32.2%</td>
<td>$1,185.1 M</td>
<td>37</td>
</tr>
<tr>
<td>52</td>
<td>Stamford</td>
<td>-36.6%</td>
<td>$399.8 M</td>
<td>51</td>
</tr>
</tbody>
</table>

* Volume Ranking is based on the overall transaction volume among 52 markets nationally

Most markets across the country are deemed to be in Expansion.

**CAP RATES AND VALUES**

Consistent with market fundamentals, cap rate contraction even though rates a year ago seemed irreducibly low, with risk premiums that did not compensate investors adequately. That risk premium has expanded by 113 to 120 basis points, depending on property class and metro location. While Federal Reserve easing accounts for much of the increased spread, there is also a recognition that cash flow characteristics the conditions of market demand, and debt metrics showing disciplined loan-to-value ratios of about 68% and debt-service-coverage ratios rising above 1.5 by late 2019 indicate careful risk management in the sector overall.

Still, optimism doesn’t mean total ebullience, much less “irrational enthusiasm.” Few of IRR’s survey respondents expect further cap rate compression in 2020, and just a handful of markets like Portland, OR and Las Vegas expect 4% gains in their urban rental housing assets, with Orange County, CA and Ft. Worth suburban markets anticipating similar gains. That’s evidence of a consolidation of gains. If this be deceleration, the industry seems to be saying, let us make the most of it.
Cub reporters, for those who remember that term, are taught to tell their stories with “Five Ws and an H.” That is shorthand for identifying “who, what, when, where, how, and why.” This approach is particularly important for the retail real estate sector, which has been depicted with a very broad brush. Challenged by excessive inventory, fickle consumers, e-commerce competition, and investor aversion, how is it that retail property will still tally more than $50 billion in transaction activity in 2019?
TRANSACTION VOLUME

Let’s start with a look at buyers and sellers. Of the top 20 buyers (ranked by dollar volume), eight were REITs. Next were six developer/owners. These were followed by three investment managers, then by two insurance companies. The largest single capital investor, however, was the private equity firm Fortress, which surpassed the $1 billion mark. Taken together, these purchasers had committed $11.3 billion into the retail sector as 2019 drew to a close, or more than one-fifth of all acquisition volume in the stores sector.

Dispositions were somewhat less concentrated, but REITs also led the ranks of top sellers, with 7 of the 20 most active. But next in line, as a group, were six retail corporations. Five investment managers were in the top 20. In all, the 20 top sellers account for $11.6 billion in retail dispositions.

As might be expected by the classification of the traders and by the aggregate dollar volume, the foregoing deals featured “the big guys.” But there was plenty of activity in retail properties priced between $5 million and $10 million. In fact, not counting “one-off” buyers, there were 52 developer/owners purchasing 172 retail properties in that price range. Some larger investors were also active in this price range, with REITs closing 15 deals for 101 properties, and nine equity funds securing 46 retail assets. Interestingly, the vast majority of buyers in this price range were exclusively focused on retail assets, indicating that specialization may be the key to identifying opportunities in the stores sector.

So, that’s the “who.”

How about the “what?”

Most transaction activity focused on smaller asset types, such as neighborhood and community centers, including those anchored by grocery or drugstore chains. Real Capital Analytics, from which these transaction data were sourced, indicates that “small is beautiful” carries through in pricing, with larger centers trading at a 7% cap rate and “shops,” which include community and neighborhood retail, had a more aggressive 6% average cap rate across the country.

As to “where,” Integra’s analysis shows retail transaction volume down in all four major regions of the country. The decline was more than 20% year-over-year in the East, West, and South, and a lesser but still significant 18.4% in the Central region. If “deceleration” is the theme for the economy, retail property is already deep into experience of the slowdown.

REGIONAL RATES COMPARISON - RETAIL

<table>
<thead>
<tr>
<th></th>
<th>CAP RATE</th>
<th>DISCOUNT RATE</th>
<th>MARKET RENT ($/UNIT)</th>
<th>VACANCY RATE</th>
<th>4Q ’18 - 4Q ’19 CAP RATE D</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>GOING IN</td>
<td>DISCOUNT</td>
<td>ASKING RENT</td>
<td></td>
<td></td>
</tr>
<tr>
<td>SOUTH REGION</td>
<td></td>
<td>RATES</td>
<td>RATES</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Community Retail</td>
<td>7.05%</td>
<td>8.31%</td>
<td>$18.78</td>
<td>8.22%</td>
<td>▼ -1 bps</td>
</tr>
<tr>
<td>Neighborhood Retail</td>
<td>7.11%</td>
<td>8.30%</td>
<td>$17.17</td>
<td>8.60%</td>
<td>▲ 0 bps</td>
</tr>
<tr>
<td>Regional Mall</td>
<td>7.26%</td>
<td>8.36%</td>
<td>$26.32</td>
<td>7.41%</td>
<td>▲ 2 bps</td>
</tr>
<tr>
<td>EAST REGION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Community Retail</td>
<td>7.06%</td>
<td>7.97%</td>
<td>$25.09</td>
<td>8.52%</td>
<td>▼ 15 bps</td>
</tr>
<tr>
<td>Neighborhood Retail</td>
<td>7.24%</td>
<td>8.25%</td>
<td>$23.28</td>
<td>8.00%</td>
<td>▼ 19 bps</td>
</tr>
<tr>
<td>Regional Mall</td>
<td>6.86%</td>
<td>7.87%</td>
<td>$36.63</td>
<td>7.10%</td>
<td>▼ 28 bps</td>
</tr>
<tr>
<td>CENTRAL REGION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Community Retail</td>
<td>7.39%</td>
<td>8.36%</td>
<td>$16.74</td>
<td>10.33%</td>
<td>▼ -4 bps</td>
</tr>
<tr>
<td>Neighborhood Retail</td>
<td>7.78%</td>
<td>8.58%</td>
<td>$15.19</td>
<td>10.55%</td>
<td>▼ -6 bps</td>
</tr>
<tr>
<td>Regional Mall</td>
<td>6.96%</td>
<td>8.01%</td>
<td>$24.53</td>
<td>7.45%</td>
<td>▲ 5 bps</td>
</tr>
<tr>
<td>WEST REGION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Community Retail</td>
<td>6.11%</td>
<td>7.60%</td>
<td>$30.57</td>
<td>6.70%</td>
<td>▲ 2 bps</td>
</tr>
<tr>
<td>Neighborhood Retail</td>
<td>6.27%</td>
<td>7.77%</td>
<td>$26.01</td>
<td>7.24%</td>
<td>▼ -1 bps</td>
</tr>
<tr>
<td>Regional Mall</td>
<td>6.17%</td>
<td>7.85%</td>
<td>$33.86</td>
<td>6.52%</td>
<td>▲ 6 bps</td>
</tr>
<tr>
<td>NATIONAL AVERAGES/SPREADS</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Community Retail</td>
<td>6.91%</td>
<td>8.09%</td>
<td>$22.29</td>
<td>8.31%</td>
<td>▲ 2 bps</td>
</tr>
<tr>
<td>Neighborhood Retail</td>
<td>7.07%</td>
<td>8.22%</td>
<td>$20.01</td>
<td>8.52%</td>
<td>▲ 3 bps</td>
</tr>
<tr>
<td>Regional Mall</td>
<td>6.89%</td>
<td>8.09%</td>
<td>$29.37</td>
<td>7.20%</td>
<td>▲ 10 bps</td>
</tr>
</tbody>
</table>

Specialization may be the key to identifying opportunities in the stores sector.

The elements of timing are less about cyclicity than they are about three other forms of change: disruption, trend, and change of state.
Turning to the subject of “when,” let’s consider how the market cycle is impacting retail property. Some 53% of U.S. metros are considered to be in the Expansion phase, characterized by employment growth, decreasing vacancy, and rental growth. While this is positive news, it means the 47% of the metro retail markets are not yet in expansion, a remarkable statistic for an overall business cycle now in its 11th year—a record.

For retail assets, though, the elements of timing are less about cyclicity than they are about three other forms of change: disruption, trend, and change of state. Clearly the continued rise of e-commerce has disrupted this property type enormously. In Q3 2019, e-commerce sales accounted for 11.2% of total, with more than $145 billion in online transactions. The trendline is clear: e-commerce is projected to grow its share to 16.2% by 2023, according to industry source eMarketer. That means that 55% of all additional retail sales for the next four years will be Internet-based, as opposed to the remaining 45% of growth being captured by stores themselves. The state of retailing has changed due to the so-called “clicks and bricks” approach. Expect that condition to intensify, especially in the decelerated economy of the 2020s.

**CAP RATES AND VALUES**

The “how” and “why” questions for retail are nicely illustrated by movement in cap rates, discount rates, and reversion rates. Cap rates have moved up moderately in the past year, despite the downward adjustment in the Treasury yield curve. This means that the Risk Premium in the cap rate has widened significantly, despite the apparent steadiness indicated by a few added basis points in the nominal rate of return. If this is true
of the going-in cap rate, it is even more dramatically so in the longer-range measures, the discount rate and the reversionary cap rate. There, a small upward adjustment has been observed despite a 100 basis point decline in the benchmark 10-year Treasury,

So the cap rate is telling that the preference for income-in-place has risen, and that expectations for significant appreciation have generally not tended toward optimism. There is a more positive answer, compared with last year, to the questions “Are investors being paid for the risks they are taking?” This also explains why investor groups typically geared toward the active management of their assets—those in the value-add and opportunistic investment style categories—dominate the buyer lists, especially for smaller properties priced below $10 million.

As usual, there are distinctions to be drawn by local markets, as seen in our rankings. But the key reporting this year has to be on the overall context of retail assets as they adapt to massive change in their investment environment.

### TOP MARKETS BY RETAIL TRANSACTION VOLUME BASED ON YOY PERCENTAGE CHANGE

**Bulls (Top 10)**

<table>
<thead>
<tr>
<th>2019 Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19</th>
<th>Vol. Rank*</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Kansas City</td>
<td>80.0%</td>
<td>$529.4 M</td>
<td>35</td>
</tr>
<tr>
<td>2</td>
<td>Richmond/Norfolk</td>
<td>65.0%</td>
<td>$975.7 M</td>
<td>16</td>
</tr>
<tr>
<td>3</td>
<td>San Francisco</td>
<td>57.5%</td>
<td>$1,557.6 M</td>
<td>7</td>
</tr>
<tr>
<td>4</td>
<td>Jacksonville</td>
<td>55.4%</td>
<td>$367.6 M</td>
<td>41</td>
</tr>
<tr>
<td>5</td>
<td>Palm Beach</td>
<td>52.5%</td>
<td>$819.7 M</td>
<td>18</td>
</tr>
<tr>
<td>6</td>
<td>Charlotte</td>
<td>48.6%</td>
<td>$736.0 M</td>
<td>25</td>
</tr>
<tr>
<td>7</td>
<td>Westchester</td>
<td>36.9%</td>
<td>$561.2 M</td>
<td>34</td>
</tr>
<tr>
<td>8</td>
<td>Austin</td>
<td>31.0%</td>
<td>$647.0 M</td>
<td>30</td>
</tr>
<tr>
<td>9</td>
<td>Raleigh/Durham</td>
<td>26.4%</td>
<td>$647.4 M</td>
<td>29</td>
</tr>
<tr>
<td>10</td>
<td>Inland Empire</td>
<td>24.4%</td>
<td>$1,509.1 M</td>
<td>8</td>
</tr>
</tbody>
</table>

**Bears (Bottom 10)**

<table>
<thead>
<tr>
<th>2019 Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19</th>
<th>Vol. Rank*</th>
</tr>
</thead>
<tbody>
<tr>
<td>43</td>
<td>Cincinnati</td>
<td>-46.5%</td>
<td>$204.2 M</td>
<td>46</td>
</tr>
<tr>
<td>44</td>
<td>Los Angeles</td>
<td>-46.8%</td>
<td>$3,499.9 M</td>
<td>1</td>
</tr>
<tr>
<td>45</td>
<td>Denver</td>
<td>-46.9%</td>
<td>$799.7 M</td>
<td>20</td>
</tr>
<tr>
<td>46</td>
<td>Stamford</td>
<td>-49.2%</td>
<td>$183.0 M</td>
<td>48</td>
</tr>
<tr>
<td>47</td>
<td>Houston</td>
<td>-56.2%</td>
<td>$1,453.8 M</td>
<td>9</td>
</tr>
<tr>
<td>48</td>
<td>Northern NJ</td>
<td>-57.8%</td>
<td>$800.7 M</td>
<td>19</td>
</tr>
<tr>
<td>49</td>
<td>Baltimore</td>
<td>-59.7%</td>
<td>$419.5 M</td>
<td>40</td>
</tr>
<tr>
<td>50</td>
<td>Cleveland</td>
<td>-63.4%</td>
<td>$143.2 M</td>
<td>50</td>
</tr>
<tr>
<td>51</td>
<td>Birmingham (AL)</td>
<td>-67.2%</td>
<td>$157.1 M</td>
<td>49</td>
</tr>
<tr>
<td>52</td>
<td>Long Island</td>
<td>-76.7%</td>
<td>$248.6 M</td>
<td>45</td>
</tr>
</tbody>
</table>

* Volume Ranking is based on the overall transaction volume among 52 markets nationally.
For sheer floor area, no other commercial property type can match industrial product. With 15 billion square feet across the nation’s 50 largest metros, industrial properties have nearly twice as much space as the retail sector, and three times the amount of America’s office markets. And yet, as compared with these other categories, industrial properties can scarcely be considered “oversupplied.” Vacancies are estimated at a mere 5% nationwide, while other property types post availabilities in the double-digits. It is no surprise, then, that the industrial real estate market is roaring ahead at a record pace.

One of the key features attracting large investors to real estate is diversification. This characteristic is sometimes poorly understood to mean a collection of different assets. But that is not quite the case. Diversification comes from assets that behave differently, with differences that mutually offset risks. The impact of e-commerce on commercial property has provided a case study in offsetting risks, as the negative impacts on retail have given rise to burgeoning demand for industrial properties servicing the online shopping fulfillment stream. If momentum in many parts of the economy is beginning its deceleration, for industrial assets momentum is accelerating into 2020.

Integra’s review of RCA transaction volume shows that industrial property investment rose a stunning 30.5% for the year ended Q3 2019. All regions participated in the rise, with the South leading at a 34.2% gain. But all major regions advanced more than 25% over the period. Nearly complete Q4 data available at this writing indicates the upward trend continuing, setting the stage for 2020.

The industrial real estate market is roaring ahead at a record pace.

The impact of e-commerce on commercial property has provided a case study in offsetting risks.
Institutional investors had a 37.9% acquisition market share in the sector during 2019, followed by private equity at 34.3% and REITs at 18.1%. But private equity were net sellers, claiming 39.3% of disposition volume. Cross-border investors were also net sellers, representing 20% of those cashing in on industrial assets. At the same time, institutional investors and REITs had a lesser volume of sales compared to purchasers, thus expanding their exposure to this sector.

Warehouse and distribution facilities, which have been termed “the back end of the Internet,” captured 80% of overall transaction volume, based on data through November, while flex/R&D space accounted for the...
balance, some $17.8 billion. California has the greatest number of high-volume flex markets, but Dallas, Phoenix, and Northern Virginia all post significant transaction activity in this sub-sector. The top distribution markets remain “the usual suspects:” Chicago, Los Angeles and the Inland Empire, Northern New Jersey, Dallas and Atlanta. However, the ubiquity of the distribution function, especially “last mile” requirements for e-commerce, means that tertiary markets around the country attracted a bracing $12.9 billion in warehouse investment.

Virtually all industrial markets are rated as “In Expansion,” the sole exceptions being Syracuse, NY, New Orleans, LA and Wilmington, DE, which are considered in Recovery. The breadth of strength in the industrial sector is remarkable, but of course that is what is fueling its robust transaction volume.

Such conditions are spurring vigorous expected rent growth across the board. On average Warehouse/
Manufacturing facilities are projected to see 2.72% rent increases in 2020, while Flex industrial anticipates a 2.41% gain. But some markets should advance even more swiftly. Port markets like Houston and Miami are slated for 4%+ rental gains, while Flex markets in Las Vegas, Northern New Jersey, Houston, and (surprise!) Cleveland could find rents rising more than 5% in the year ahead.

The driving force propelling the industrial market forward is clearly the expansion of e-commerce, which is predicted to increase market share even in a decelerating economy. The countervailing risk, still not fully quantified, is the potential disruption of goods flow resulting from tariff and trade policy. Thus far, the industrial markets appear to be adapting to this uncertainty, which could be waning as trade agreements materialize in 2020.

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It may seem anomalous that cap rates, discount rates, and reversion rates for industrials should be holding relatively flat in light of the pressure of capital and the solid fundamentals prevailing for the sector. In fact, though, these rates reflect the typical lease structure for the warehouse/distribution product that is the core of this property type. Unlike the gross lease that typifies other commercial real estate where there is significant exposure to expense variability, industrials more often have net leasing structures whereby operating expenses are covered by the tenant. That means, for the industrial market, a more bond-like cash flow expectation where more of the value is derived from income over the holding period and there is less speculative reliance on future appreciation. This helps smooth out cycles, enabling a greater degree of stability in required rates of return.

Thus we find Integra’s survey showing a national warehouse average cap rate of 6.61%, a discount rate of 7.22%, and a reversion rate of 7.81%. All are within ten basis points of their levels a year ago. For Flex properties, the current surveyed cap rate is 7.33%, discount rate is 7.85%, and reversion rate is 8.41%. The higher rates for Flex assets reflect a different competitive set—including some suburban office properties, a greater tendency to be special purpose buildings, and a more frequent use of gross leasing structures. All of these mean increased volatility for the Flex product compared with distribution facilities, warranting a higher risk premium in rates of return.

In the near term, 88% of warehouse markets expect increasing valuations in 2020, led by Orange County, CA and Portland, OR with 4%+ gains anticipated. Likewise, 74% of Flex markets are seen as having value increases in the year ahead, led by Orange County (again) and Las Vegas. Generally, though, markets will see more moderate gains or value stability over the coming twelve months.

**CAP RATES AND VALUES**

88% of warehouse markets expect increasing valuations in 2020.

**REGIONAL RATES COMPARISON - INDUSTRIAL**

<table>
<thead>
<tr>
<th>REGION</th>
<th>CAP RATE</th>
<th>DISCOUNT RATE</th>
<th>MARKET RENT ($/UNIT)</th>
<th>VACANCY RATE</th>
<th>4Q '18 - 4Q '19 CAP RATE D</th>
</tr>
</thead>
<tbody>
<tr>
<td>SOUTH REGION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flex Industrial</td>
<td>7.65%</td>
<td>8.58%</td>
<td>$9.33</td>
<td>7.34%</td>
<td>-13 bps</td>
</tr>
<tr>
<td>Industrial</td>
<td>6.88%</td>
<td>7.96%</td>
<td>$5.46</td>
<td>7.29%</td>
<td>-6 bps</td>
</tr>
<tr>
<td>EAST REGION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flex Industrial</td>
<td>7.22%</td>
<td>8.34%</td>
<td>$10.52</td>
<td>8.67%</td>
<td>-35 bps</td>
</tr>
<tr>
<td>Industrial</td>
<td>6.58%</td>
<td>7.83%</td>
<td>$6.86</td>
<td>7.74%</td>
<td>-10 bps</td>
</tr>
<tr>
<td>WEST REGION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flex Industrial</td>
<td>6.38%</td>
<td>7.79%</td>
<td>$12.30</td>
<td>8.81%</td>
<td>-14 bps</td>
</tr>
<tr>
<td>Industrial</td>
<td>5.70%</td>
<td>7.18%</td>
<td>$7.87</td>
<td>6.64%</td>
<td>-12 bps</td>
</tr>
<tr>
<td>NATIONAL AVERAGES/SPREADS</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flex Industrial</td>
<td>7.33%</td>
<td>8.41%</td>
<td>$9.97</td>
<td>7.89%</td>
<td>-18 bps</td>
</tr>
<tr>
<td>Industrial</td>
<td>6.61%</td>
<td>7.81%</td>
<td>$6.11</td>
<td>7.20%</td>
<td>-8 bps</td>
</tr>
</tbody>
</table>
The current expansion cycle has reached 115 months. The lodging market has been operating at peak levels for the past three years as the expanding economy absorbed new supply growth. On the surface, the 2019 U.S. lodging market appears to have had positive performance, but the market clearly experienced a slowdown in NOI and profits and a storm appears to be looming on the horizon.

What is causing this turbulence? Lackluster demand growth of 1.2% has not been strong enough to overcome a 2% increase in supply—and supply will continue to increase through 2021. This supply growth puts downward pressure on room rates. Occupancy rates began to flatten in 2019 and, according to STR, despite nine successive years in RevPar growth, the growth level has now decreased by 1%, leading to the worst year since the last recession. NOI and profits have been compressed due to increasing wages and salaries. Increased expenses, combined with flattening occupancies, are offsetting modest ADR growth that is not exceeding the rate of inflation. STR and Tourism Economics latest projections for 2020 forecast a decrease of 0.4% in occupancy to 65.7%; a modest increase in ADR of +0.9% to $132.50 and a modest increase in RevPar of +0.5% to $87.10. Supply is forecast to remain flat, when compared to 2019 at +2.0% and demand is expected to lag 2019 at +1.5%. This is ultra-significant, as there have been two consecutive months of negative RevPar growth, with 19 of the top 25 markets reporting decreases in RevPar. This clearly indicates a slowdown in the U.S. hotel market. The good news is that STR projects that 19 of the Top 25 markets are expected to see RevPar increases in 2020.

Transaction volumes, as measured by Real Capital Analytics (RCA), reached $40.6 billion annually over through Q3 2019. The South Region led all markets with $14.2 billion in sales, followed by the West at $12.1 billion, the East at $10.6 billion, and the Central at $3.7 billion. This volume represents a year-over-year increase of 18.5%. A total of 1,968 properties were sold, containing over 248,000 units. The 12-month average price per unit was $143,000/key with an average cap rate of 8.6%.
**IRR HOSPITALITY OVERVIEW:**

Full Service and Limited Service cap rates dropped to 9% and 8.7%, (-14 and -9 bps respectively) throughout 2019. The 2020 outlook anticipates that 51.7% of markets should see cap rates remaining constant, down from 60.6% in 2019. Approximately 32.7% of markets tracked expect Cap Rates to increase slightly (between 1 – 25 bps) over the next 12 months and 7% of markets expect Cap Rates to increase between 25 – 49 bps.

---

**TOP MARKETS BY HOSPITALITY TRANSACTION VOLUME BASED ON YOY PERCENTAGE CHANGE**

<table>
<thead>
<tr>
<th>Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19</th>
<th>Vol. Rank*</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Hartford</td>
<td>801.7%</td>
<td>$71.7 M</td>
<td>50</td>
</tr>
<tr>
<td>2</td>
<td>Miami</td>
<td>621.2%</td>
<td>$1,562.6 M</td>
<td>5</td>
</tr>
<tr>
<td>3</td>
<td>Palm Beach</td>
<td>517.0%</td>
<td>$1,228.9 M</td>
<td>9</td>
</tr>
<tr>
<td>4</td>
<td>San Diego</td>
<td>394.5%</td>
<td>$1,466.5 M</td>
<td>7</td>
</tr>
<tr>
<td>5</td>
<td>Cincinnati</td>
<td>312.1%</td>
<td>$297.3 M</td>
<td>24</td>
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<tr>
<td>6</td>
<td>Westchester</td>
<td>286.1%</td>
<td>$92.4 M</td>
<td>47</td>
</tr>
<tr>
<td>7</td>
<td>Stamford</td>
<td>232.7%</td>
<td>$53.2 M</td>
<td>51</td>
</tr>
<tr>
<td>8</td>
<td>Chicago</td>
<td>223.5%</td>
<td>$1,482.0 M</td>
<td>6</td>
</tr>
<tr>
<td>9</td>
<td>Northern NJ</td>
<td>203.0%</td>
<td>$576.8 M</td>
<td>18</td>
</tr>
<tr>
<td>10</td>
<td>Nashville</td>
<td>200.6%</td>
<td>$770.9 M</td>
<td>16</td>
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</table>

**Bears (Bottom 10)**

<table>
<thead>
<tr>
<th>Rank</th>
<th>City</th>
<th>YOY Change</th>
<th>Total 4Q18-3Q19</th>
<th>Vol. Rank*</th>
</tr>
</thead>
<tbody>
<tr>
<td>43</td>
<td>San Jose</td>
<td>-42.9%</td>
<td>$234.0 M</td>
<td>29</td>
</tr>
<tr>
<td>44</td>
<td>Richmond/Norfolk</td>
<td>-43.4%</td>
<td>$196.9 M</td>
<td>35</td>
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<tr>
<td>45</td>
<td>Austin</td>
<td>-44.9%</td>
<td>$212.7 M</td>
<td>33</td>
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<tr>
<td>46</td>
<td>Broward</td>
<td>-47.4%</td>
<td>$295.3 M</td>
<td>25</td>
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<tr>
<td>47</td>
<td>Memphis</td>
<td>-54.2%</td>
<td>$78.0 M</td>
<td>49</td>
</tr>
<tr>
<td>48</td>
<td>Kansas City</td>
<td>-59.3%</td>
<td>$114.6 M</td>
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</tr>
<tr>
<td>49</td>
<td>Inland Empire</td>
<td>-66.1%</td>
<td>$169.3 M</td>
<td>37</td>
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<tr>
<td>50</td>
<td>Indianapolis</td>
<td>-71.7%</td>
<td>$99.1 M</td>
<td>45</td>
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<tr>
<td>51</td>
<td>Las Vegas</td>
<td>-79.4%</td>
<td>$112.3 M</td>
<td>42</td>
</tr>
<tr>
<td>52</td>
<td>St Louis</td>
<td>-84.9%</td>
<td>$42.1 M</td>
<td>52</td>
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</table>

* Volume Ranking is based on the overall transaction volume among 52 markets nationally.
A total of 89.3% of IRR markets tracked entering 2020 are in the Expansion phase. The only exceptions are Louisville, experiencing Hypersupply market conditions, Pittsburgh experiencing Recession market conditions, and Dayton experiencing Recovery.

On average, Full Service ADRs are expected to increase at a rate of slightly lower than 1% in 2020, versus 2.4% in 2019. Expense growth rates are expected to increase in 2020, to 1.19%, versus 2.73% this time last year.

On average, Limited Service room rates are expected to increase at a rate of slightly less than 1% in 2020; down from 2.51% in 2019. Expense growth rates for 2020 for Limited Service properties are expected to drop to 1.23%, versus 2.67% at this time last year. The only Limited Service market expecting 4%+ ADR growth is Charleston.

IRR’s research indicates that 63% of markets should see increased valuations over the next 12 months, while 4% of markets should see a decrease in valuations during the same period.

Entering 2020, the Full Service product is In Balance in 81% of markets, and only 7% of markets are 2+ years away from being considered In Balance, with the remaining only 1 or 2 years away from reaching equilibrium. By comparison, 73% of Limited Service markets are In Balance, with another 23% within 2 years from being In Balance.

Property Income has supplanted Supply/Demand as the #1 factor likely to impact institutional real estate cap rates, followed by the investment segmentation (local, regional, national, international) and National economic conditions/GDP growth.

Local economy, job growth and unemployment ranked as the #1 factor likely to impact non-institutional real estate cap rates, followed by the Investment segmentation (local, regional, national, international), and then Supply/Demand.

**NOTABLE SALES AND M & A:**

Mega M&A transactions are slowing, but Eldorado Resorts is reportedly planning to purchase Caesar’s Entertainment Corp in a $17.3 billion deal, creating the largest owner/operator of U.S. gaming assets. Aimbridge Hospitality closed on its merger with Interstate Hotels & Resorts in October 2019, creating a combined company that will operate 1,400 branded and independent properties in 49 states and 20 countries. Park Hotels & Resorts closed on its $2.5 billion acquisition of Chesapeake Lodging Trust. Rumors have continued to circulate on either Marriott or InterContinental Hotels Group pursuing Accor.

**U.S. HOTEL CONSTRUCTION PIPELINE:**

According to Lodging Econometrics, the U.S. construction pipeline stood at 5,704 projects (+6% YOY) and 700,496 rooms (+8% YOY). Marriott continues to dominate the construction pipeline, followed by Hilton. As of the end of Q3 2019, Marriott had opened 193 new hotels with 24,208 rooms, accounting for 30% of all new hotel rooms that opened in the U.S. Marriott has a pipeline of 1,484 projects and 196,023 rooms, an increase of 8% YOY. Hilton’s 198 new hotels account for 285 of newly opened rooms, followed by IHG with 104 new hotels accounting for 13% of new rooms. Hilton Worldwide’s pipeline stood at 1,373 projects and 153,408 rooms as of Q3 2019, with both Marriott and Hilton’s pipeline standing at near all-time high levels. Despite eight consecutive quarters of growth, construction starts have decreased for two consecutive quarters and pipeline growth is anticipated to top out in 2020/2021.

**CURRENT AND EMERGING TRENDS:**

Millennials, along with their affinity to technology and higher hotel service expectations, are still dominating the travel demographics. Hotel operators are expected to continue to cater to this demographic, with the expansion of digital technology in smart rooms and IoT, with emerging trends identified as Artificial Intelligence, Virtual Reality, Augmented Reality, Robots and Facial Recognition. Operators will continue to cater to the current “hot button” demands for culturally immersive experiences, local experiences, amenities, personalization and sustainability, all while focusing on the expansion of direct bookings. Operators are expanding the availability of healthy organic food and drinks.

Modular construction is gaining momentum in the U.S. and could become the norm in a few years. According to Gensler Design, the modular option is not necessarily cheaper than conventional construction, but there are advantages in cutting time to market, thereby mitigating cost overruns and other risks. The prefabrication process also results in a higher-quality product. Expansion of this trend is being facilitated as lenders get on board with the typical 60 – 70% of entire construction cost needed up front to purchase the modules. Marriott will open it’s 32nd modular hotel, this one being the world’s tallest modular hotel, a 26-story, $26 million modular tower in New York City in 2020.
<table>
<thead>
<tr>
<th>CBD OFFICE</th>
<th>SUBURBAN OFFICE</th>
<th>INDUSTRIAL</th>
<th>FLEX INDUSTRIAL</th>
<th>URBAN MULTIFAMILY</th>
<th>SUBURBAN MULTIFAMILY</th>
<th>REGIONAL MALL RETAIL</th>
<th>COMMUNITY RETAIL CENTER</th>
<th>NEIGHBORHOOD RETAIL</th>
<th>LOGOS - FULL SERVICE</th>
<th>LOGOS - LIMITED SERVICE</th>
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<tr>
<td>EAST REGION</td>
<td>WEST REGION</td>
<td>SOUTH REGION</td>
<td>Intracoastal</td>
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*Note: The table contains detailed data on real estate investment rates for various property types across different regions.*
The deep dive into niche segments reveals growing pains, but also plenty of opportunity.
The Baby Boomers are not here yet, but their shadow is looming over senior housing. The 85+ demographic is the largest consumer of Senior Housing and is expected to grow by 1.30% per year for the next five years. The 75+ demographic is projected to grow at 5% per year for the next five years. All projections indicate demand for senior housing, skilled nursing and hospitals is increasing and will continue.

INDUSTRY PERFORMANCE

In 2019, senior housing inventory grew at 2.9% but construction vs. inventory is trending down after all-time highs in 2016 to 2018. The National Investment Center for senior housing and Care (NIC MAP) data service reported occupancy was flat: 87.8% in the third quarter of 2019 vs. 87.8% in 2018. Rent growth slowed to 2.7% from 2.9%. Public companies, like Brookdale and Capital Senior Living, who provide greater transparency and up-to-the-quarter insights, have experienced occupancy declines, as ever-increasing, older buildings compete with an increasing supply of newer, superior properties. RevPOR figures continue to increase.

INDEPENDENT LIVING

New construction increased in 2019 over 2018, driven by anticipation of a wave of baby boomers now entering their early 70s. Construction vs. inventory is at an all-time high. Market occupancies have trended downward since 2015, largely driven by new property absorption. Existing properties have maintained occupancies in most markets, and significant oversupply has not yet appeared while senior-restricted housing without dining services is rapidly growing and encroaching on traditional independent living demand.

ASSISTED LIVING

New construction continues in most major markets, but the pace has slowed compared to the peak construction years of 2016 and 2017. Absorption has not kept up with supply, and occupancies continue to trend downward in most markets, especially in markets where development costs are relatively low and developable land is readily available. Most major markets are now oversupplied with occupancies dropping into the mid-80s. Resident entry age and acuity continue to rise. Wage increases continue to place pressure on net incomes despite rent increases.
According to Real Capital Analytics, transaction volume for senior housing declined 22% in 2019 after a decline of 36% in 2018 and declined 28% for nursing homes after a decline of 6% in 2018. Capitalization rates for senior housing properties compiled by IRR have been relatively stable for the last year but are showing signs of increases.

SKILLED NURSING FACILITIES

Demand for senior housing will continue to increase. New supply volume is likely to decrease until occupancies recover in many markets. Lenders have shown additional caution. Until the oversupply is absorbed, transaction volume is expected to maintain its current volume or decrease, and capitalization rates are expected to increase slightly if interest rates rise.
INDUSTRY PERFORMANCE

Nursing home occupancy has been declining for years. Many factors have kept occupancy compressed, including a shift to greater home health and hospice use, rising managed care utilization, the influence of value-based care, and immense pressure to shorten the length of stay for rehab-based care. The population now aged 85+ is known as the “Silent Generation.” They experienced the Great Depression and were born in an era of lower birth rates. The Baby Boomers will not reach the 85+ bracket until 2029, when annual growth rates in this bracket are expected to be around 5.0% and demand for nursing home services are expected to increase as a result.

ACTIVITY

New construction volume is likely to remain modest until Baby Boomer demand changes the trajectory of nursing home occupancy. Wage increases and difficulty staffing continue to place pressure on facilities, especially those with slim margins. The number of facility closures is on the rise due to these pressures. Demand for skilled nursing will eventually increase with an aging population; however, advances in technology and the growing emphasis on value-based care will be offsetting forces.

TRANSACTIONS

Transaction volume remains steady with many of the recent sales being smaller scale operators or underperforming facilities. Capitalization rates for skilled nursing compiled by IRR have been relatively stable for the last year. Even with the mounting pressures, investors seeking higher potential yields in this sector is resulting in transaction activity.

OUTLOOK

A new payment model for Medicare (PDPM) began in October 2019. Initial reports are positive with similar to increased payments and savings on the expense side. The payment model is geared to more appropriately reimburse facilities based on resident needs. Sophisticated, better-positioned companies will likely gain from this change and transaction volume will likely consist of less-sophisticated owners getting out of the market.

HOSPITALS

MERGERS & ACQUISITIONS


Industry consolidation via mergers and acquisitions, a decade-long trend, continues to occur at a strong pace. Affiliations and partnership, although not as widely tracked, are also occurring at a strong pace. Independent hospitals continue to join larger systems for access to professional, IT, and financial resources. Buyers with profits and proven care models strive to capitalize on their strengths and gain footholds in secondary service areas. More-distressed hospitals are sometimes compelled to sell to smaller private companies with limited track records and investment capital. Most metro hospital markets are highly concentrated, limiting the potential for future like-kind M & A transactions. Rural markets are less concentrated and most hospitals and systems prefer to remain independent if they can.

CLOSURES

Rural hospital closures, as tracked by UNC’s Rural Health Research Program, hit a 15-year record high in 2019, at 18, through the end of November. The average annual number of rural hospital closures from 2013 through 2019 is near 15. Of the 18 closures in 2019, eight had critical access hospital designations, three had Medicare-dependent designations, and five were reimbursed by Medicare on the standard prospective payment system.
Stay-over arrivals to the Caribbean region in the top markets are up by nearly 6% year to date, while average daily rates for conventional hotels are up nearly 5%. However, conventional hotel occupancy is down over 3%, which continues to point to increasing supply and use of non-conventional accommodations by tourists.
The destinations reporting the largest increases in stayover arrivals are those which were the most affected by the 2017 hurricanes and are now rebounding (Anguilla +111%, St. Maarten +107%, U.S. Virgin Islands +44%, British Virgin Islands +77% and Puerto Rico +31%).

For October year to date, occupancy in the region is down 3.2%. For same period, the average daily rate increased 5.0% for the Caribbean. As a result, RevPar is up 2.5% for the year to date.

As of October 2019, the total number of rooms in inventory (regardless of closures) in the Caribbean grew by 1.54% to 254,119 in 1,923 projects over the same period in the prior year.

Demand growth exceeded that of supply in 2015 through 2017 but has lagged behind supply growth in the last two years.

Of the markets in our survey, the Cayman Islands is reporting the highest ADR for the reporting countries in the region at $462.74, followed by St. Kitts & Nevis and St. Lucia.

The highest growth in ADR was reported by the Cayman Islands, at 24.71% above the same period last year, followed by Puerto Rico (11.3) and Aruba (11.2%).

As of October 2019, STR reported 134 projects “Under Contract” in the Caribbean (excluding Mexico); totaling 30,184 rooms. This represents an astounding 55% increase in rooms “Under Contract” compared with December 2018; and an 57% increase in rooms “In Construction.”

The Dominican Republic leads the Caribbean in terms of the destination with the most rooms “In Contract” at 9,116 rooms, followed by Jamaica (5,395 rooms). The rooms which St. Lucia has in the pipeline represent more than 25% of the total existing room stock in that destination, with Cayman potentially adding rooms representing 16% of the existing inventory.
Based on the overall ratio of arrivals to rooms, the Caribbean will need to increase its overnight tourist arrivals by 15% to account for additions to supply and maintain consistent occupancy levels.

In general, Caribbean hotel performance demonstrates increasing revenues despite flat occupancy rates. Inventory of hotel room stock continues to increase, and the number of rooms in the pipeline continues to grow at higher and higher rates. Other than concerns regarding increasing supply, the region continues to benefit from tourism growth which predominantly comes from the American market.
There is probably no other industry impacted by regulation as much as the Marijuana Industry (MI). Regulations across the federal, state, county, city, town levels bear down on the industry. Multi-jurisdictional operators have to navigate an incredibly complex framework, most often limiting a firm’s ability to apply scalable operational practices commonly found in less-regulated industries.
The operators which consolidate and/or integrate both horizontally and/or vertically from changes in the legal landscape will also face headwinds related to securing funding for real estate and equipment, which are by far the most capital-intensive portions of the MI business. The cultivation, distribution, manufacturing, retail sales, and/or testing operators in the MI have mostly resorted to capital raising through private means, non-U.S. capital sources (many being firms domiciled in Canada).

The passage of federal regulation such as the SAFE Act and the STATES Act as would provide clear paths for federal real estate lending, payment processing, banking, insurance, and other traditional financial products that are not presently available to the MI.

The massive drop in stock prices amongst cannabis stocks this year has been a sobering counterpoint to the once hot performance that reigned in the earlier parts of 2018. Over-production and profitability concerns, taxation impacts, financing challenges, investor trust issues (accounting irregularities, unlicensed activities, interest conflicts amongst corporate officers and cannabis firms) and regulatory delays have all taken their toll and have provided a wake-up call for MI businesses.

The industry buzz and excitement with corresponding massive rise in valuation appears to have waned, and a present focus on the important elements of core business results have taken their place. Investor sentiment and perception has shifted from one of MI businesses as a “license to print money” to one where risk, regulatory hurdles, profitability, over-supplied commodity product and pricing issues, and managerial issues have taken center stage.

In summary, the Marijuana Industry continues to go through changes and immense growth, challenged by market and regulatory forces that require significant market knowledge, research, experience, and capital to successfully navigate. Properties in markets that do not have sufficient supply constraints or controls and have relatively low barriers to entry will remain riskier propositions for real estate and other expensive fixed asset investment. States with the forethought to proactively forecast and manage cultivation licenses in direct relation to demand forces will fare much better. Where there are minimal or limited product supply controls, credit capacity, available capital, and cash liquidity will be important elements to consider for real estate transactions. Such states will likely suffer a steep drop off in product pricing due to product oversupply from the cultivation sector and see a “culling of the herd” that will impact the continued viability of many cultivation operators going forward.
**CRE Trends**

Written By: Hugh F. Kelly, PhD, CRE

United States of America – 2020 Population 331,002,647
Source: PopulationPyramid.net

Fiscal and Monetary Accelerators Lose Potency in 2020 for Jobs and GDP
Source: Bureau of Economic Analysis, Bureau of Labor Statistics, Congressional Budget Office

Fed Intervention Has Corrected Inversion in Yield Curve, and Pushed Cost of Funds
Source: Federal Reserve, H.15 Reports

Fiscal Stimulus of 2018 Now Dissipating; Jobs Trend Decelerating Into the 2020s
Source: U.S. Bureau of Labor Statistics

By the Numbers: The Economic Deceleration
Source: Congressional Budget Office

Where Can Renters Find the Largest Supply of Affordable Homes?
Source: Data Tree by First American, Standard & Poor’s, Freddie Mac, Census, IPUMS CPS, Q3 2019

Most Affordable and Least Affordable Metros-Population Patterns 2010 – 2018
Metro Rankings from First American Title; Population Data from U.S. Bureau of the Census

Linkage of ESG to Value Creation (Per McKinsey)
Source: McKinsey & Company

**Property Reports**

**Office**

Regional Rates Comparison
Source: Integra Realty Resources

Suburban Office Market Cycle
Source: Integra Realty Resources

Top Markets by Office Transaction Volume Based on YOY Percentage Change
Source: Real Capital Analytics

**Multifamily**

Regional Rates Comparison
Source: Integra Realty Resources

Market Cycle
Source: Integra Realty Resources

Top Markets by Multifamily Transaction Volume Based on YOY Percentage Change
Source: Real Capital Analytics

**Retail**

Regional Rates Comparison
Source: Integra Realty Resources

Top Markets by Retail Transaction Volume Based on YOY Percentage Change
Source: Real Capital Analytics

Market Cycle
Source: Integra Realty Resources

**Industrial**

Top Markets by Industrial Transaction Volume Based on YOY Percentage Change
Source: Real Capital Analytics

Market Cycle
Source: Integra Realty Resources

Regional Rates Comparison
Source: Integra Realty Resources

**Hospitality**

Written By: Jeff A. Greenwald, MAI, SRA, AI-GRS, ASA, FRICS, Senior Managing Director/Principal, IRR - San Diego

Top Markets by Hospitality Transaction Volume Based on YOY Percentage Change
Source: Real Capital Analytics

**Specialty Reports**

**Healthcare & Senior Housing**

Written By: Bradley J. Schopp, MAI & Mark R. Tracy, Managing Directors, IRR–Healthcare & Senior Housing

85+ Population and Growth Rates
Source: U.S. Census Bureau, Population Division: Washington, DC.

Seniors Housing Supply-Demand; Primary Markets
Source: NIC MAP Data Service

**Caribbean Hospitality**

Written By: James V. Andrews, MAI, CRE, FRICS, ASA/BV, CVA, Senior Managing Director, IRR – Miami | Caribbean

Growth in Arrivals by Country, YTD 2019
Source: Caribbean Tourism Organization, Various Govt. Tourism Departments

Caribbean Hotel Performance - YTD Through October 2019
Source: STR

Hotel Performance 12 Months Through October 2019
Source: STR

**Marijuana Real Estate**

Written By: Charles E. Jack IV, MAI, Senior Managing Director, IRR - Las Vegas

Marijuana Stock Performance
Sources: Compiled by Integra Realty Resources, Inc.

U.S. Cannabis Retail Sales Estimates: 2018 - 2023 (In Billions of U.S. Dollars)
Source: Marijuana Business Daily

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    - mburke@irr.com

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    - T (617) 457-3298
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    - jandrews@irr.com

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  - Christopher D. Starkey, MAI
    - T (407) 818-3377

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    - T (239) 867-5801
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- Tampa, FL
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    - bjjohnson@irr.com

### ALABAMA
- Birmingham, AL
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    - T (205) 943-5995
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### ARKANSAS
- Little Rock, AR
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    - T (404) 418-4358
    - malbigese@irr.com

### MISSISSIPPI
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    - T (601) 714-1665
    - jpraytor@irr.com

### NORTH CAROLINA
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    - T (704) 206-8254
    - f stout@irr.com

- Greensboro, NC
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    - T (336) 687-8663
    - ntrigg@irr.com

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  - Chris R. Morris, MAI, FRICS
    - T (919) 847-1717
    - cmorris@irr.com

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    - w wallen@irr.com

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    - T (615) 628-8275

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    - rdevries@irr.com

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    - T (317) 546-4720
    - mlady@irr.com

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    - T (502) 452-1543

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  - Donald L. Selvidge, MAI
    - T (248) 540-0040
    - dselvidge@irr.com

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    - T (310) 259-5444
    - jellis@irr.com

- Orange County
  - J. Richard Donahue, MAI
    - T (949) 591-8150
    - r donahue@irr.com

- Sacramento, CA
  - Kevin Ziegemony, MAI
    - T (916) 435-3883

- San Diego, CA
  - John A. Morgan, MAI
    - T (858) 259-4900

### MINNESOTA
- Minneapolis/St. Paul, MN
  - Michael Amundson, MAI, CCIM, FRICS
    - T (952) 905-2401

### MISSOURI
- St. Louis, MO
  - Timothy M. Schoemehl, MAI
    - T (636) 698-9033
    - tschoemehl@irr.com

### OHIO
- Cincinnati/Dayton, OH
  - Gary S. Wright, MAI, FRICS, SRA
    - T (513) 426-7125
    - gwright@irr.com

- Columbus, OH
  - Brad A. Johnson, MAI
    - T (614) 338-4407
    - bjohnson@irr.com

### SOUTH WEST OFFICES
#### ARIZONA
- Phoenix, AZ
  - Walter "Tres" Winnis, III, MAI, FRICS
    - T (602) 296-5999
    - twinnis@irr.com

#### TEXAS
- Austin, TX
  - Todd Rotholz, MAI
    - T (512) 973-0212
    - trotholz@irr.com

- Fort Worth, TX
  - Alan Purcell, MAI, SRPA, SRA, SGA
    - T (817) 763-8023
    - apurcell@irr.com

- Houston, TX
  - Todd Rotholz, MAI
    - T (713) 973-0212
    - trotholz@irr.com

### UTAH
- Salt Lake City, UT
  - John T. Blanck, MAI, MRICS
    - T (801) 263-9700
    - jblanck@irr.com

### WASHINGTON
- Seattle, WA
  - Matthew A. Bacon, MAI
    - T (206) 426-1170
    - m bacon@irr.com

### CARIBBEAN
- Caribbean
  - James Andrews, MAI, CRE, FRICS, ASA/BV
    - T (844) 562-7604

### NATIONAL PRACTICES
- Healthcare & Senior Housing
  - James K. Tellatin, MAI
    - T (636) 534-6919

- Hotels
  - Jeff Greenwald, MAI, SRA, AI-GRS, ASA, FRICS
    - T (858) 259-4900

- Corporate Headquarters
  - Paul A. Waters, CCIM, SIOR, CRE, FRICS Chief Operating Officer
    - pwaters@irr.com

### FRANCHISES
- Corporate Headquarters
  - 7800 East Union Avenue, Suite 400
  - Denver, CO 80237
  - T (303) 575-2935

- Chairman & CEO
  - Anthony M. Graziano, MAI, CRE
    - T (212) 575-2935

- Chief Operating Officer
  - Paul A. Waters, CCIM, SIOR, CRE, FRICS Chief Operating Officer
    - pwaters@irr.com

- Chief Operating Officer
  - 7800 East Union Avenue, Suite 400
  - Denver, CO 80237
  - T (303) 575-2935

- Chief Operating Officer
  - Anthony M. Graziano, MAI, CRE
    - T (212) 575-2935

- Chief Operating Officer
  - Paul A. Waters, CCIM, SIOR, CRE, FRICS Chief Operating Officer
    - pwaters@irr.com