The Case for Real Estate in 2020 remains strong; the reasons for allocating part of an investment portfolio to real estate have strengthened over the last twenty years. A more diverse range of investment vehicles and risk-return approaches can be used to build a high-performing real estate portfolio in 2020–22, compared to twenty years ago. In this chapter, we review the relative attributes of different real estate financial structures and consider how they can be combined, depending on the size and risk tolerance of the investor.

Portfolio construction is now a more complex problem, with so many options to review. However, it is also now possible to tailor a strategy that combines domestic, international, mainstream and niche positions in a way that would have been inconceivable in 2000 or even in 2010. Indirect investments, niche strategies, and debt vehicles should all be assessed as part of the expanding universe of real estate options to consider in 2020. Core and non-core strategies should also be evaluated to make sure that portfolio-level risk-return attributes match an investor's tolerance level.

Finally, the annual update of our investable universe work shows how the composition of real estate now includes a very different mix of property types, depending on the lens used to observe the market. The results diverge by a significant margin when an investor focuses on the securities universe, the institutional universe of professionally-managed properties, or the total stock of income-earning properties (based on the broadest definition of non-institutional and institutional buildings together).

CHAPTER 3

# The Case for Real Estate in 2020

## The Case for Real Estate in 2020

National and metropolitan economies, international capital markets, and local property markets are all continually shifting, as the headwinds and tailwinds discussed in Chapter 1 set forth. Yet, the core principles underpinning an allocation to real estate remain constant. The five fundamental reasons for including real estate in a mixed-asset portfolio in the next decade are very similar to the ones we have summarized for the first two decades of this millennium. They have been proven out in real estate's performance over this period, building a stronger body of supporting statistical evidence:

- **Strong Risk-Adjusted Returns with Diversification:** Real estate raises the risk-adjusted return of a multi-asset class portfolio in two ways. First, by maintaining competitive performance over many different cycles (see chart entitled Real Estate's Relative Performance). Second, by not moving in lock-step with other major asset classes, it acts as a shock absorber when stocks, bonds, or other alternatives are volatile (see The Diversication Power of Real Estate on page 53).
- **Unique Financial Characteristics with Inflation Hedging:** Leased property has a different mix of contractual income and capital value than all other asset classes. Buildings generate rental income with varying degrees of inflation/deflation protection built-in, along with an equity-like residual payment that is anchored by replacement cost and by market dynamics at the time of sale. This anchoring provides a hedge against price index (CPI or PPI) volatility and shares the characteristics of other "real" assets by trading in a narrower range than manufacturing, services or technology companies, provided that leverage levels are modest.

Westend Yards, Munich, Germany

- **Large Asset Class:** After stocks and bonds, real estate represents the third largest repository of the world's wealth. Our most recent investable universe indicates that income-earing real estate represents approximately one-sixth of the world's assets. As investment grade corporate and sovereign bond yields fall closer to zero—$15 trillion or 20% of all bonds are negative yielding[1]—real estate's positive yield looks more attractive to pension funds and retirees who live on fixed incomes.
- **Stability and Low Volatility:** Approximately two-thirds of the long-term returns from core real estate equity comes from the income component of returns, which typically exhibits bond-like stability. This ratio is even higher for real estate debt investments, where the investor is typically well-insulated from changes in the value of the collateral. Although the capital value component of income-earning properties delivers more volatility than the income component, both transaction-based and appraisal-based real estate returns exhibit a Sharpe ratio comparable to, or higher than, securitized asset classes like stocks, convertible debt, and investment-grade bonds.
- **An Accessible Asset Class:** Real estate investment vehicles have multiplied and offer both institutional and individual investors many more options than in the past. Whether held in a securitized vehicle, like a listed REIT, or in a private equity fund, real estate retains all of the characteristics over a medium- to long-term horizon.

A more diverse range of investment vehicles and risk-return approaches can be used to build a real estate portfolio, compared to 10 or 20 years ago. Higher risk strategies have included development, redevelopment, distressed assets, repositioning, and renovation for several decades. Value-add and opportunistic investments are structured to deliver different performance relative to core investments across the business, credit, and property cycles (see Core and Non-Core Real Estate sidebar on page 62).

Specialized property types that require operational expertise are growing faster than mainstream, core property types (see Niche Property Types Revisited sidebar on page 58). Investments in data centers, cell phone towers, healthcare facilities, hotels/resorts, social housing, senior housing, student accommodations, laboratories, single-family homes, and furnished apartments will alter the risk-return mix of a portfolio and increase the diversification of income streams. By analyzing each sub-sector relative to the five reasons in "the case for real estate" listed above, investors can avoid entering into operating businesses with risk profiles that behave more like venture capital or other forms of public/private equity.

1 Source: Barclays Global Aggregate Bond Index, November 2019

### Real Estate's Relative Performance

TRAILING PERIOD RETURNS BY ASSET CLASS AND COUNTRY*: TO 2019:Q3

| Average Annual Total Return | Global Stocks[1] | Global RE Securities[2] | Global Corporate Bonds[3] | Global Government Bonds[4] | U.S. Direct Property (NCREIF)[5] | U.K. Direct Property (MSCI)[6] | Canada Direct Property (MSCI)[7] | Australia Direct Property (MSCI)[8] | Japan Direct Property (MSCI)[9] |
|---|---|---|---|---|---|---|---|---|---|
| 1 Year | 3.5% | 16.8% | 10.8% | 10.0% | 6.2% | 2.0% | 6.6% | 7.8% | 6.8% |
| 3 Years | 11.5% | 6.8% | 3.6% | 2.3% | 6.8% | 6.6% | 6.8% | 10.2% | 6.7% |
| 5 Years | 9.0% | 8.9% | 4.1% | 3.4% | 8.6% | 7.6% | 7.0% | 11.1% | 7.4% |
| 10 Years | 10.5% | 11.1% | 5.2% | 3.6% | 9.8% | 9.7% | 9.0% | 10.3% | 5.4% |
| 20 Years | 5.4% | 10.6% | 5.7% | 4.1% | 8.8% | 7.8% | 9.9% | 10.4% | — |

Stocks, REITs, bonds, and private real estate data updated to 2019:Q3; except in Japan, where 2019:Q3 returns are forecast.

### The Diversification Power of Real Estate

TOTAL RETURN CORRELATIONS WITH OTHER ASSET CLASSES: 1999–2019

| Correlations- 20 Year Quarterly | Global Stocks[1] | Global RE Securities[2] | Global Corporate Bonds[3] | Global Government Bonds[4] | U.K. Direct Property (MSCI)[5] | U.S. Direct Property (NCREIF)[6] | Canada Direct Property (MSCI)[7] | Australia Direct Property (MSCI)[8] | Japan Direct Property (MSCI)[9] |
|---|---|---|---|---|---|---|---|---|---|
| Global Stocks[1] | 1.00 | 0.64 | 0.12 | (0.47) | 0.38 | 0.18 | 0.14 | 0.15 | 0.02 |
| Global REITs[2] | | 1.00 | 0.40 | (0.07) | 0.49 | 0.25 | 0.14 | 0.17 | (0.09) |
| Global Corporate Bonds[3] | | | 1.00 | 0.58 | (0.04) | (0.24) | (0.21) | (0.24) | (0.16) |
| Global Government Bonds[4] | | | | 1.00 | (0.25) | (0.12) | (0.16) | (0.17) | 0.04 |
| U.K. Direct Property (MSCI)[5] | | | | | 1.00 | 0.57 | 0.25 | 0.56 | (0.34) |
| U.S. Direct Property (NCREIF)[6] | | | | | | 1.00 | 0.64 | 0.86 | 0.15 |
| Canada Direct Property (MSCI)[7] | | | | | | | 1.00 | 0.57 | (0.12) |
| Australia Direct Property (MSCI)[8] | | | | | | | | 1.00 | 0.50 |
| Japan Direct Property (MSCI)[9] | | | | | | | | | 1.00 |

**Correlations between asset classes highlight the diversification benefits of property within a mixed asset class portfolio.**

20-Year Quarterly Annualized Correlations to 2019:Q3.

Notes on Sources:

1. MSCI All Country Gross World Total Return Index in local currency.
2. S&P Global Developed Index in U.S. dollars.
3. Citigroup World Corporate Bond Index Total Return in U.S. dollars (local currency history not available prior to 1999).
4. Citigroup World Government Bond Index All Maturities Total Returns in local currency.
5. U.S. NCREIF Property Index Total Returns in U.S. dollars.
6 U.K. MSCI Quarterly Standing Property Total Returns in British pounds, data prior to December 2001 is MSCI Annual. U.K. MSCI Quarterly Index used in all time periods available.
7. Canada MSCI Quarterly Standing Property Total Returns in Canada dollars.
8. Australia MSCI Quarterly Standing Property Total Returns in Australian dollars.
9. Japan MSCI Quarterly (based on monthly index) Standing Property Total Returns in Japanese yen. Data to July 2019, with a LaSalle forecast for full quarter 2019:Q3 used.

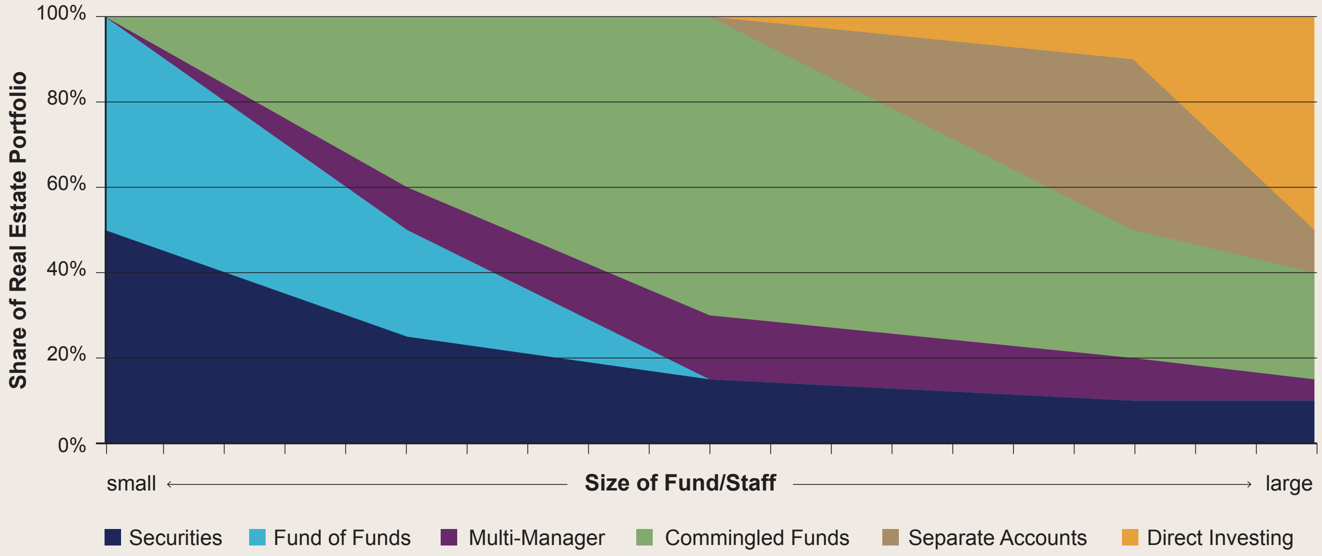
## A Portfolio-Level View

Real estate can be added to a portfolio in multiple ways: direct investing, commingled funds, listed REITs, whole loans, mezzanine debt, securitized debt, and multi-manager funds. The financial "wrapper" can change the risk-return attributes of real estate in significant ways. The backbone of any real estate-based core investment is a property (or a portfolio of properties) whose fundamental value derives from cash flows generated by leases and is more durable than most other asset types.

New strategies and funds are constantly being rolled out; investors need some way to put these products into a coherent portfolio framework. The two main factors to consider in constructing an institutional real estate portfolio are: 1) does the proposed investment meet the targeted risk/return objectives? and 2) does the institution have the appropriate resources to perform due diligence, make informed investment decisions, deploy funds, and keep track of performance? After these threshold questions are answered, many other factors should be considered when constructing a portfolio. These include operational features like fees, control, and liquidity provisions. They can also focus on attributes that matter more for beta-seeking strategies (diversification, ease of execution) or for alpha-seeking strategies (access to higher returns, development, international, and specialty sectors).

Each investor will place different weight and emphasis on these factors, depending on their risk-return targets and

**Indicative Mix of Real Estate Investment Vehicles by Investor Size**




Source: LaSalle Investment Management.

their preference for domestic versus international investments. In Indicative Mix of Real Estate Investment Vehicles by Investor Size, an illustrative scorecard shows how these factors might be scored for some of the most common investment vehicles that are currently available to investors. The scores could be quite different, depending on the range of vehicles being considered and the preferences of a specific investor.

Many of these strategies (e.g. debt, multi-manager, non-core, and separate accounts) are quite broad and can encompass diverse levels of fees and liquidity, depending on the target country, the focus of the sponsor, or the size of the program. The main point of the chart is that many of these structures and strategies should be evaluated and considered for inclusion or exclusion. All of them bring access to the fundamental attributes of the asset class, but each comes with different strengths and weaknesses. A portfolio approach can balance these strengths and weaknesses across the entire real estate allocation.

Practically speaking, the optimal real estate portfolio will vary by size and the level of resources available to investigate and manage various opportunities. It reflects a view of how to approach portfolio construction based on the potential size of the real estate portfolio and the staff resources available to do the evaluation. For example, a very small fund with few internal resources should consider an equal split between real estate securities and fund-of-funds investments; this should result in low costs, diversification, and liquidity while delegating decision making to managers with resources to make informed investment decisions. This split could tilt to one structure or another depending on return targets, volatility tolerance, liquidity preferences, or other factors. Very large investors with a large internal staff with the ability to travel internationally and to closely monitor market trends and deal flow are capable of taking on separate accounts and direct investment programs, but as the chart implies, they may also keep commingled funds and securities in their portfolios for access to specialized skills or specialty property types.

In summary, selecting the best composition of a real estate allocation within a mixed-asset class portfolio is a complex task due to the increasing number of funds and strategies available in most markets. By thinking about the various attributes discussed here, institutional investors can develop an appropriate portfolio structure for their specific circumstances and objectives.

**Genesee Plaza, San Diego, CA**

## Indirect Real Estate Investment Strategies

An indirect real estate investment approach expands the opportunity set under consideration while employing high quality expertise for sourcing acquisitions and asset management. In the past, indirect investing in real estate was limited to the fund-of-funds model. While this is still popular amongst investors,[2] indirect investment has evolved and now includes a wider set of real estate strategies sometimes referred to as "multi-manager," including co-investments, club deals, and joint ventures (see Indirect Real Estate Definitions).

### ACCESS TO MORE STRATEGIES WITH LOWER SEARCH COSTS

Unlisted property funds are a good alternative for investors seeking real estate private equity return attributes and who do not have the capability to undertake direct investment themselves. The fund-of-funds and multi-manager approaches can broaden the universe of possibilities beyond the underwriting capabilities of many institutional investors.

There are important knowledge and execution benefits of an indirect approach. By establishing a thoughtful portfolio construction plan, an investment manager can focus on allocation decisions that access expertise in terms of sectors, regions, and strategies.[3] An indirect manager can help investors implement transition and completion strategies that run concurrently with a direct strategy or to a previously established roster of commingled fund managers.

### THE FULL SPECTRUM OF INDIRECT INVESTING

By deploying across the full spectrum of the indirect approach (e.g., investing in a mix of funds, joint ventures, and co-investments), investors can broaden their opportunity set in less familiar sectors and better manage risk exposures as a program evolves. For example, specialized funds might have greater access to the apartment and industrial sectors, which are chronically underweight in many investors' portfolios. By contrast, a more targeted approach might work well for the retail and office sectors, where investors may already have direct access and exposure. In each case, the expertise of the operator is matched to the geography, sector, and strategy. This multi-access point strategy reaches its highest level when the indirect manager invests across the four quadrants of real estate (debt, equity, public, and private) using a relative-value approach to exploit pricing discrepancies between them.

2 Real estate funds cited as top preference for accessing real estate exposure by Asia Pacific, European, and North American investors. "Investment Intentions Roadshow 2019" INREV (2019).

3 Expert management skills noted amongst three most important drivers of investing into funds by European and North American investors. "Investor Intentions Roadshow 2019" INREV (2019).

### Indirect Real Estate Definitions

| Indirect Structure | Definition |
|---|---|
| Fund-of-Funds | A co-mingled fund established to acquire interests in a number of co-mingled funds |
| Joint Ventures (JV) | A partnership between a real estate operator and a *single* capital partner, typically to acquire a property or properties |
| Club deals | A partnership between a real estate operator and *multiple* capital partners to acquire and manage property. |
| Co-investments | A partnership between a co-mingled property fund and a capital partner(s) whereby the capital partner provides a portion of the equity capital to acquire property, typically because the capital requirement is too large for the co-mingled fund. |

Source: LaSalle Investment Management.

**Alto Tower, Paris, France**

REC Logos, Singapore

## Debt Strategies

Increasingly real estate investors are making real estate debt investments alongside real estate equity allocations. Investors consider real estate debt investments for a variety of reasons including: a defensive stance when capital value downside seems as, or more, likely than upside, a preference for contractual income over subordinated operating income, or access to pools of collateral that would otherwise be difficult to assemble in an equity program. Like real estate equity, there are many styles of real estate debt investment that deliver different mixes of risk and return. Where a debt strategy fits on the risk-return spectrum will determine how various economic scenarios will affect investment performance. Regardless of this positioning, the overall risk/return trade-off of debt is different than equity, which can make real estate debt a useful complement in a diversified portfolio.

Real estate debt investment extends beyond traditionally low LTV senior mortgages and can also offer investments with both higher return and risk. Traditional mortgages behave more like fixed-income instruments and many institutions consider them as such. By contrast, the higher risk/higher return part of the market is driven by "non-traditional real estate lenders" (NTREL).

Non-traditional real estate lenders broadly use three methods to generate more return than a traditional mortgage. These are:

- Lending at higher LTV ratios on the underlying asset, either in a whole loan or a mezzanine loan form.
- Lending against assets undergoing renovation or being developed, increasing the risk around the underlying collateral.
- Leveraging the loan portfolio by borrowing a part of the capital used to make the loan.

Many NTRELs utilize a combination of all three options. There are also tweaks to other lending terms that can boost returns, such as recourse provisions, interest capitalization, and access to more future borrowing, if values or NOI improve.

With so many structuring options, it is difficult to characterize all NTREL performance in the same risk-return category since it is not possible to forecast exactly how each debt strategy will perform under different economic and market conditions. There is also limited historical return data and a lack of wide experience of some structures through downturns. However, previous experience in a downturn can be more important than a robust dataset. For example, these are some of the attributes that we find matter most: (1) close underwriting of the underlying collateral and a willingness to step in when business plans like an asset renovation go wrong, (2) retaining significant skin in the game even when leveraging underlying loan portfolios, and (3) careful project selection with borrowers that are local sharp-shooters with successful track records.

Our view is debt investment will be a solid return generator for investors in both stable and moderate downturn environments. Economic and real estate market conditions would need to deteriorate more to impact debt returns compared to equity investments. The trade-off for receiving more durable returns from debt is that the upside is limited and asset impairment can be rapid once value thresholds are breached.

The current economic outlook for slowing growth supports the inclusion of debt in an investors' overall real estate portfolio. Debt helps diversify the overall portfolio because it will perform differently than equity and smooth the overall performance across market cycles. The limited upside of debt is less of a negative in a mature phase of the cycle when appreciation going forward is expected to be limited.

In summary, there are many breeds of debt investment and investors should evaluate which methods are being used to enhance returns and to what degree. A balanced strategy across LTV levels, asset status, and step-in rights, could produce durable performance in mildly adverse market conditions. However, the debt markets, like the equity markets, are becoming more efficient, even for NTREL. It is not realistic to expect high relative returns without taking some degree of risk.

Return outcomes across different real estate market scenarios for several specific debt strategies is explored in a recent paper by the LaSalle Research and Strategy team, "How Should Investors be Thinking About Risk-Adjusted Debt Returns in European Real Estate as of October 2019?". This paper focuses on the trade-offs between different lending strategies and the returns they generate across different scenarios. It also highlights how specific structuring choices can lead to very different investment outcomes.

**Presley Uptown, Charlotte, NC, USA**

## Durability and Duration

Currently, the average age of a company in the S&P 500 is 18 years; it was 60 years in 1958. The churn rate of companies in and out of mid-cap stock indices is estimated by McKinsey to be 75% over a ten-year period. The churn rate of properties (and listed companies) into and out of institutional REIT indices and private equity indices is much lower in well-developed markets across North America, Europe, Japan, and Australia. Changes in the composition of these indices are primarily a response to new assets/companies coming in, rather than the demise, bankruptcy or takeover of the constituent parts of these indices.

Between 1980 and 2018, the average duration[1] of an investment-grade corporate bond rose from four years to about seven years as companies extended the length of their borrowing in a low interest rate environment. Several countries and a few companies issued "century bonds,"[2] yet the vast majority of fixed-income instruments have durations of less than ten years. Private wealth is also tied to a combination of family-owned enterprises with short duration, typically less than half a generation. Research shows that the average small business is less than ten years old.[3]

The longevity of investment-grade real estate is due to its intrinsic nature—capital-intensive, fixed assets whose income-earning power erodes more slowly than other capital assets like aircraft, container ships, or computers. The average large income-earning property in an institutional index is roughly 30 years old, although this age varies by country and property type.[4] Logistics and self-storage properties average 20 to 30 years old, while office and some residential properties range between 30 and 50 years old, depending on the country.

One of the less well-understood aspects of real estate investing is how obsolescence and scrappage rates (removal from the stock) vary across property types and geography.

The capital expenditures required to keep buildings up to date and to implement carbon neutral or other sustainability goals are becoming understood and tracked through proptech tools such as Measurabl, Carbon Delta, and GRESB tracking.

In the fixed-income world, the significance of long duration instruments is that they are especially sensitive to changes in interest rates. For real estate, a long economic life has a different significance, since the final payment to a real estate investor is not contractual, but depends on the rental income stream, the capitalization rate, and the discount rate at the time a property is sold. The implication of real estate longevity, then, is different from bond duration. Real estate *depreciates* in ways that bonds do not. Well-managed real estate also has income that *keeps pace with inflation* in a way that bonds do not. The decades-long age of properties in major real estate indices demonstrates that the economic life of land and buildings is more durable than nearly any other part of an investor's portfolio.

1 Duration is a financial metric for fixed income instruments, which is based on the weighted average of the times until pre-determined payments are received. It is not the term of the loan.

2 Austria, Belgium, and Ireland issued century bonds in 2019. The Walt Disney Company, the Coca-Cola Company, and the Cleveland Clinic have also issued ultra-long duration bonds in recent years.

3 Sources: S&P analysis by Richard Foster of Innosight. Investment-grade bond duration: Bloomberg Barclays Aggregate Bond indices. The average age of a small business in the U.S. is from J.P. Morgan Research 2017.

4 For some property types (logistics), the average age is less than 20 years; for others like London or New York City offices, it is much older (between 50 and 75 years). One U.S. researcher used U.S. energy information data to determine that the average age of a "mixed-use" property is 75 years, well above the all-property average. This statistic shows how trends in planning and zoning also shift over time. Mixed-use zoning in urban areas in the U.S. was more prevalent before 1940, when "living above the store" was common. Post-war suburban development patterns separated land uses. Only recently has mixed-use zoning come back into fashion in suburbia.

## Niche Property Types Revisited

In the 2019 ISA, we highlighted the growth of niche property types within the publicly traded real estate universe, particularly in the U.S. We recommended that institutional investors consider a "completion" strategy that combines publicly traded niche properties with existing core (private) real estate allocations.

The niche sector continues to gain traction from both a global and U.S. perspective. Niche property types are producing attractive total returns and more companies have come to market. Here we address the differences in the U.S. public and private real estate indices. We also assess how niche sectors are gaining acceptance beyond U.S. borders. Finally, we highlight the defensive return profile of select public niche property types during recent market downturns, as well as the potential for enhanced risk-adjusted returns when these properties are combined with private real estate allocations.

### U.S. PUBLIC VS. PRIVATE REAL ESTATE PROPERTY TYPE DIFFERENCES

Diversified core real estate is readily accessible in both the public and private markets across the globe through core open end funds and REITs. In the U.S.,[1] however, these markets differ markedly in terms of property type weightings. The main vehicle for private real estate—the NFI-ODCE (ODCE) universe of core open-ended funds—consists almost exclusively of the four main property types: office, apartments, retail, and industrial. Only 4% of the Index is in the "other" or niche category. As shown in the chart entitled Property Type Distribution of U.S. Public and Private Core Strategies: 2006 and 2018, this composition differs materially from that of the widely used public index. As of year-end 2018, some 59% of the FTSE NAREIT All Equity REITs Index (NAREIT) was comprised of niche property types, with only 41% allocated to the four major property types. The public niche property universe is well diversified with 15 different property types in the grouping. The largest sectors include infrastructure or cell towers, healthcare, data centers, free standing or triple net lease, and self-storage.

Although the public real estate sector has less exposure to all four major property types, most pronounced is the exposure to office properties—11% of the U.S. REIT index compared to 35% in the private index. As we show in the Property Type Distribution chart, this dynamic has evolved over time. The U.S. REIT index was more aligned with the private index as recently as 2006, when the niche sector comprised 26% of the universe. The retail sector has the biggest shift in the public market, declining from 24% in 2006 to 12% 2018, in part due to the steep discount for mall properties.

### GLOBAL GROWTH OF NICHE REITS

As noted earlier, more than half of the U.S. public real estate universe is comprised of niche property types as opposed to traditional core property types. While the U.S. is the world leader in both the growth and relative share of niche property types, alternative property types are gaining traction and taking share in other countries as well. As we show in the chart entitled Growth of Niche REITs Ex-U.S., the share of niche REITs[2] outside the U.S. is rising, growing from 2% in 2010 to 7% in 2019, along with a market capitalization jump from less than $5 billion to ~$33 billion in the same period. Outside of the U.S., the U.K. public real estate market has been one of the leaders in niche property sector growth, increasing from 3% in 2010 to over 20% in 2019. Given the strong performance and market acceptance of niche REITs in the U.S., we believe that niche REITs will continue to grow faster than core property types in many countries outside the U.S.

### PERFORMANCE OF NICHE PROPERTY TYPES IN RECENT EQUITY MARKET DOWNTURNS

While the overall U.S. public REIT sector and broader U.S. equity market fell sharply during the Global Financial Crisis (GFC), several key niche REIT sectors were much more resilient and posted significant relative outperformance during that time. This trend has also persisted in recent market disruptions or downturns. The demand drivers for four of the more defensive sectors—healthcare, self-storage, triple net leases, and manufactured housing—are less levered to the overall economy than the more economically sensitive property types, such as office and industrial. While these characteristics apply to both public and privately owned vehicles in these asset types, these properties are more accessible via public markets.

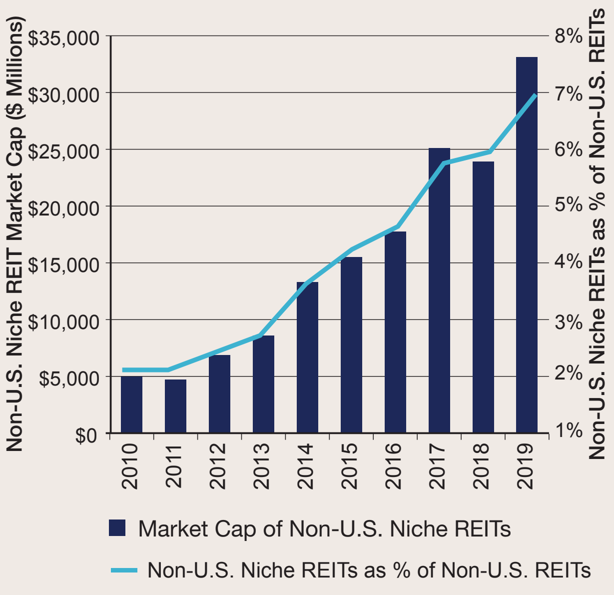
### COMBINING PUBLIC NICHE EXPOSURE AND PRIVATE CORE FUNDS

Private open-ended funds are a popular and effective way for U.S. (and increasingly non-U.S.) institutions to access core real estate in the U.S. These funds are attractive due to their solid returns, low volatility, and improving transparency and liquidity. As we discuss above, they differ greatly from the public markets in providing exposure to niche property types. Public niche property type REITs have generally performed better than core property type REITs in the 10 years since the GFC, with the U.S. niche universe gaining nearly 15% on an annualized basis, outperforming the core real estate securities universe by ~2% per year.

1 We use the U.S. as an example due to the transparency of the ODCE index.

2 Based on the ex-US component of FTSE NAREIT All Equity REITs Index.

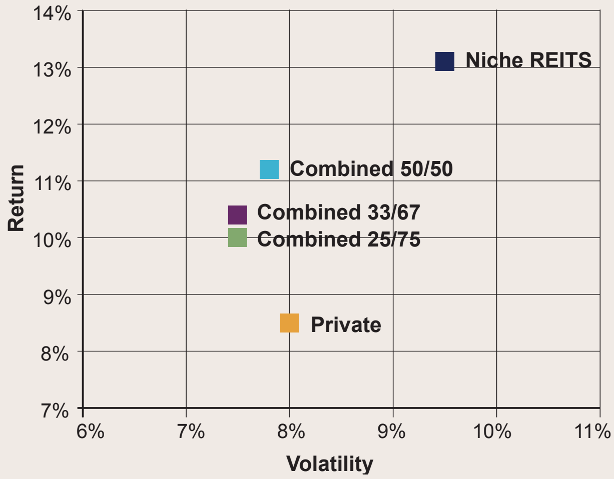
### Growth of Niche REITs Ex-U.S.




Source: FTSE Nareit All Equity REITs Index.

Data as of November 2019.

### Historical Returns and Volatility of Select Combinations of Private Core Real Estate and Niche REITs




Sources: Nareit, NCREIF (ODCE), Green Street Advisors, and LaSalle Securities.

Data from December 31, 1998 through March 31, 2019.

### Niche REIT Relative Performance in Recent Equity Market Downturns (U.S.)

| Performance During Market Downturns | Lehman Bankruptcy to Trough (9/1/08–2/28/09) | Eurozone Debt Crisis (4/1/11–9/30/11) | 2018 Year-end Growth Scare (9/1/18–12/31/18) |
|---|---|---|---|
| Nareit All Equity REITs Index (total return) | -60.0% | -12.6% | -8.0% |
| S&P 500 Index (total return) | -41.8% | -13.8% | -13.0% |

| Niche Real Estate Subsector Relative Return | Relative to Nareit | Relative to S&P 500 | Relative to Nareit | Relative to S&P 500 | Relative to Nareit | Relative to S&P 500 |
|---|---|---|---|---|---|---|
| Healthcare | 16.0% | -2.2% | 3.9% | 5.1% | 6.7% | 11.7% |
| Self Storage | 19.6% | 1.4% | 12.1% | 13.2% | 5.5% | 10.5% |
| Triple Net (free standing) | 29.3% | 11.2% | 8.7% | 9.8% | 10.7% | 15.7% |
| Manufactured Homes | 22.3% | 4.1% | 19.9% | 21.1% | 7.9% | 12.9% |

Sources: FTSE Nareit All Equity REITs Index, Bloomberg, and LaSalle Investment Management.

In the 2019 ISA, we suggested that investors should consider combining private core real estate with an allocation to niche property types through the public markets. We evaluated how this strategy would have performed (using three-year rolling average returns[3]) over the past 20 plus years (see Historical Returns and Volatility of Select Combinations of Private Core Real Estate and Niche REITs). All combinations tested (25%, 33%, and 50% public niche) would have produced higher returns with lower volatility than a purely private core real estate strategy. Our results provide evidence to support the positive impact of a combined public and private strategy for core real estate allocations.

## SUMMARY

Many institutional investors have realized the benefits of niche property types: higher returns, diversification, and resilience during downturns. In the U.S., many core funds are increasing their allocations to these sectors. Yet adding core niche properties to a mostly private core real estate strategy remains challenging. The public markets offer an attractive and liquid way to gain exposure to niche property types and core investors should seriously consider including these property types in their real estate allocation.

3 The standard deviation of annualized, rolling three-year returns used to make private and public more comparable given the liquidity constraints and appraisal lag of private funds.

## The Real Estate Universe in 2020

LaSalle's real estate universe research quantifies country and property type allocations across the world. We annually update three types of market value estimates in 201 countries: real estate owned by listed REITs and real estate operating companies, real estate owned by institutions inclusive of both private and public, and all real estate that generates income.

Our estimates of institutionally invested real estate and income-producing property stayed flat in 2019. A slight decline in our estimate for the U.K. had ripple effects across our global estimates because we use ratios of real estate to GDP in this highly transparent market to drive our estimates in countries without bottom-up data. Decelerating appreciation in Hong Kong and China, combined with the headwind of a stronger U.S. dollar, also contributed to a lack of uplift in the aggregate figures this year. That said, there were notable increases in our institutional estimates for the United States, Continental Europe, Singapore, and Japan, driven primarily by a combination of appreciation and construction.

Public (or listed) real estate was the only one of our three global universe estimates to increase significantly in this update. This segment expanded its share of global institutional property over the last year, growing by 5% to account for 47% of institutionally held real estate, based on gross asset value.

The Asia-Pacific region's share of income producing property remained steady at a third of the global total this year, up from a fourth one decade ago. We expect it to reach 40% within the next ten years. For now, the Americas remains the largest region, helped by the recent strength of the U.S. dollar.

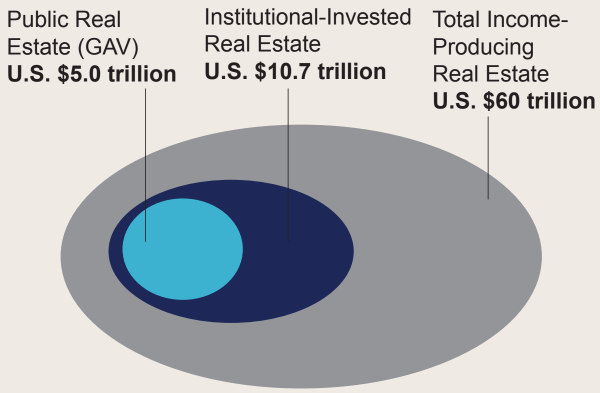
One goal in undertaking these annual estimates is to discover and highlight differences between the underlying stock of potential investments and what investors actually hold in their portfolios. This year we revisit and spotlight one area of persistent divergence: property type allocations.

The graphs below show our estimates for the property type breakdown of our three real estate universe categories. For all income-producing real estate, where we must rely on U.S. and U.K. data, rented residential real estate accounts for just under half of the universe and niche, or alternative, property types like self-storage and data centers account for just under a tenth.

Interestingly, neither the public market allocation nor the private institutional allocation is close to those niche and residential property type estimates. Global real estate securities appear overweighted to niche properties, whereas private institutional investors appear underweighted to niche. The global private weight to niche and residential has changed very little over the last five years.

There are plausible explanations that these tilts are the product of efficient markets. REITs, because they are often both owners and operators, are often well suited to specialize in niches. A large portion of rented residential stock consists of very small properties, often owned by individuals, which may make them challenging for private institutions to allocate to. Yet these persistent differences cannot be fully explained away, and, in our view, they provide support for considering above index weights to both residential and niche property types in the years to come.

### LaSalle's 2019–20 Global Real Estate Universe



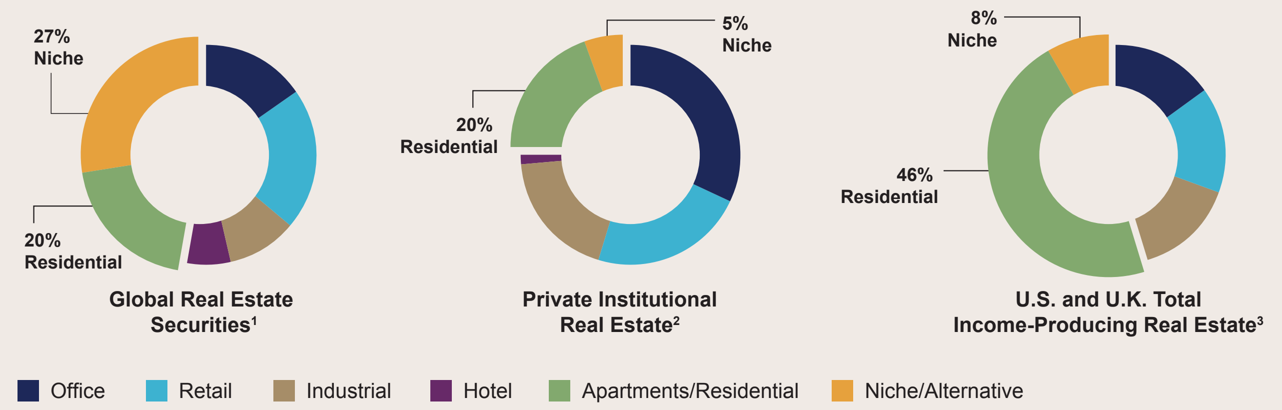

**Defining the Real Estate Universe**

| | |
|---|---|
| Public Real Estate | The gross asset value of real estate owned by REITs and REOCs listed on public exchanges. Includes vertically integrated development companies in emerging markets but not exclusive homebuilders. |
| Institutional-Invested Real Estate | The unleveraged total value of all professionally managed real estate portfolios, both public and private. |
| Total Income-Producing Real Estate | Value of existing stock of all commercial (office, retail, industrial, alternatives) real estate with the potential to be income-generating and all currently rented residential buildings. Owner-occupied residential homes, infrastructure, and agricultural land are not included. |

Sources: Oxford Economics, Citigroup, Bloomberg, NCREIF, MSCI, Investment Property Forum (U.K.), National Bureau of Statistics of China, U.S. Bureau of Economic Analysis, U.S. Federal Reserve, and company financial statements.

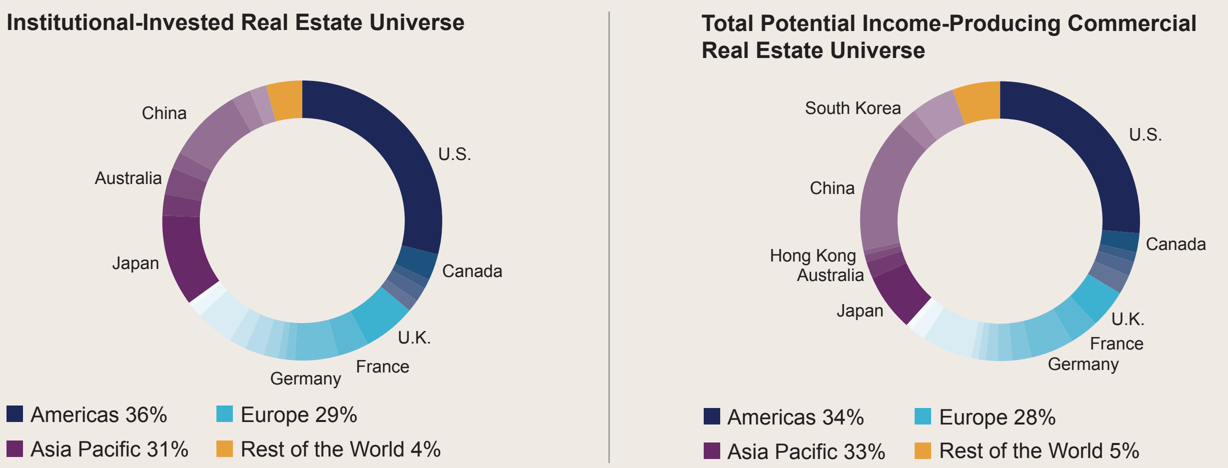
Estimates reflect data through 2019:Q3.

## Varied Property Type Distribution




1. Based on the estimated gross asset value of REITs and REOCs that have a single property type specialization. Note that companies with diversified portfolios are not included in this property type breakdown. Sources: LaSalle Investment Management Global Real Estate Securities, Citigroup, and Bloomberg. Data as of 2019:Q3.
2. Based on the ANREV, INREV, and NCREIF Global Real Estate Fund Index (GREFI). The distribution is also consistent with the sum of MSCI country index property type breakdown. Data as of 2019:Q2.
3. Based on our bottom-up estimates for U.S. and U.K. total income-producing real estate and is equal-weighted between these two markets. Estimates as of 2019:Q3.

## Distribution of the Institutional Invested Universe and Total Real Estate Universe




Sources: LaSalle Investment Management Global Real Estate Securities, Oxford Economics, Citigroup, Bloomberg, NCREIF, MSCI, Investment Property Forum (U.K.), National Bureau of Statistics of China, U.S. Bureau of Economic Analysis, U.S. Federal Reserve, and company financial statements.

Estimates as of 2019:Q3.

## Core and Non-Core Real Estate

The decline of core returns from low double digits five years ago, to mid-single digits in 2019 and projected for the next several years, leads investors to wonder if they should shift to higher risk strategies to maintain the return level that their real estate allocation has earned since 2010. Many pension funds have actuarial target returns in the 5% to 7% range; core returns are likely to drift toward the low end of that range over the next three years. As a result, LaSalle is spending more time helping clients decide whether, how and when to allocate across different risk-return styles in real estate.

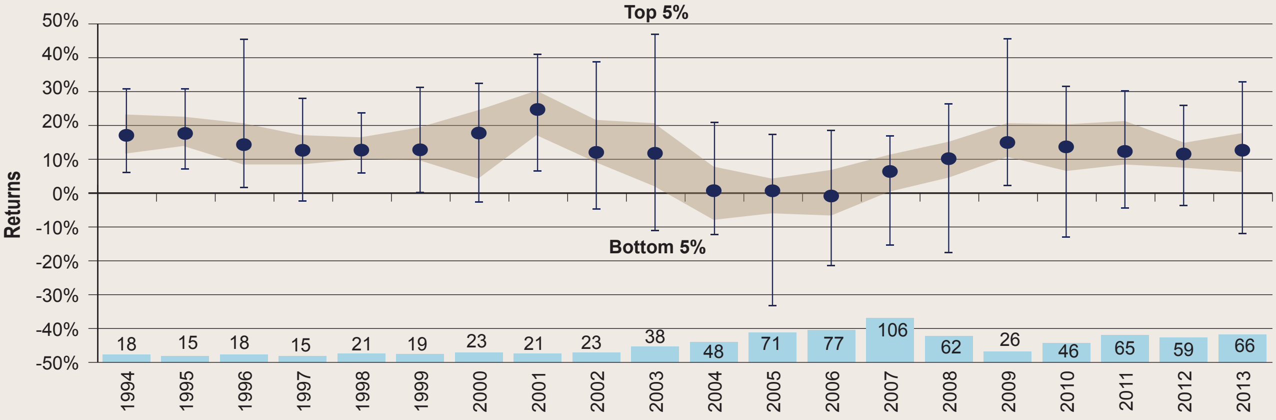
Core-oriented private equity real estate investors typically evaluate their real estate investments by focusing on annual, time weighted performance and specifically on the two components of returns: income and capital value. Non-core investors adopt the total return approach to achieve an objective of generating "alpha" by capturing higher than core income growth or capital appreciation through active management. Core and non-core strategies play a useful role in a real estate portfolio. They possess different risk-return profiles, even though they both have most of the basic financial characteristics described in the "case for real estate." Core investments are more reliable generators of income, which is especially important for mature pension plans and retirees. Non-core returns come with less certainty in terms of timing and liquidity. The highly diverse track record of closed-end funds demonstrates the wide dispersion of outcomes generated by value add and opportunistic strategies together.

For core strategies, the expected total return of stabilized real estate over a long-term horizon tends to be just above its income return, as the impact of the more volatile capital value component gradually diminishes over time. For both core and non-core investors, it is beneficial to consider "time-diversifying" their investments. Buying near or at the bottom of a cycle typically provides investors with higher real estate yields and better capital appreciation potential than buying at the peak. Favorable entry points offer more room for error and help investors weather a market downturn. The challenge of executing a timing strategy is that peaks and troughs are only clearly identifiable in hindsight.

Improving data on historic non-core investment returns helps demonstrate the value to limited partners (LPs) of diversification in non-core real estate investing. The chart below shows the return of closed-end funds by vintage year using data from Cambridge Associates. The vintage year is the year of legal inception of the fund, which is typically aligned with the first close and coincides with the time when many LPs are making their investment decisions. The chart shows the median fund return by vintage year and the distribution of fund returns for that year. The variation in returns is expected, but more surprising is the average standard deviation of returns within vintage years is almost twice as a high as the standard deviation of the median return across vintage years.

The data show that diversification across vintage years is the right approach. There are challenges to achieving full diversification as portfolio context and the pacing of the return of capital cause unpredictable swings in how much money an LP has to invest in any given year. Beyond this logistical challenge, vintage year diversification should be a planned goal. To avoid weak vintage years requires accurately predicting market downturns multiple years in advance. The real estate market and capital markets are cyclical, but the ability to accurately forecast cycles several years in advance is nearly impossible.

### Internal Rate of Returns by Vintage Year, Real Estate Closed-End Funds




Source: Cambridge Benchmark Data, 2019:Q1. Based on data compiled from 1,022 real estate funds, including fully liquidated partnerships, formed between 1994 and 2017. Internal rates of returns are net of fees, expenses, and carried interest.