

Real Estate: A Distinct Asset Class or an Industry Sector?

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Executive Summary

Some observers have argued that real estate is simply another industry sector to be financed -- not a distinct asset class. These advocates contend that if real estate had been evaluated with the same scrutiny of other asset classes, there would have been no need for a specific allocation to real estate in the first place, and institutional investors would have stopped investing during the mid-to-late 1980s when indicators showed that too much capital was flowing into the industry. The purpose of this paper is to explore the fundamental question of whether real estate is a distinct asset class. Based on this foundation, we will then explore the related question of whether real estate is a viable asset class for institutional portfolios.

Part I: Asset Class Debate

Significance of Issue

The question of whether real estate is a distinct asset class or merely an industry sector is one of the most critical issues to face the industry. The sheer fact this question is being raised reflects the continued fallout stemming from the market collapse, which has plagued the industry for the past several years. The ultimate resolution of the issue will determine how the industry should be approached, as well as the participants it will support. The question will also set the research agenda for the industry, determining whether: 1) it will be adequate to develop pure empirical models borrowed from capital markets, or 2) research must propose models which offer an explanation of how the real estate market functions, or 3) some hybrid approach is warranted.

Although not formally documented, in terms of perceptions and investor behavior it could be argued real estate was recognized as a distinct asset class in the mid-1980s. This elevation from a mere sector can be attributed to several factors. Some of these factors were related to the increased familiarity of investors with real estate, which had been achieved over the prior

decade. Another major factor was the availability of industry performance data published by the National Council of Real Estate Investment Fiduciaries (NCREIF). While not compelling in itself, for the first time analysts could measure real estate performance relative to other asset classes. This early quantitative research demonstrated that real estate performance dramatically varied from other assets. These observed differences presented empirical support for treating real estate as a distinct asset class since it differed from other assets in terms of pattern and volatility of returns.

During the latter half of the 1980s, an increasing number of researchers continued to explore real estate from a purely quantitative perspective. One of the more notable streams of such research involved the extension of Modern Portfolio Theory (MPT) to real estate. While many purists and traditionalists resisted such theoretical applications, the efforts were well received by observers who had struggled with how to put real estate on a similar footing with other asset classes. More recently, Wall Street has made major inroads into the real estate arena, taking advantage of the capital void to promote securitization of the asset class.

On the surface, the efforts of the academic, financial and Wall Street communities to bring real estate into a capital market context has some appeal. Indeed, although most mainstream real estate professionals rile at the position that real estate can be structured in such a manner as to render underwriting and due diligence superfluous, many of them recognize tapping the capital markets is the only near term hope for recapitalizing the asset class. Under the capital markets model for real estate, much of the recent quantitative research has explored whether real estate satisfies the efficient market assumptions. Failing that test, researchers have explored methods of adjusting observed returns for such anomalies.

While such pure theoretical research may seem somewhat innocuous, it can intercept the resources, which might otherwise be directed

toward developing a better understanding of how the real estate markets function. For example, the recent attempts to adjust appraisal-based return series to offset the presumed "appraisal-bias" have been well received. While such research is interesting, more meaningful research may be to explore why the return series for real estate appears to be dampened from that of other asset classes. Based on this foundation, research into alternative treatments to merely make an observed time series more palatable does not add to the body of knowledge. Indeed, it may well be negative, treating the symptoms rather than the underlying issues. Clearly, quantitative research is necessary to help establish real estate policies and develop model portfolios. However, such research should not ignore the fundamental differences that may reside in the real estate asset class. Rather, research should be undertaken to understand if, and why, such observed differences actually occur.

Research Approach

Before we explore whether real estate assets should be treated as an asset class or sector, it is useful to step back and review the evolution and structure of the industry. Once we have established this foundation, we can apply two basic research approaches to the question. The first approach is to attempt to assign real estate to some already established asset class. Assuming real estate assets do not fit into such a model, the second approach is to explore the evaluative criteria, which must be satisfied for real estate to warrant treatment as a distinct asset class.

Industry Evolution

Institutional real estate investment has undergone dramatic evolutionary changes over the past 20 years. The first stage of significant institutional real estate investment activity began in the mid-1970s. The overall economic environment during this period was relatively volatile, moving through recessionary and inflationary cycles. One of the early catalysts to introduction of real estate investments to institutional portfolios during this period was

passage of the Employment Retirement Income Security Act (ERISA) of 1974. One of the driving forces behind adding real estate to the mixed asset portfolio was to tap into the diversification benefits real estate provided.

Prior to the passage of ERISA, pension funds were generally risk-averse, avoiding the uncharted waters. To manage risk of an uncertain asset such as commercial real estate, investors adopted a passive style in which they opted for open-end commingled separate account vehicles, which had been scrutinized and accepted by peer investors. Due in large part to the relative newness of the asset class and concern over the complexity of the market, advisors were drawn from the ranks of large institutional players. On the other hand, consultants came from the ranks of mixed asset management firms.

The second stage of institutional real estate investment began during the early-1980s. This period was characterized by a cyclical economy, which was coming out of a deep recession. During this period, pension funds began to differentiate how they approached real estate investments, resulting in an active versus passive style split. Among pension funds with more active styles, there was a gradual growth in staff. Regardless of style, pension funds also became more interested in networking and increased their participation in professional associations. For example, the Pension Real Estate Association (PREA), which was founded in 1979, continued to grow over the next 15 years gradually increasing to over 700 members. The mission statement of PREA provides some anecdotal evidence real estate is, and has been, perceived as a distinct asset class by institutional investors and practitioners:

PREA's members share a common belief that real estate is a multi-dimensional asset class comprising a significant portion of global capital markets and possessing characteristics that make it appropriate in one or more forms for investment by pension and endowment funds, as well as other pools of

institutional capital, to improve overall portfolio diversification and performance.

Recognizing the complexity --if not uniqueness-- of the asset class, PREA established an educational initiative, which focused on establishing a body of knowledge. In particular, the association has sought to acquaint market participants with "... a basic understanding of real estate investment fundamentals, its risks and rewards, its unique characteristics, its market opportunities and its proper role in institutional portfolios.

As pension funds began to mature with respect to real estate, the consulting industry began to shift its emphasis. Rather than remaining within larger firms, which addressed a broad array of mixed assets, a number of real estate specialist firms began to emerge. In some cases, the larger organizations formed real estate units, which could be offered as part of a broader package, or split off into specialized real estate consulting divisions. In other cases, smaller specialty consulting firms were established. The number and role of consultants also began to change, migrating from the role of matchmakers who helped select managers from a due diligence perspective toward a more proactive role of evaluating managers based on performance measurement.

Advisory firms also began to undergo changes during this period. One of the more dramatic changes was the establishment of centralized research departments. Although the missions of institutional research functions vary dramatically, they tend to stress developing a greater understanding of the industry and its participants. Toward the end of this period, advisors also began to seek legitimacy as a distinct discipline by expanding the constituency of NCREIF to include real estate investors, consultants and non-specialized service providers. The mid-1980s also signified the period in which there was a growing --albeit gradual-- acceptance of real estate as distinct asset class. This acceptance was based in part on empirical research into the contributions real

estate could make to a mixed asset portfolio. This development was important to the emergence of real estate as an asset class, since it was based on empirical data, which had previously been lacking.

The third stage of the evolution of institutional real estate investment began in the latter 1980s and has carried into the mid-1990s. Throughout much of this period, -the industry has faced a dramatic setback, which has all but reversed the previous efforts to increase real estate exposures. The underlying imbalance in supply and demand was exacerbated by the prolonged recession. During this period of market collapse, the regulatory environment became more onerous. Rather than merely focusing on issues related to fraud and professional ethics, regulators began to intervene in the free market system. This intervention included the imposition of tougher procedures to guide the management of financial institutions relative to real estate, increases in reserve requirements and restricted business activities. Within the industry itself, investors, regulators and rating agencies and some larger clients stepped into the appraisal process, and began to legislate professional standards and practices. This degree of intervention began to erode the role of real estate as a distinct asset class, since it increased pressure on forcing real estate into a more fungible industry. These efforts may have been well intended, but were somewhat misguided if indeed real estate is a distinct asset class.

Structure of the Industry

The real estate industry can be subdivided into two distinct components: spatially based, and asset-based. The spatial side of the equation deals with the supply and demand for the bricks and mortar dimension of real estate. On the other hand, the asset side deals with the supply and demand for investment positions, which are somehow collateralized by the underlying spatial elements. A wide array of participant's function on the both the spatial and asset sides of the industry. These participants can be grouped into four categories: producers, consumers, facilitators, and regulators. In order to predict

the direction in which the industry evolution is likely to go and establish the roles the various participants will play, it is useful to look at assigning real estate to some existing sector or asset class. If real estate is a distinct asset class, then the case will have been made analysts must begin to understand the interaction between the spatial and asset components of the industry. Likewise, analysts must be able to predict how market participants will interact to affect transactions prices.

Sector Assignment

There is no one definitive method for assigning assets to one of the basic asset classes (i.e., cash, equities and fixed income) or established sectors. However, several approaches can be applied. First, assets can be assigned on the basis of commonalities of financial characteristics including P/E ratios and dividend yields. Second, assets can be assigned on the basis of the underlying economic sectors using such generally accepted classes as durables, nondurables, capital goods, transportation, finance and technology. Third, assets can be assigned on the basis of behavior of total returns, assuming positive correlations could be established. Finally, assets can be grouped on the basis of growth patterns, cyclicity or earnings stability. Once asset groups have been assigned to asset classes or sectors, they can be subject to a range of fundamental analysis.

On the surface, it might appear real estate assets can be assigned to some sector under one or more of the previous approaches. Clearly, some components of the industry can be assigned to other financial sectors. For example, commercial mortgages can be assigned to fixed income assets. Similarly, securitized real estate products which have received a significant degree of attention can be assigned to existing sectors. Despite these exceptions, direct and indirect forms of ownership of real estate assets are so heterogeneous that the overall industry cannot be assigned to any one-asset class or established sector. At the aggregate level, the industry is simply too broad and diverse to be unambiguously assigned to any specific asset

class or sector. In order to clarify this position, it is useful to explore the evaluative criteria, which can be used to establish whether an asset group is a distinct asset class or merely an industry sector.

Asset Class: Evaluative Criteria

At the most basic level, the major asset classes of a country consist of those, which make up the majority of its investable wealth. According to Ibbotson and Associates, stocks, bonds and real estate make up over 90% of the world's investable institutional-grade wealth. These investments can be disaggregated into a number of major asset classes including: large and small capitalization domestic stocks; international stocks; long-term and intermediate-term Treasury and corporate bonds; U.S. and global bills; mortgage-backed securities and direct real estate ownership. The remaining investable institutional wealth is composed of precious metals and other assets, which are closely held and are traded infrequently. Each of the major asset classes can in turn be subdivided into a number of sectors.

The inability to assign real estate to an existing asset class provides some industry support for the acceptance of real estate as a distinct asset class. However, in order to resolve the issue it is necessary to explore the criteria, which must be satisfied by asset classes including:

- **unique assets:** distinct asset and market systems not capable of being fit into the basic categories of equities, fixed income or cash due to differences associated with underlying assets;
- **unique market mechanism:** nature of market, price-setting and underlying demand functions are unique; in the aggregate the sectors within the asset class must exhibit some underlying commonalities which affect performance and can be quantified;
- **a meaningful grouping:** the asset class must exhibit underlying product and

market fundamentals which distinguish performance and are subject to prediction; and,

- **substantial in size and opportunities:** comprised of a significant level of wealth; includes a number of investment opportunities for which the reward and/or risk reduction is associated with understanding the asset class.

Distinguishing Features of Real Estate

Unique Assets

- **Real Asset Base:** real estate is comprised of land and improvements; while the bricks and mortar are a wasting asset, the land typically has an enduring value which may be independent of existing usage; despite the existence of common asset composition of land and improvements, real estate is not comprised of fungible products, but products which are fixed in location.
- **Partially Derived Asset Value:** the value of the underlying land is a function of externalities, of linkages and infrastructure investments which are not controllable by owners; real estate values are subject to windfalls and wipeouts associated with government entitlements.
- **Production Function:** unlike other intangible assets which can be created by paperwork, commercial real estate must be produced through a long, capital-intensive, labor-intensive process; this production requires the coordination of a wide number of participants ranging from technicians to regulators.
- **Risk Characteristics:** a key differentiating feature of real estate as an asset class is the proper assessment of risk and recognition of how it differs

from other asset classes; real estate investors face of range of micro risks associated with analysis of local market dynamics and tenant exposures and, macro risks addressing an array of business and economic exposures.

- **Durable Product:** unlike many other asset classes and sectors, real estate assets cannot be easily recycled; in addition to requiring on-going maintenance and insurance, risk exposures associated with real estate investments (e.g., environmental) cannot be extinguished by merely transferring title in return for some consideration; environmental exposures can be traced back to prior owners who have presumable transferred interests.
- **Management Control:** investors -- especially nondiscretionary investors-- operating on their own or with the advice and assistance of a range of service providers can exert direct control over business operations; this control may enhance or detract from the performance of a specific investment; rather than focusing on individual investments, this control can be designed to balance portfolio level goals and objectives which cannot be accommodated in most other investments.

Unique Market Mechanism

- **Imperfect Market:** interests in real estate, unlike the vast majority of assets, are traded in an imperfect market, in which information is scarce and costly, transaction costs are high, the number of transactions is low relative to the total number of assets, and prices are set through decentralized negotiations between buyers and sellers.
- **Price-setting Process:** prices are established on a transaction-by-transaction basis; negotiations are

established through a dyadic relationship in which buyers and sellers establish subjective values based in part on contractual lease schedule and known or predictable changes to the relative supply/demand equation; although imbalances in information create an unequal footing during the price-setting process, for a transaction to occur the subjective values of the buyer and seller must overlap to form a zone of negotiation --the region within which buyer or seller dominance will determine the ultimate price.

- **Illiquidity:** real estate has generally been recognized as an illiquid asset; unlike other assets, there is no established ready market and no clearinghouse for secondary transactions although such initiatives are being launched; due to the lumpiness of investments and the inefficient nature of the market, transactions which do occur require a significantly longer period of time than other asset classes.
- **Localized Demand:** despite the increase in globalization of financial markets, real estate remains largely a local market product; demand is a function of relative scarcity in the context of physical space and logistics.
- **Lumpiness:** unlike most other institutional investment classes, real estate remains a "lumpy" investment, an investment with high per unit values stemming from the capital intensive nature of the assets; an exception is the growing body of securitized products.

Meaningful Asset Group

- **Long-term Cycles:** most other asset classes have short-to-intermediate investment cycles; core institutional real estate investments --excluding opportunistic investments which focus on timing strategies-- have long term

(e.g., 10-12 year) cycles, varying in length by submarket and property specific factors.

- **Nature of Returns:** real estate returns are comprised of two elements; income and capital; income returns are partially determined by existing leases and foreseeable leases; capital returns are established by required investor yields (i.e., cap rates), projected net income levels and anticipated asset demand.
- **Pattern of Returns:** institutional real estate has relatively low to negative correlations with other asset classes including stocks and bonds; returns differ in part due to the dual sources of returns --income and appreciation--and the contractual nature of some of the underlying leases not available to other asset classes.
- **Measurable Performance:** a number of return series are available to gauge real estate performance; sources range from industry benchmarks published by trade groups including NCREIF on the equity side and the American Council of Life Insurers (ACLI) on the debt side; return series are also published by a number of consultants and other facilitators; available indices can be used to establish performance bogeys which can be stratified along major sector lines.
- **Heterogeneous Asset Class:** most investment classes or market sectors are relatively homogeneous; although real estate has the common thread of an underlying real asset base and an income component, institutional-grade investments can be aggregated into property type and locational subclasses.

Substantial Size and Opportunities:

- **Size of the Pie:** estimates of relative levels of investable wealth suggest the value of commercial institutional grade

real estate is in the range of \$1.8 - \$3 trillion; in terms of market share, it appears commercial real estate comprises some 20% of total wealth; within the asset class, significant holdings are attached to the major asset classes (i.e., property type and location) affording the ability to establish meaningful portfolios within the asset class.

- **Investment Opportunities:** a diverse array of investment opportunities are available to institutional investors; investments may take the form of a variety of structures and investment vehicles; due to the lumpiness of investments, opportunities to structure a meaningful real estate portfolio can be executed at the individual property level, the fund or co-investment level, and the portfolio level.
- **Reward for Understanding:** real estate investment performance depends on the careful coordination of a number of factors of production, operation and consumption; understanding the strategic and dynamic forces of demand and supply can provide high rewards; failure to understand such fundamentals can create wipeouts; due to market imperfections, ability to make informed decisions can provide a competitive edge which can be used to beat the overall market.

Conclusion to Asset Class Question

We have explored the question of whether real estate is a distinct asset class or a sector. This analysis began with an attempt to assign real estate to an established asset class. Clearly, some sectors of real estate can be assigned to established asset classes. For example, commercial mortgages and mortgage-backed securities can be assigned to fixed income sectors. Likewise, the new wave of securitized real estate products can be assigned to existing sectors. With respect to equity investments --

both direct and indirect-- real estate belies classification into existing sectors. This conclusion is based on the fact unsecuritized real estate assets are unique and the market mechanism through which transactions occur is also unique. On the other hand, the effort to understand the asset class is warranted by the fact that it is a meaningful asset class and, in the aggregate, involves substantial assets.

Part II: Is Real Estate a Viable Asset Class?

Overview

In this paper we have explored the question of whether real estate is a distinct asset class. As we noted in the introduction, this question is critical to the industry. Over the past several years, certain components of total real estate assets have been moved into the public market arena and have lost much of their distinction from other asset classes. On the other hand, a significant portion of the overall real estate wealth pie cannot be clustered into any existing asset class or sector. When coupled with the fact that real estate is a complex industry, it is clear that the asset class must be approached from a relatively sophisticated perspective. In order to determine if the necessary investment is warranted, it is useful to review the rationale for including real estate in a mixed asset portfolio. The supportive arguments can be grouped into two categories: traditional rationale, and contemporary rationale.

Traditional Rationale

Five major factors have been included in traditional arguments supporting the addition of real estate to institutional portfolios. These factors include:

- **Generally Attractive Total Returns:** over the past several years, real estate returns have reached record lows which have placed real estate at somewhat of a disadvantage relative to other asset classes; despite these recent downturns, over the long term historical and



forecast, real estate should deliver attractive total returns, in the range of 9-10% nominal and 56 % real.

- **High Risk-Adjusted Returns:** over the past 15 years, equity real estate has experienced risk-adjusted returns somewhere between the S&P and 90 Day T-bills; anticipate standard deviations can be reduced by added discipline and exploiting the benefits for diversification.
- **Inherently Low Volatility:** some observers argue the observed standard deviations are an artifact of the appraisal process, rather than reflective of actual values; the low observed volatility can be explained in part by the nature of the price setting process, the nature of the underlying income stream, stability in cap rates, and the capital intensive nature of real estate.
- **Inflation-Hedging Potential:** over the past several years, real estate has lost much of its ability help hedge inflation; this loss is due in large part to the fact that market conditions are so weak that owners cannot pass through significant increases, but may wind up eating some of the overhead
- **Portfolio Diversification Benefits:** diversification should be a means to an end --not an end in itself; real estate continues to complement other asset classes in terms of offsetting cycles; looking forward, investors will look very carefully at the trade-off between inter-asset diversification and performance.

Contemporary Rationale

The contemporary rationale for justifying real estate allocations in institutional portfolios stem around several major factors: market inefficiency; performance predictability; ability to extend quantitative analysis; and benefits

from extending portfolio tools to capture superior risk-adjusted returns. In addition to these general factors, long term real estate performance can be enhanced by taking advantage of the down cycle in commercial real estate. When such additional investments are coupled with existing investments with solid long-term fundamentals, investors should be able to beat the averages.

Implications

Our conclusion that real estate is a distinct asset class has a number of implications for asset allocation, portfolio construction and portfolio management functions. In particular, such decisions should be approached with an eye to understanding the underlying forces that drive real estate values and markets. With respect to implementation, participants should also be able to develop explicit strategies for market timing, transaction underwriting, and asset/property management. Assuming the proper scrutiny is brought to bear on the issues, the risk profile of real estate investments should be dramatically lower. In order to tap into such benefits, the industry must continue to build toward a common body of knowledge. To be successful, this effort will require a close alignment of the academic and professional communities.