Commercial Real Estate: New Paradigm or Old Story?

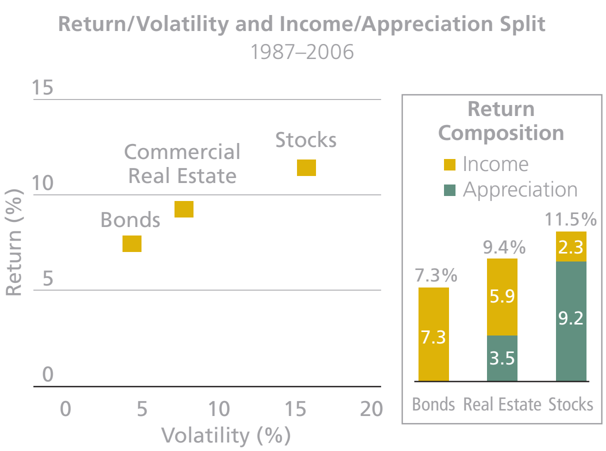
by Jon Ruff, Director—Wealth Management Group

Investors used to count on real estate for its rich yields and low risk, but today income yields from commercial property are at historical lows and prices at record highs. Have the established rules of owning commercial property changed?

SINCE THE START OF THE MILLENNIUM, everything seemed to go right for commercial property investors. Attracted by properties' juicy yields, income growth potential, and an attractive rate environment, they poured capital into the asset class, sending prices to all-time highs. But with valuations now at record levels and the credit environment worsening since the start of the summer, is the bloom coming off the rose? In light of the remarkable developments in the market and the growing prominence of real estate in investors' asset allocations, we embarked on an in-depth analysis, examining both the private and public markets. But more important, we have tried to dig beneath the primary investment approaches—direct ownership or securitized REITs (real estate investment trusts)—to understand the fundamental factors driving the asset class itself, and to determine whether the long-term case for commercial real estate investment remains intact.[1]

Display 1

Commercial real estate offers the best of both worlds—income and appreciation



Past performance is no guarantee of future results.

Source: Global Financial Data (GFD), Lehman Brothers, MIT Center for Real Estate (MIT CRE), National Council of Real Estate Investment Fiduciaries, and Standard & Poor's

Commercial Real Estate Historically: A Stock/Bond Hybrid

For all their familiarity as structures, office skyscrapers, apartment complexes, shopping malls, and other commercial properties have never been a core component of most investors' asset allocations. And it hasn't been performance that's gotten in their way. Over the past 20 years the returns for this asset class—almost 10%—are just a bit below those of stocks, but its volatility is much closer to that of bonds (*Display 1*).[2] What's more, performance has been well-balanced, with approximately two-thirds of returns coming from current income (cash generated by rents, net of operating and maintenance expenses) and the remainder being driven by property price appreciation. Commercial

[1] For the purposes of this study, and given the data limitations, we are defining the commercial real estate asset class as a fully diversified, unlevered national cross section of "core" income-producing properties, including office, retail, industrial, and residential apartment buildings.

[2] Understanding the data sources and data quality is critical in researching real estate valuations and returns. Where possible, we are using a transaction-based index to measure price changes in the private commercial property market (the MIT/NCREIF Index). This index, which includes data beginning in 1986, avoids the time lags and valuation subjectivity inherent in traditional appraisal-based price measures, and is more representative of the broad asset class than the securitized REIT index, which reflects leveraged returns and whose data prior to 1992 do not fully represent the underlying value of the real estate market.

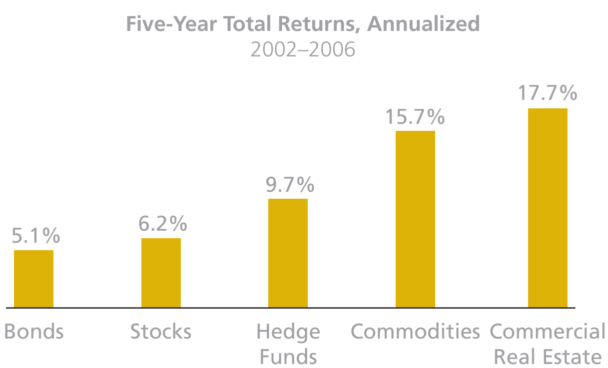
real estate's historical combination of strong income and growth characteristics makes it seem like an interesting stock/bond hybrid.

Commercial Real Estate Today: Prices Spike, Yields Shrink

More recently, the prominence of commercial real estate as an *investable asset class* has been cycling to a new high. Capital flows began to accelerate as the stock market bubble deflated from 2000 to 2002 and investors fled high-flying growth companies for stability in real estate, which offered tangible assets and positive cash flows. What could be more Old Economy, more brick-and-mortar, than property and the stable income its buildings generated? Commercial real estate then proceeded to outperform every other major investment category, including hedge funds (which saw record asset flows) and commodities (whose recent run-up reflects the bull market for raw materials over the last several years), as shown in *Display 2*.

Display 2

Property's high performance: Is it experiencing a cyclical peak, secular change, or both?



Past performance is no guarantee of future results.

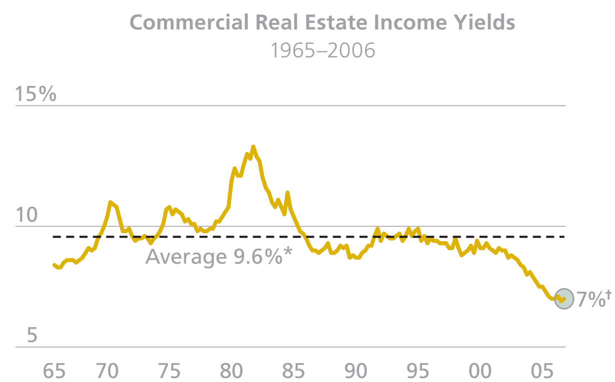
Bonds are represented by the Lehman Brothers US Aggregate Index, stocks by the S&P 500, hedge funds by the HFRI Fund Weighted Composite Index, commodities by the Reuters-CRB CCI Commodity Index, and unlevered real estate by the MIT CRE Transactions-Based Index.

Source: Hedge Fund Research, Inc. (HFRI), Lehman Brothers, MIT CRE, Reuters-CRB, and Standard & Poor's

But as real estate prices have moved higher and higher, the income that properties throw off has grown at a much more modest pace; as a result, the income yield has been shrinking. At year-end 2006, the yield offered by commercial properties—also known as the *capitalization rate*—stood at an all-time low of 7%, down nearly a third from its historical average (*Display 3*). After accounting for the investment needed for ongoing capital expenditures, we'd place an investor's actual income, or "cash" yield, at only 5%—a return on par with that of Treasuries![3]

Display 3

As prices peak, real estate cap rates hit 40-year low



*Average of four major property types, 1965–2006

†Capitalization rate = net operating income/value

Source: American Council of Life Insurers (ACLI) and Real Capital Analytics (RCA)

With yields this low, investors will become more dependent on continued price gains to earn their returns. Those price gains can be driven by two sources:

> **Future income growth:** If property income grows, real estate prices should increase at the same rate (assuming investors continue to place the same valuations on that income).

[3] It is important to distinguish between income yield (capitalization or "cap" rate) and cash yield, which is simply the cap rate minus the capital expenditures (capex) needed to maintain the properties. We have assumed throughout a capex estimate of 2% to derive our cash yield figure. Unless otherwise stated, the cap rates quoted here refer to an equal-weighted average of office, industrial, retail, and apartment property types. Running the analyses in this section for the individual property types would produce virtually identical results. The similarities between property type fundamentals and valuations far outweigh the differences.

- **Valuation changes:** Investors might be willing to pay higher prices for less income—as they have over the last several years (in real estate terms, *higher valuations* are represented by *lower income yields*).

But how much income growth can property investors reasonably expect? And can current valuations hold in the face of recent market headwinds, or are prices likely to move ever lower, sending the income yield on real estate back to its long-term average? Were that to happen, prices would fall by 25%! These are the critical questions for all property investors today—whether they hold REITs or own properties directly.

We've analyzed the drivers of real estate returns and the evolution of the asset class, and our research has led us to two main conclusions:

- **Returns will be lower:** While income growth rates can vary substantially over the short term, over the long term we'd expect growth not to exceed the rate of inflation. Combining current cash yields of 5% with inflation expectations of about 2.5%, we'd expect long-term returns in the 7–8% range.
- **Risk will be lower as well:** Investors should be willing to accept lower returns from real estate than they have in the past because investments have become easier to diversify, more liquid, and more transparent than they used to be. Plus, broader capital market forces, like lower interest rates and a general smoothing of the business cycle, have propped up prices across nearly all asset classes. For these reasons, we believe that in the long term, real estate valuations can remain somewhat higher than they have been historically.

In short, although real estate as an asset class has gotten pricier, some of its richness is justified by the decline in the risk of holding it. And while richer valuations do increase our concerns about short-term price volatility, some of which we've experienced firsthand in recent months, our analysis suggests that the long-term case for real estate investment remains intact.

The Building Blocks of Commercial Real Estate: A Valuation Analysis

We analyzed a number of forces at play in the property market. First, there is the question of real estate fundamentals—the supply of and demand for space. Can the demand for property outpace supply and thus cause income to grow faster than it has in the past, offsetting unusually low current yields and boosting total return? Second, in considering the possibility of a shift in valuation, we also need to look at capital market forces like interest rates and mortgage spreads. Real estate needs to be priced so that an investor can earn sufficiently more than these rates for an investment to make sense. Finally, we look at how the risk of property ownership itself has evolved, given the influence of securitization as well as a general reduction in business cycle volatility, and how that might influence valuations.

Real Estate Fundamentals: The Long and Short of Income Growth

There's good reason why investors historically have seen real estate as a safe, yield-bearing investment, similar to a fixed income asset. In the short term, real estate cash flows (from current leases) can be thought of as bonds with maturities equal to the lease term and credit quality that's dependent on the quality of the tenants. And while some leases automatically adjust upward for inflation, one should not expect significant income growth over the term of these "bonds."

Any opportunity for growth comes when current leases expire. At that point, landlords and tenants alike are exposed to the local real estate cycle of occupancy rates and new construction, and with it the current asking rents prevalent in the market. This can be a boon or bane: A vibrant economy and an absence of new construction could cause demand to outstrip supply for space, pushing up rents; a recessionary malaise or an oversupply of space would reduce rents.

Today, commercial real estate occupancy and construction rates suggest that the market is pretty well in balance. As of this writing, vacancies stand at about their long-term average of 9% across all the major property types (*Display 4, left*). As for supply, it turns out commercial development has been restrained by two factors. Material costs have increased substantially due to the run-up in commodity prices globally. Meanwhile, residential developers' recent frenzy of overbuilding has bid up the price of land. As a result, the pace of new completions seems to have stagnated over the last few years, remaining below its long-term average of 1.5% (*Display 4, right*). The recent dearth of new building augurs well for near-term rent growth if the economy remains strong, but projections for full-year 2007 and beyond show a substantial pickup in supply on the horizon. In sum, there's no reason to believe that short-term income growth is at a cyclical low and set to move sharply higher.

Long-Term Income Growth

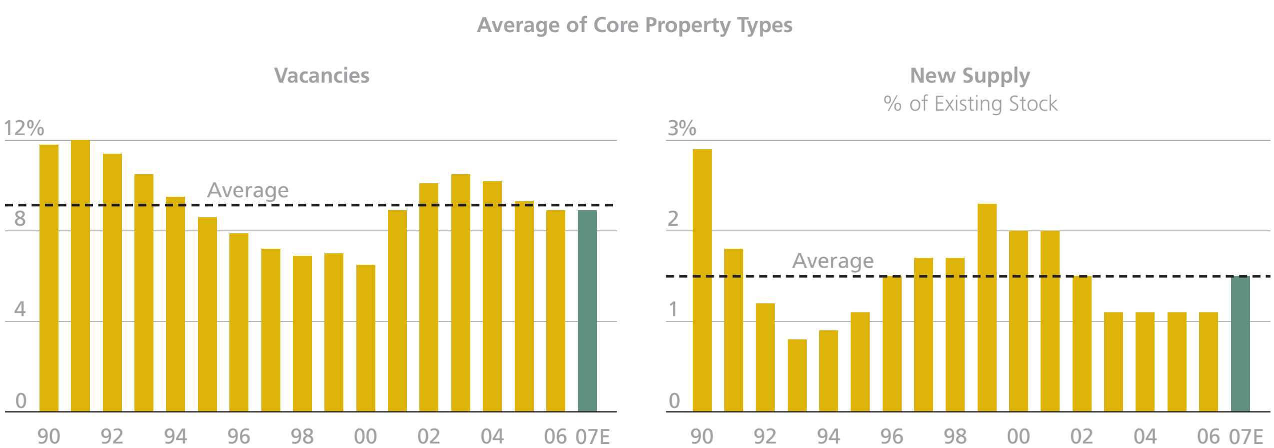
With the short-term growth outlook modest at best, we shift our attention to commercial real estate's long-term prospects. And over the long term we expect income growth to more or less track inflation. Here's why: Buildings, at base, are brick and mortar, land and labor. When finished, they produce a stream of cash flows for their owners. If the costs of developing a building increase, an investor will require greater cash flows to achieve an attractive enough return.

Conversely, if it costs less to build, supply will gradually come online, pushing rents lower. Throughout history, when rents and development costs get out of line, the market inevitably corrects itself. So over the long term, the cost to build or "replace" a structure should be the proxy that investors use to set income growth expectations for the asset class.

Replacement costs for commercial property consist of approximately one-third land and two-thirds building costs, or materials and labor.[4] It turns out all three items bear a close relationship to inflation. Labor typically

Display 4

With supply and demand currently in balance, prospects for long-term income growth seem modest



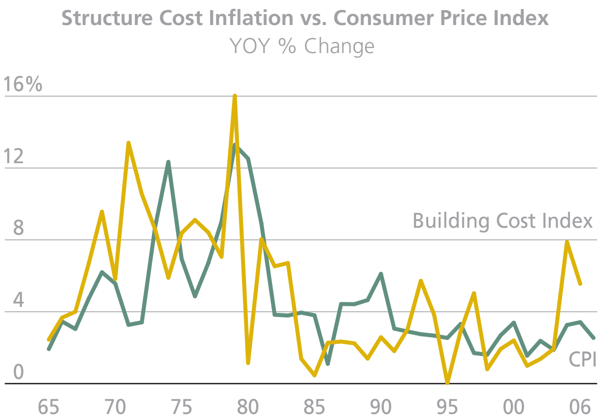
Source: Reis, Inc.

[4] This breakdown of replacement costs represents the long-term countrywide average. It could vary significantly by property type, location, and time period.

appreciates at a rate slightly higher than inflation, and materials at a slightly lower rate. Taken together, these factors suggest that building costs should grow at or about the pace of inflation, and, in fact, they have (*Display 5*).

Display 5

Structure costs tend to move in line with inflation



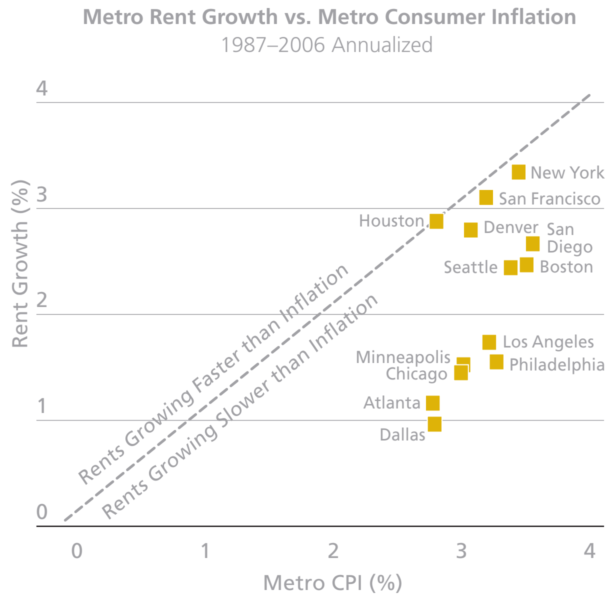
Source: Bureau of Labor Statistics and *Engineering News-Record*

The wild card then is land. Some feel that land's appreciation potential should be limitless, since at some point you simply run out—think of Manhattan, London, or Tokyo. But in reality, land will exhibit a growth rate above inflation only if it benefits from a step-up in value attributable to a change in usage: the rare transition from farmland to residential or from residential to commercial. Barring such a shift, uncommon in a core metropolitan area, the aggregate value of land should rise in line with general inflation over the long term.

While data on land price growth are limited, we can analyze rents from the central business districts of mature cities to get some clues. And remember, since building costs grow at a rate close to that of inflation, any large divergence in long-term rent growth should be explained by the cost of land. Over the past 20 years, rent growth in major US cities, on average, has

Display 6

Metro rents grow more slowly than inflation



Source: Bureau of Labor Statistics and National Real Estate Index

not even kept pace with local price measures—an indication that land has generated subpar growth (*Display 6*).

Today, market and consensus estimates for long-term inflation tend to hover in the 2–3% range, which is far lower than historical realized or expected inflation. If we add that rate of growth to real estate's income yield and subtract maintenance costs (to get to our "cash" yield of 5%), we have an estimate of what investors might reasonably expect from this asset class. We've used this methodology to create a historical series of real estate return estimates. The picture that emerges suggests that the prospective total return of 7.5% currently offered by real estate is in record-low territory.[5] In our view, therefore, it seems unlikely that growth expectations in the market today, in either the long or short term, can make up for the current low level of yields. That leaves changes in valuation as the remaining part of the equation.

[5] Unfortunately, historical market-based inflation expectations data do not exist. To look at this crucial component of expected returns, we estimated inflation expectations from 1965 through 1979 and used inflation expectations in the Survey of Professional Forecasters from 1980 on; the Philadelphia Federal Reserve took over the survey in 1990. Our research suggests that investors form expectations based on recent and longer-term history, in this case trailing 12-month and 10-year inflation.

The Valuation Quandary: Market Cycles, Secular Change, or Both?

Capital Markets Pressures: Rates Slide, Hurdle Drops

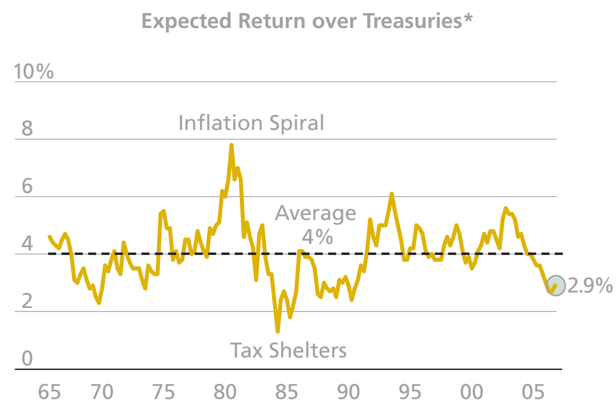
Thus far our analysis assumes that valuations remain intact. But is that likely? Even though current real estate valuations may seem rich, context is critical: Any investment needs to be judged relative to a number of factors, including the returns available from other investment alternatives, its funding costs, and the risk inherent in the opportunity. As it turns out, all three of these bases of comparison present lower hurdles for the real estate investor today than they have historically, even considering the recent turmoil in subprime mortgages and related credit markets. As long as these elements stay in place, we believe, valuations can remain richer than they have been historically. Let's first focus on Treasury yields, a key capital market force that has been affecting real estate values.

The 10-year Treasury yield is key because it represents the risk-free alternative to which many long-term investments are compared. The difference, or spread, between the 10-year Treasury yield and commercial real estate's income yield, or cap rate, is an indication of the extra yield real estate offers investors for bearing the risk of owning it. And just as real estate cap rates are well below their historical averages, the 10-year Treasury yield recently hovered nearly *300 basis points* below its historical average. Viewing the asset class through this lens explains at least some of the corresponding drop in commercial real estate's yields.

But comparing real estate's income yield to Treasuries does not go far enough, because real estate also offers growth potential. To truly understand the return environment, it's necessary to add the projections for income growth rates to real estate cash yields and compare that to Treasury rates. We can thereby gauge the additional return that real estate is priced to offer based on valuations at the time and the growth opportunity—it's a measure of the so-called "real estate risk premium." If the risk premium is high, real estate is being priced to offer significant additional return compensation for the risk of investing. If it's low, it may be that valuations would need to come down before the asset could better compensate investors for the risk (*Display 7*).

Display 7

Risk premium compression: Commercial real estate is now priced to return less than its historical average



*Data reflect historical inflation regressions from 1965 through 1979 and survey inflation from 1980 through 2006.
Source: ACLI, GFD, Lehman Brothers, and RCA

With this analysis, one can see that real estate was priced to offer a significant return premium over Treasuries in the late 1970s—the result of a conjunction of high income yields and expectations of strong income growth that came along with the spike in inflation of the time. Then, in the early 1980s, the risk premium fell to record lows as investors bid up the value of real estate assets, and tax loopholes emerged that made real estate investing more advantageous for wealthy private investors.[6]

[6] Changes to the tax code opened a tax loophole allowing wealthy individuals to use passive losses from real estate tax shelters to offset their other income, and a change in the depreciation rules for commercial real estate allowed investors to depreciate a building over 15 years rather than the prior standard of 40 years. The legislation that created some of these incentives was the Economic Recovery Tax Act, passed in 1981; the Tax Reform Act, which became law in 1986, helped to curtail them.

Due to the strong price appreciation of the last several years, the real estate risk premium has again dropped sharply and now stands at about 3% over Treasury yields, as the display on the preceding page shows. While not quite at historical lows, it is a full percentage point below its long-term average of 4%.

In analyzing these results, we would emphasize two points. First, while the return expected has dropped substantially, it fell from what looks to have been a cyclical peak in 2001, when the asset class was very attractively valued. Therefore, much of the recent performance has been simply a reversion to the mean. Second, although the return opportunity is below the long-term average, we believe there are at least two justifications for this. One is the increase in securitization—converting mortgage loans into tradable public securities—which we think has driven a sharp compression in commercial mortgage spreads, lowering the cost of financing for real estate investors. The other is the broader compression of return expectations across all asset classes, the result in part of a global decline in business cycle volatility.

The Role of Securitization: Evolution or Revolution in Mortgages?

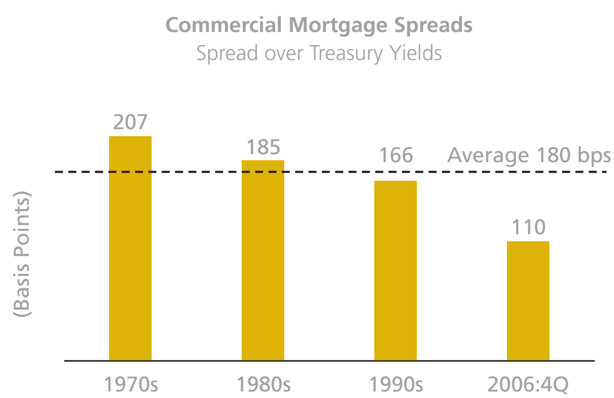
Real estate used to be privately financed by banks and insurance companies that made mortgage loans to investors and then carried all the credit risk on their balance sheets. Since the loans were concentrated and illiquid, the lender would demand a high interest rate and favorable terms on the loans.

Also, because these two industries provided basically all the financing, if they happened to encounter business headwinds, as they did in the early 1990s, access to mortgage funding could suddenly dry up, creating one of the greatest risks to levered investors: the inability to refinance their maturing balloon mortgages.

Securitization changes this equation, lowering the risk of diminished access to funding and the cost of that funding as well. It allows for the packaging of a pool of loans into a diversified, publicly traded security, which the lender can take off its balance sheet and sell to many new investors. This essentially creates another source of debt financing for real estate investors, reducing the risk of finding the lending market closed. Furthermore, freed from holding the burden of concentrated, illiquid loan portfolios, lenders can provide loans at lower rates.

Display 8

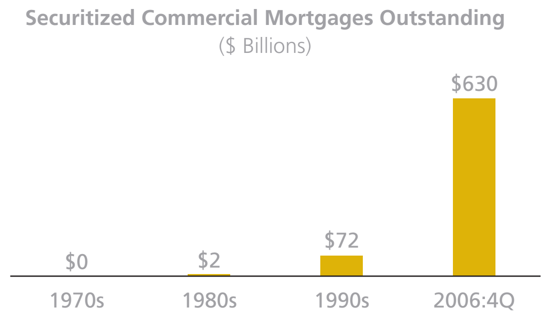
Cyclical or secular shift: Mortgage rates have dropped…



Source: ACLI and *Barron's*/John B. Levy & Co. National Mortgage Survey

And they have. As *Display 8* shows, the commercial mortgage rate spread to Treasuries has fallen pretty consistently over the last few decades. More remarkably, this spread seems to have collapsed of late; as of the fourth quarter of 2006, it stood 70 basis points below its long-term average. This collapse in mortgage spreads happened to coincide with a dramatic increase in securitization, Display 9

...as private debt markets go public



Source: Federal Reserve Flow of Funds

$630 billion worth of it in the fourth quarter of 2006 (*Display 9*). To put that number in perspective, 15 years ago, less than 2% of commercial mortgages were held in commercial mortgage-backed security (CMBS) form; today more than 26% are.[7]

In our view, this accounts in large part for the recent precipitous drop in mortgage spreads, which has lowered the return hurdle levered real estate investors must surpass, helping explain much of real estate's current lower risk premium to Treasuries. Of course, spreads have widened of late as a result of the recent credit market turmoil, primarily due to the mispricing of risk in some more esoteric securitization structures. However, while the unwinding of these structures and repricing of risk will put pressure on spreads in the near term, we do not believe the longer-term trend of mortgage securitization will reverse.

But there's more, and with it more reason to believe that real estate's risk premium in the long term will be lower than its historical average. For along with an increase in the number of providers of debt capital, there has been an expansion in the number and type of equity investors in commercial real estate.

For example, real estate investment trusts—REITs—are publicly traded, professionally managed vehicles that bring new levels of liquidity and transparency to the sector. In the US alone, REITs, which grew from less than $20 billion in market capitalization a decade ago to almost $400 billion by year-end 2006, have dramatically increased both the breadth of investor type and the depth of capital flowing into real estate markets.

The changes to the usual risks of holding real estate assets have been enormous:

> **Concentration**—Cheaper and easier diversification has reduced the "concentration premium" required for holding real estate assets.

> **Illiquidity**—Cheaper and easier public market transactions have reduced the "illiquidity premium" required to own real estate assets.

> **Lack of transparency**—Improved pricing of data, meanwhile, has reduced the "information premium" required to invest in opaque real estate markets.

As the conventional risks of real estate ownership have shrunk, investors require less return to hold it, and the risk premium has therefore fallen.

Business Cycle Volatility on the Wane: The Great Moderation

The decline in real estate risk is also tied to increased economic stability generally over the last 15 years, sometimes referred to as the great moderation. Take US GDP growth. Inventories, which are prone to wide swings, historically have represented about a quarter of GDP. But as the US has progressively exported

[7] Wall Street innovation in this area has continued with the morphing of commercial mortgage-backed securities structures into collateralized debt obligations (CDOs). The CDO market, which provides an outlet for higher-risk tranches of CMBS mortgage pools, increased in size in 2006 by more than 60% over its record volume in 2005, to reach nearly $35 billion. Concerns that the ample liquidity being generated by all this activity could be sowing the seeds of future problems were borne out this year as trouble in the subprime mortgage markets triggered market turbulence worldwide.

its manufacturing capabilities, inventories have shrunk and today constitute only 14% of GDP. Moreover, real-time inventory management has reduced the volatility of raw stock fluctuations.

Another example is a more predictable inflation rate. The decline in volatility in this key variable is due to a number of factors. For instance, an increase in imported goods as a share of consumption has had the effect of disciplining prices through a vast expansion in the quantity and diversity of the supply of goods. This doesn't mean that we are now immune to inflation problems, but rather that any such problems are likely to develop more gradually than in the past, with fewer good and bad surprises, and each of lesser magnitude. This has many positive implications, most notably the reduced likelihood of very wide "corrective" swings in monetary policy, and less attendant economic volatility. Moreover, these changes appear to be structural in nature, and, as such, their beneficial effects should prove lasting.

Conclusion: Stay Strategic

In our view, despite the recent turmoil in subprime mortgages and the credit markets generally, secular changes appear to be altering the long-term risk associated with real estate, and therefore lowering the returns investors will require from it (*Display 10*). But it's only in hindsight that one can safely determine whether something is a permanent feature or a cyclical shift. *While our analysis is long term in nature*, it does highlight some short-term factors we must still watch for: Rising interest rates, a continued widening of mortgage spreads, a drop in liquidity due to tightening credit markets, or a shift in the flow of equity capital could all move against the asset class, separately or simultaneously. This could hurt investors overexposed to commercial real estate, some of whom could suffer significant loss of equity. But these risks, of course, are not unique to commercial real estate.

So, with commercial real estate fully but perhaps not excessively valued, we think the asset class still warrants a long-term allocation. The key issue then becomes how to assess the level and sort of risks real estate portfolios present and the implications for investors' overall asset allocation. For a full discussion of this topic, please see our recent blackbook, *Commercial Real Estate: From the Ground Up.* ■

Display 10

The drivers of commercial real estate support today's rich valuations

The Elements	The Drivers	The Measures	Impact on Valuation*
Real Estate Fundamentals	Short-Term Income Growth	Market Supply/Demand	Neutral
	Long-Term Income Growth	Inflation Outlook	Lower
Capital Markets Forces	Risk-Free Rate	10-Year Treasury Yield	Higher
	Funding Costs	Mortgage Spreads	Higher
Secular Change in Risk	Diversification and Liquidity	Growth of Securitization	Higher
	Cash-Flow Stability	Business Cycle Volatility	Higher

*Relative to historical average
Source: AllianceBernstein