CONSTRUCTION FUNDING

The Process of Real Estate Development, Appraisal, and Finance

FOURTH EDITION

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Preface

When we mean to build,
We first survey the plot, then draw the model;
And when we see the figure of the house,
Then must we rate the cost of the erection,
Which if we find outweighs ability,
What do we then but draw anew the model
In fewer offices, or at last desist
To build at all?

—William Shakespeare,
The Second Part of Henry IV (Act I, Scene 3)

This book takes the reader through the real estate development process in an easy-to-understand format, starting with land acquisition and ending with permanent financing, emphasizing the financing and appraisal aspects.

An understanding of the basics of the real estate development and financing process is of tremendous benefit to anyone whose life or livelihood is impacted by the real estate sector. The authors' guiding principle in this text was to give a concise synopsis of the real estate funding and development process to aid anyone working with a developer to understand the developer's point of view. Whether you are an engineer, architect, surveyor, general contractor, or potential investor or developer, this book will broaden and deepen your understanding of every developer and development project.

Following an actual 260-unit apartment community through the development process, this book explains all aspects of the process in easy-to-understand terms with real-life examples and anecdotes.

To give the reader a front-row seat at the unfolding of the development process, the appendices, illustrations, and examples include loan documents used by major financial institutions and exhibits drawn from actual appraisals.

Written by Nathan S. Collier, a highly successful developer and owner-operator of multifamily communities, this edition is an extensive revision of a classic textbook favorite. In addition to his success as a multifamily developer, Collier, who holds a BS in Finance, an MBA, and a JD degree, also is a registered real estate broker, licensed building contractor, member of the Florida Bar, and a certified public accountant (CPA).

At a time when the simultaneous pass rate for all four parts of the CPA exam hovered below 25 percent, Collier passed on his first sitting, scoring among the

top ten individuals in the state of Florida. He has served as an expert witness on behalf of the Florida Department of Professional Regulation, been an instructor for a nationwide LSAT (Law School Admission Test) preparatory course, and taught graduate and undergraduate courses for the University of Florida's Warrington College of Business. He is a life member of the University of Florida Foundation, which oversees a billion-dollar portfolio.

Collier is on the Board of Directors of the National MultiHousing Council (NMHC) and a member of the Real Estate Roundtable and World Presidents' Organization. His property management and development firm is Paradigm Properties, Inc., whose Web site may be found at www.teamparadigm.com.

The book is divided into three major parts, which, although related, are largely independent. Part I, "Background," is introductory.

Chapter 1, "Characteristics of Real Estate," gives an overview of the real estate sector and several of its unique aspects.

Chapter 2, "Different Types of Business Organizations," outlines the fundamentals of various types of business organizations and is intended to acquaint those without a business background with the various types of business organizations they may find in the real estate field and the pros and cons of each.

Chapter 3, "Negotiation," rapidly covers the fundamentals of negotiation. After having been virtually ignored by academia, the field of negotiation is now a topic of serious study at many top business and law schools. Perhaps because every piece of real estate is unique and the development process is so chaotic, successful negotiation is a vital part of every successful development. Therefore, an understanding of the fundamentals of negotiation contributes largely to the success of any development project.

Part II is the heart of the book, dealing with the development process itself, from start to finish.

Chapter 4, "The Development Process: An Overview," gives a brief insight into the development process and includes an excellent outline of the process.

Chapter 5, "Market Studies, Site-Feasibility Analysis, and Selection," covers the factors involved in determining the proper market-selection techniques to apply to find the perfect site and the elements of a correctly conducted feasibility study to verify that the conditions conducive to the success of the project exist.

Chapter 6 is titled "Creating the Project Pro Forma." A pro forma is a projected operating statement for the development project and includes forecasts of income and any preconstruction appraisal of the project.

Chapter 7 is "The Appraisal." The appraiser's report plays a key role in determining the amount of money that a financial institution will lend to finance the construction of a development project. Understanding the appraisal and how it is formatted is a major key to understanding the financing of real estate.

Chapter 8, "Sources of Financing, the Loan Application Process, and Term Sheets," discusses the various lending institutions that are traditional capital sources for the real estate industry. Common terms are discussed and defined, and the loan application process is reviewed. The chapter also presents an in-depth analysis of a bank term sheet.

Chapter 9, "The Commitment," reviews in detail a loan commitment letter for a $15-million construction project, taking the reader through common clauses and requirements.

Chapter 10, "Closing the Loan," goes through the documents required to close a major construction loan, including the note, mortgage, loan agreement, unconditional guarantee, and closing statement.

Part III delves into two interesting and timely aspects of real estate finance and development in greater detail.

Chapter 11, "Joint Ventures," explores possible joint-venture deal structures between an operating partner (hands on, sweat equity) and a financing partner (institutional, deeper pockets), outlining various common deal points that are discussed in depth. The acquisition of an existing income-producing property is emphasized, but the arrangements have universal application.

Chapter 12, "Condominiums and Condominium Conversions," is a behind-the-scenes look at the actual sale of an existing 168-unit rental community to a condominium converter. Marketed by an acclaimed national brokerage firm, the offering generated significant response. The reader has the unique opportunity of following the bid and sale process from the perspective of the owner of a major real estate investment.

Part IV deals with some of the more mathematical and technical aspects of the construction phase, covering cash flow and funding disbursement, including the draw schedule, the time value of money, net-present value, future worth, and minimum attractive rates of return.

Chapter 13, "How to Forecast Cash Needs During Construction," explains how to plan all project expenditures; while Chapter 14, "Basic How-to-Do-It Time Value of Money Calculations," focuses on how time, interest, and the nature of repayment affect cash flow and defines total project financing and cash requirements.

Foreword

I am a developer. I develop for many reasons, the most important is that I out-and-out love it. It stirs my soul, fires my passion, captures my interest, enthralls and grips me at the most visceral level.

Development is an intense, consuming process; it also can be one of the most creative processes on this earth. Staring at a plot of land and visualizing what could be, what might be, what should be, is an exciting way to exercise the imagination.

The pleasure is in sitting down with your engineer and architect and trying to create the best project while dealing with what seems like a million and one constraints, while maximizing and optimizing those constraints. In my wilder flights of fancy, I compare project development to Michelangelo staring at a piece of marble and visualizing within the stone the statue of David.

The constraints are many: from regulatory, zoning, political, permitting, and ever-more complex building codes to the financial, marketplace, site, topographic, and surrounding infrastructure, to name a few. Sometimes it seems as though development is not so much design as it is patiently assembling a giant jigsaw puzzle.

The rewards, however, also are many. Nothing beats the feeling of watching that building come up out of the ground, slowly taking form, and eventually being occupied. I drive by projects that I completed years ago and still take pride in their beauty and the resolution of the myriad problems involved in bringing them to fruition.

Development, done right, can be quite remunerative. It is also a double-edged sword: A development project that goes south can provide a hard lesson and many sleepless nights when the full impact of a personal guarantee on a construction loan becomes all too real.

To be specific, I am an apartment developer or, as we often say in the industry, a multifamily developer. Typically, I like to develop 200-plus units at a density of 12 to 16 apartments per acre; I have developed as few as 8 units per acre (practically single-family units) and as many as 50-plus units per acre.

Like many developers, I also invest in my projects. Occasionally, I have been the builder or general contractor as well. I am atypical as a developer in several respects, at least for the size of the projects I do. First, I am an individual. Although, for many years, it was the norm for developers to be private individuals (and often eccentric ones at that), the trend today is toward corporate developers, particularly in the larger developments that I prefer. I also am atypical in that many times I am the sole investor in my projects, and I mostly keep what I develop. Many developers bring in or sell out to equity partners who build, stabilize, and flip a

property. Although some people confuse the terms, and roles sometimes overlap, being a developer of real estate is very different from being a builder or an investor.

I came up through the ownership and management side of the real estate business. I simply enjoy real estate. It has a certain solidness to it that has always attracted me. I read *Gone with the Wind* as a youth, and one scene has stayed with me: Scarlett O'Hara clutches the soil of Tara, the family plantation, and realizes that land is the foundation of everything. She vows never to be separated from the land, to always own land. It seemed like an eminently sensible philosophy to me then, and still does.

In my experience, most developers come into the business from either the construction side or the financial side, and a few come from architecture or land planning. Although the field is changing rapidly, few universities offer degrees or courses of study in development. It is a complex profession that requires an interesting variety of skills that are frequently learned on the job.

I received a bachelor's degree in finance, spent another couple of years getting an MBA with an accounting concentration, and I am a registered real estate broker as well as a licensed building contractor. And, in what now seems like another life, I also became a CPA and an attorney; I maintain my currency in both professions. I do not practice any of these professions per se, but I use the knowledge of each daily as a developer. More than anything else, I negotiate, which is why this book has an entire chapter on negotiation.

I do not do retail, office, or industrial development. Each of these is an arcane specialty in and of itself, with its own precepts, nuances, submarkets, and area-specific requirements. Although I hold a building contractor's license, it is not a primary area of expertise, and I typically hire a general contractor to do the actual construction.

Nathan S. Collier

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My thanks to University of Florida Masters in Real Estate students Garritt Bader, Patrick Boileau, Jess J. Johnson, and Marc K. Nakleh, and their professor, Mark Monroe, for providing learning points, definitions, summaries, and questions and answers for each chapter, which are new to this edition.

And special thanks and much gratitude to my tireless assistants, the esteemed Evan Weber and Jackie Proveaux, whose energy and many abilities are invaluable to me.

PART I
Background

1
Characteristics of Real Estate

REAL ESTATE'S TRADITIONAL, CYCLICAL NATURE

Real estate has traditionally been a cyclical business, and that characteristic has fundamentally shaped the industry. The basic real estate cycle, illustrated in Figure 1-1, proceeds as follows: economic expansion, robust construction, rising occupancy and increasing rents, good times, easy money, abundant financing at good rates, and boom times, resulting in overbuilding, oversupply, and a glut that may take years to absorb. A real estate recession results when new-construction starts come to a virtual halt but, because of long planning and construction time frames, completions continue to come on line. Occupancy as well as rents fall, particularly after adjusting for inflation, specials, incentives, and discounts. Eventually, as the overcapacity is worked off, occupancy and rents begin to rise again, and the final recovery phase begins. Boom followed by bust has long been a hallowed real estate tradition.

Many argue that increasing sophistication in the industry, more institutional ownership with accompanying oversight, increased accounting transparency, and greater financial discipline imposed by the involvement of Wall Street capital markets will dampen, if not eliminate, real estate cycles. Computerization and the Internet are revolutionizing the flow of information in the industry, and only time will tell the full impact of all these changes.

Transparency refers to how easy it is for the investing public to view a company's books (financial statements and operating results). Traditionally, many real estate developers operated within privately-held companies that disclosed little, if any, financial information. Mistakes and missed forecasts or overoptimistic projects could be hidden from the public eye. Today, the larger number of REITs (Real Estate Investment Trusts) and other publicly-held companies that are involved in construction and development help provide information that increases investor confidence and knowledge of the industry. Still, even publicly-held companies may legally make accounting choices relevant to how

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much detail they wish to report. A company may cite the need not to give out vital proprietary information to its competitors and may choose to report total expenses and income from operations without further breaking down the information by region, property class, or individual property.

In addition to the basic real estate cycle, shown in Figure 1-1, we will look at three other cycle types that affect the real estate industry:

1. United States national economic cycle
2. Capital market cycles, including liquidity and interest-rate cycles
3. Property market (or occupancy) cycles

Within *capital market cycles*, we will look at both *liquidity* and *interest-rate cycles*. Within *property market (or occupancy) cycles*, we will look at how various real estate sectors move through the real estate cycle at different times and how, even within one real estate sector, different parts of the country will be in different phases of the real estate cycle at the same time. We will then look briefly at how the rental-rate growth cycle impacts occupancy.

UNITED STATES NATIONAL ECONOMIC CYCLE

It is important to remember that there are many types of business cycles. The most widely followed is the U.S. national economic cycle, traditionally marked by the quarterly reporting of the expansion (or contraction) of the GNP (gross national product), with a recession defined as two consecutive quarterly contractions of the GNP. There are also global economic cycles and regional economic cycles, all of which, through imports and exports, affect investor confidence and America's national economic cycle. Obviously, new projects are more likely to be undertaken during an upswing and at the top of an economic cycle than on a downswing.

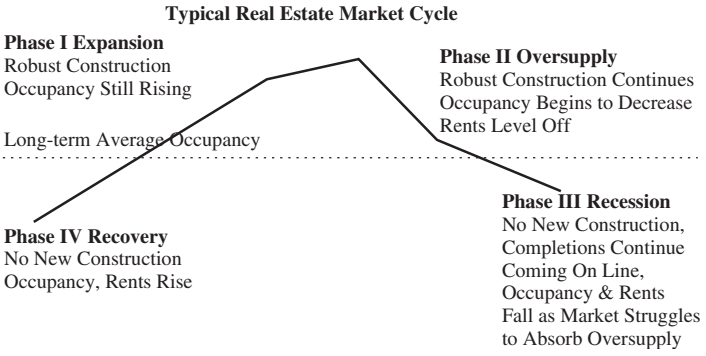

FIG. 1-1 Typical Real Estate Market Cycle.

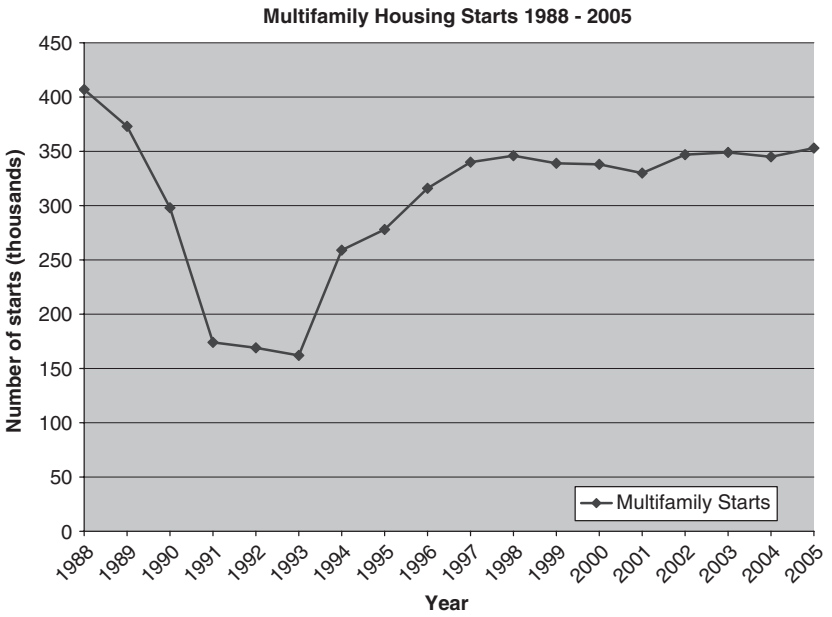

FIG. 1-2 Multifamily housing starts, 1988–2005. (*Source*: U.S. Bureau of the Census, *Construction Reports*, Series C-20, Housing Starts.)

Figure 1-2 depicts multifamily housing starts from 1988 to 2005. The impact of the real estate recession of the early 1990s is clearly shown in the multiyear decline in housing starts beginning in 1990 and continuing until 1994. The recovery phase occurs in 1995, and for the next ten years multifamily housing starts oscillate roughly between 340,000 to 350,000 per year.

The excessiveness of the robust 1988 and 1989 multifamily housing starts of 407,000 and 373,000, respectively, is highlighted by the fact that almost twenty years later multifamily housing starts are still significantly lower (345,000 in 2004 and 353,000 in 2005) in spite of a population growth of roughly 50 million people from 1990 to 2005.

CAPITAL CYCLES: LIQUIDITY AND INTEREST RATES

Compared with other sectors, real estate is a capital-intensive sector of the economy. Real estate requires a significantly greater investment of capital for every dollar of revenue generated than may be required for a less capital-intensive sector such as the service sector, hence, real estate's sensitivity to the capital markets. *Capital cycles* are affected by both liquidity and interest-rate cycles. *Liquidity cycles* reflect fluctuations in the *availability* of capital; whereas *interest-rate cycles* reflect fluctuations in the *cost* of capital. Although related, these concepts are very

different. It is quite possible for interest rates to be favorable (when the cost of capital is affordable), but for one reason or another capital is not available—its availability is constrained. The opposite also is often true: When interest rates are high, money is often very available and the markets are liquid; but the cost of the money is so high that few projects will pencil out because the cost of the capital is higher than the intrinsic return of the project. Consequently, the use of debt capital would represent negative leverage.

A classic example of a liquidity crisis occurred in the conduit lending market in the fall of 1999 when Nomura (a very large Japanese bank with a major American real estate lending portfolio) abruptly shut down its real estate lending operations, shocking the *commercial mortgage backed securities* (CMBS)/*conduit lending market* (see Chapter 8) and virtually shutting the conduit lending door for many months.

At other times in the past, real estate has simply been out of favor as a sector of the economy, either because analysts or economists did not foresee favorable prospects or because a recent real estate downturn had left painful memories of loan losses in the minds of lenders.

Interest rates move in cycles that, although related to and with impact on national economic cycles, move somewhat independently, at times lagging and at times leading the national economic cycle. The Federal Reserve (the Fed) will tend to attempt to move interest rates higher if it thinks the economy is overheating and lower interest rates if it believes that the economy is in need of stimulation. However, the Federal Reserve can directly change only short-term interest rates. The Fed affects short-term rates by lowering the discount rate (the interest rate at which the Federal Reserve lends money to banks), but longer-term rates are set by investor expectations about inflation and the necessary return on capital.

Most ten-year term, commercial real estate loans are written at a spread (i.e., the additional amount of interest charged over a given index) over the matching 10-year U.S. Treasury note rate. Spreads are quoted in basis points or 100ths of a percentage point. Spreads over the Treasury note rate will typically be 75 to 250 basis points, or .75% to 2.5%. For instance, if the Treasury rate is 5.5%, the commercial real estate rate may vary from 6.25% to 8.0% (5.5% + 0.75% = 6.25% to 5.5% + 2.5% = 8%). The spread varies according to market conditions, the type and grade of real estate, and the amount of leverage (that is, the ratio of loan to value).

Loans to the U.S. government are generally defined as risk free, shorthand for noting that there is no risk of default (an inflation risk remains, though). Because default risk is the probability that the principal lent will not be repaid, defining loans to the U.S. government as risk free is either a vote of faith in the strength of the U.S. economy on which the taxes are levied to raise the money used to repay the loans or a tacit recognition that, if the need arose, one of the powers of a national sovereign is the ability to order that money be printed to pay its bills. Of course, printing money to pay national debts is only a temporary solution. When the supply of any good, including money, exceeds demand, the price drops. Inflation is what happens when the "price" (or value) of money drops. History has shown

that rampant inflation is the inevitable result of expanding the money supply faster than the growth rate of the underlying economy. The Confederacy found this out during the Civil War in the 1860s, as did Germany during the Great Depression in the 1930s. The bitter joke in Germany at the time was that you used to be able to go shopping with your money in your purse and take your purchases home in your cart, but the hyperinflation was so bad that you had to use your cart to carry your money to market and you could take home your resulting purchases in your purse.

Because it is considered free of default risk but not free of inflation risk, the rate at which the marketplace is willing to lend money to the U.S. Treasury is considered the true cost of money plus a premium for anticipated inflation over the period of the loan. Economists have long debated the true cost of money (the rate the market would demand in the absence of risk or inflation), but it is generally considered to be about 2% to 3%.

The spread over the Treasury rate represents the risk premium the marketplace puts on commercial real estate loans. Fluctuations in interest rates charged to real estate borrowers are a result of variations in both the amount of spread over the 10-year Treasury rate demanded by the marketplace and variations in the underlying 10-year Treasury rate. This topic is covered in greater detail in Chapter 8 in relation to sources of financing.

PROPERTY MARKET CYCLES

Property market cycles, sometimes called occupancy cycles, refer to the balance of demand and supply of real estate itself. Yet, absent NASA making great strides in interplanetary exploration, because the supply of real estate is fixed, property market cycles refer to the balance of supply and demand of the buildings that sit on the real estate. Property cycles occur both in various real estate sectors and geographically within any one sector; that is, at the same time, different regions of the country will be in various stages of the cycle. In all cases, they are impacted by the rental-growth rate cycle.

Real Estate Sectors

Real estate is a vibrant, fragmented, and evolving economic sector that at times defies easy analysis. Real estate can be divided into Institutional (governmental or nonprofit: schools, museums, city halls, police stations, public hospitals, etc.), Private (owner-occupied homes), and Commercial sectors. Commercial real estate can be further divided into different sectors and subsectors. Office, Retail, Industrial and Warehouse, and Multifamily constitute a common division. The Office sector is often subdivided into suburban and central-city business districts. Retail can be divided many ways, but it is commonly divided into Regional Malls, first and second tier; Strip Malls; Factory Outlets; and Power Centers (sometimes called "big boxes" because a power center is a retailer strong enough to draw customers to a stand-alone location, to just one big box). Other types of real estate that are not as large but defy easy categorization in one of the major sectors include Senior

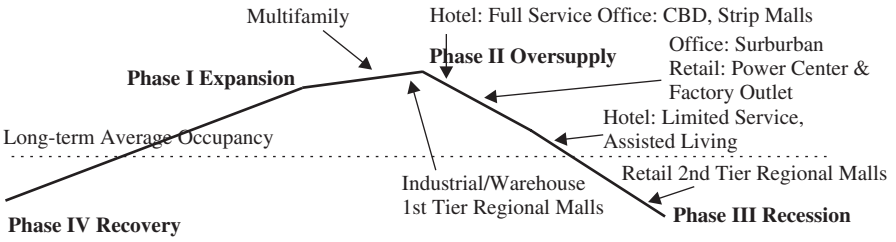

FIG. 1-3 Typical national real estate market cycle by property type.

Housing (with subsectors for active retirees, assisted living, and full service) and Hotels (full service, extended stay, limited service, and resort are potential categories), as well as specialty retail such as outlet malls and multiuse mixes of retail and entertainment. Sometimes new subsectors emerge. The trend toward miniwarehouses is an example of a sector that took off in the 1990s. "Telco hotels," that is, large equipment farms, buildings, or parts of buildings that house the transmission gear for phone, data, and Internet companies, emerged in the mid to late nineties. More recently, the residential condominium sector exploded (both new construction and conversions of existing projects; see Chapter 12) and then contracted within roughly a five-year period.

Obviously, all of these sectors and subsectors are very different and respond differently to various economic stimuli; thus, they are at any given time at different phases in the real estate cycle. Figure 1-3 illustrates a typical national real estate cycle by various types of property.

Geographic Variations Within a Property Type

Remember that although there are national cycles, by the very nature of real estate, product and occupancy cycles are local or regional in nature. Capital can flow across borders and from region to region to find the highest return; real estate, however, is immobile. If a particular region becomes overbuilt (i.e., oversupplied), it is not possible to pick up a building and ship it to a region where there is an undersupply. To a certain extent, even though the buildings do not move, it is possible for the people who occupy and use those buildings to move. However, this can be a slow, costly, and disruptive solution. Figure 1-4 shows a typical distribution of where various cities may be in a multifamily (apartment) cycle.

Typically, rental-growth rate cycles are a primary driver of occupancy cycles. Figure 1-5 illustrates a rental-growth rate cycle as stagnant to negative rent growth, characterized by the recession portion of the cycle, giving way to modest rent growth during the recovery, followed by strong rent growth during the expansion phase that justifies new construction. Equilibrium occurs at the top of the cycle but is generally recognized only in retrospect. The oversupply phase of the real estate cycle features declining but still positive rent growth.

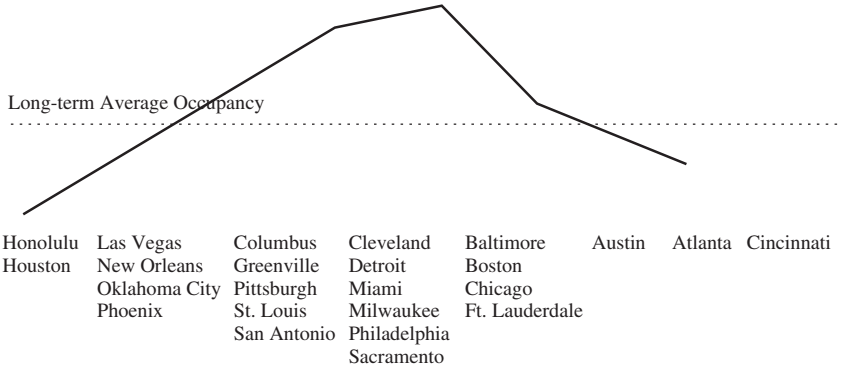

FIG. 1-4 Geographic occupancy cycle analysis.

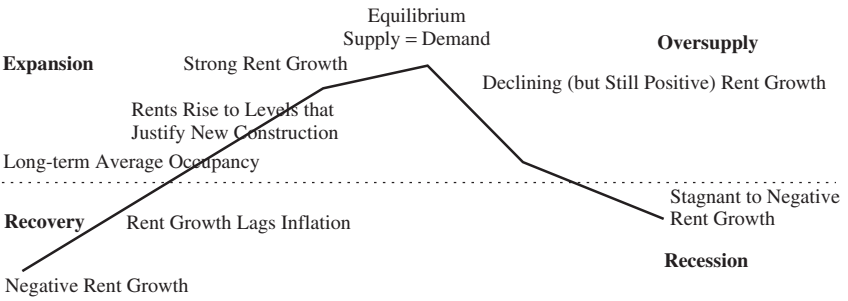

FIG. 1-5 Rental-growth rate cycle.

Although analysts attempt to define what the long-term average occupancy rate is for a given sector, the vagaries of the marketplace defy easy categorization, as illustrated by Figures 1-6 and 1-7. Figure 1-6 shows nationwide industrial vacancy (availability) rates ranging from 5.5% to more than 10.5% for the period 1981 to 2004, illustrating how difficult it is to determine a long-term average occupancy rate for a sector. Was the peak in vacancies that occurred during the recessionary years of the early 1990s an aberration to be discounted or part of a normally occurring cycle for which one must plan? What about the vacancy peak in 2002 to 2004? Is there a long-term upward trend in vacancy? Or are recent trends an aberration? And can a reversion to the long-term mean be forecasted? How can one tell the difference among random fluctuations, "normal" cycles, and long-term structural changes in the marketplace? No easy answers exist and opinions among intelligent professionals differ, which, in turn, is what creates markets.

Figure 1-7 shows the ten highest and lowest Central Business District (CBD) office rents for North America as of 2001. These numbers probably represent close

FIG. 1-6 Nationwide industrial vacancy (availability) rates, 1981–2004. (*Source*: Torto Wheaton Research, published online at www.tcasset.com.)

HIGHEST CENTRAL BUSINESS DISTRICT RENTS

CITY	RENTS PER SQ. FT.
1. San Francisco, CA	$69.00
2. Boston, MA	$60.00
3. Silicon Valley, CA	$54.00
4. Manhattan, NY	$49.51
5. Seattle, WA	$39.00
6. Washington, DC	$36.48
7. Toronto, ON (Canada)	$34.00
8. Chicago, IL	$32.10
9. W. Palm Beach, FL	$31.01
10. Sacramento, CA	$30.00

LOWEST CENTRAL BUSINESS DISTRICT RENTS

CITY	RENTS PER SQ. FT.
1. Edmonton, AB (Canada)	$12.00
2. Vancouver, BC (Canada)	$18.00
3. Philadelphia, PA	$18.08
4. Raleigh-Durham, NC	$18.75
5. Memphis, TN	$19.25
6. Nashville, TN	$19.50
7. St. Louis, MO	$20.00
8. Wilmington, DE	$20.00
9. Winston-Salem, NC	$20.00
10. Montreal, QC (Canada)	$20.05

FIG. 1-7 Highest and lowest central business district rents. (Copyright © 2001 by Institutional Real Estate Inc. All Rights Reserved.)

to the peak of CBD rents during the great Internet run-up of the stock market. Markets softened after the tech bubble burst, and it took roughly five years for the office market to completely recover, that is, for 2006 rents to approximate 2001 rents.

It is important to note that these numbers, like many numbers in real estate, are only approximations. Rent numbers are generally gathered from brokers who specialize in office leases, and since there is generally no legal requirement to