Forecasting the Space Market: Market: Real Estate Market Analysis

This presentation explores how to forecast rental trends in real estate markets. We'll examine the economic forces governing urban land values and how to predict rental growth - arguably the most crucial and difficult exercise for real estate investors.

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Understanding Market Analysis

Purpose

Quantitative or qualitative characterization of supply and demand in a specific space usage market.

Primary Goal

Forecast rent and price trends for investment decisions.

Property Types

Multi-family, office, retail, industrial, and specialty properties.

Scope

Typically conducted at metro level with 5-10 year horizon.

Micro vs. General Market Analysis

Micro-Level Analysis

Focuses on specific sites or users

- Feasibility analysis
- Site analysis
- Individual building assessment

General Market Analysis

Broader characterization of markets

- Quantifies supply and demand
- Forecasts rents and vacancies
- Examines market-wide trends

Defining Market Segments

Geographic Scope

Metropolitan level or narrower (quadrant, neighborhood)

Property Type

Office, retail, multi-family, industrial

Temporal Range

Historical analysis and future forecasts (5-10 years)

Quality Class

Class A, B, or C properties at different price points

Structural Approach to Rent Forecasting

Rent = f(Vacancy)

Vacancy and sublet space drives rent levels

Occupied Space = f(Rent, Demand)

Space usage relates to demand and rent

Construction = f(Rent, Vacancy)

Development responds to profitability signals where
Value exceeds cost to create new space or upgrade space.

Key Physical Variables

Construction

Addition of new supply to the stock of space available in the market.

Absorption

Amount of additional space occupied per year, indicating demand activity.

Vacancy Rate

Percentage of stock not currently occupied, reflecting supply-demand balance.

Market Rent

Rent level charged on typical new leases, the key economic indicator.

Understanding Absorption

Gross Absorption

Total amount of space for which leases were signed during a period.

- Measures transaction volume
- Includes internal market moves
- Relevant for brokerage services

Net Absorption

Net change in the amount of occupied space in the market.

- Better measure of true demand growth
- Comparable to net construction
- Indicates market direction

Natural Vacancy Rate

Search Time

Landlords and tenants need time to find optimal matches

Market Balance

Point at which no rent pressure exists in either direction

Market Indicator

Varies by market and changes over time

Zero vacancy indicates suboptimal behavior. Natural vacancy tends to be higher in faster-growing, more volatile markets with fewer constraints on development. It also varies by market and property type. I.e. Office is lumpy and has a higher vacancy rate while multifamily has a lower natural vacancy rate.

Rent-Vacancy Relationship for Los Angeles Office Market

When vacancy is below the natural rate, rents rise. When vacancy is above the natural rate, rents fall.
The rent cycle typically lags behind the vacancy cycle.

Rent-Vacancy Relationship for Boston Office Market

Market Dynamics: Boston vs. Los Angeles

Boston

CBD rents 60% higher than non-CBD

Average vacancy: 9%

Strong regulatory constraints

High physical constraints (34% undevelopable)

Los Angeles

Minimal CBD/non-CBD rent difference

Average vacancy: 11%

Moderate regulatory constraints

High physical constraints (53% undevelopable)

Months Supply Indicator

$$MonthsSupply = \frac{Vacancy + Construction}{NetAbsorption/12}$$

Interpretation

Months needed to absorb all vacant space at current absorption rate.

Decision Rule

Compare to typical construction time to assess market capacity.

Market Signal

If months supply exceeds construction time, market may be oversupplied.

Office Space Demand Drivers

Office Employment

FIRE industry jobs (Finance, Insurance, Real Real Estate)

Space Per Employee

Trending down pre-COVID, spiked after pandemic

Work From Home

Reduced office demand in many markets

Industry Base

Different industries have varying WFH potential

COVID-19 Impact on Office Markets

Initial Shutdown

Forced remote work, negative absorption

Technology Adoption

Zoom and remote work technologies accelerated

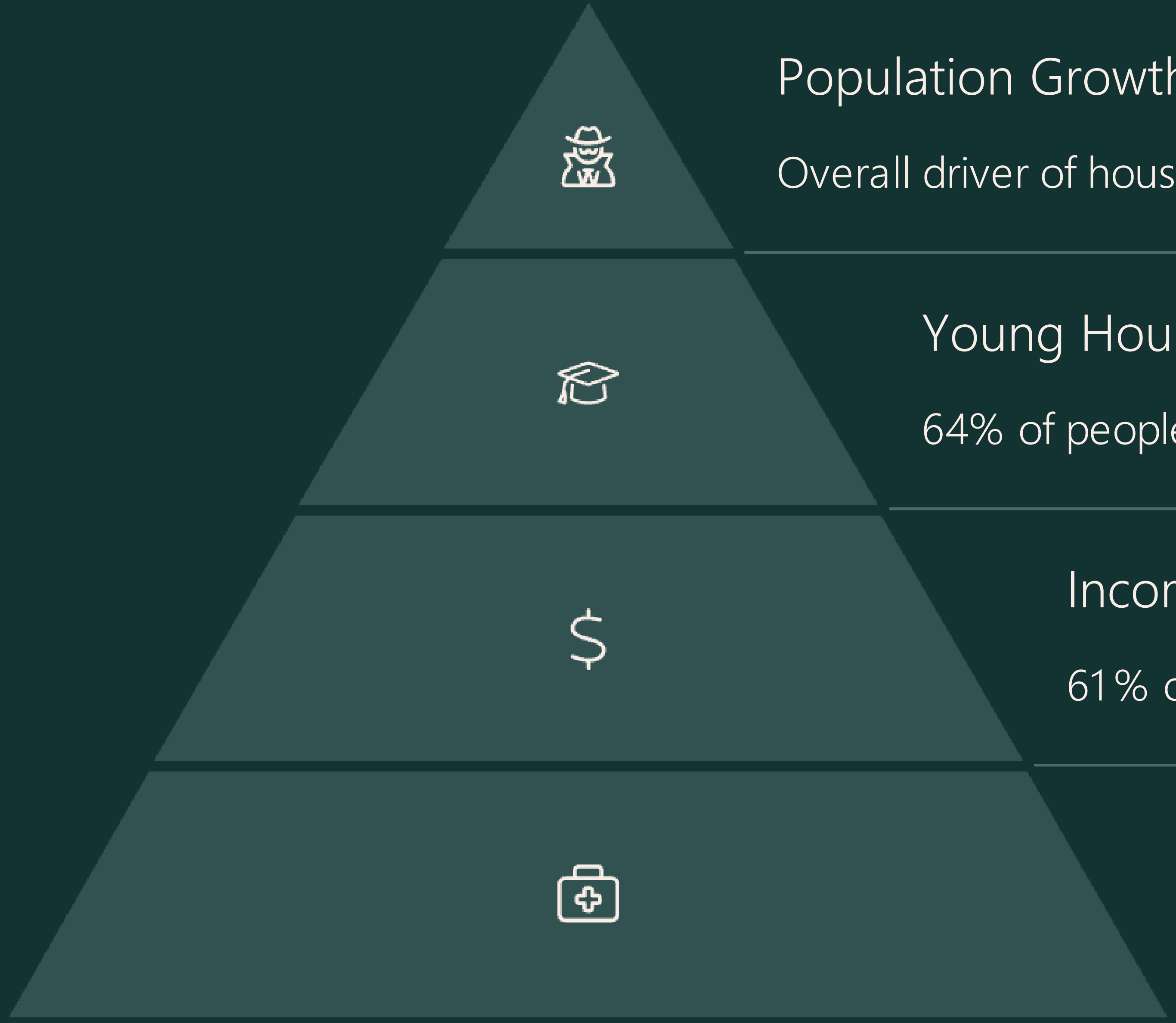
Vacancy Increase

Rates jumped from 7% to 12% in Boston

Hybrid Models

Partial return with reduced space per employee

Multi-Family Housing Demand



Population Growth

Overall driver of housing demand

Young Households

64% of people under 35 rent

Income Levels

61% of lower income quartile rent

Employment Growth

Especially blue-collar jobs

Note there is interaction with the homeowner market in that the less affordable is housing the greater the demand for MF rentals.

Warehouse Space Demand

Warehouse demand follows inventory needs, driven by e-commerce growth. Key indicators include employment in NAICS codes 48-49, truck tonnage, port volumes, and e-commerce sales.

Retail Space Challenges

1%	4%	16%
2000	2010	2024
E-commerce as percentage of total sales	E-commerce as percentage of total sales	E-commerce as percentage of total sales

Retail space demand is driven by retail sales and consumption, but e-commerce growth has reduced traditional space needs. Sales data must must be adjusted for online shopping trends.

Demand Drivers by Property Type

Property Type	Primary Drivers	Secondary Drivers
Office	FIRE Employment	Public Administration
Multi-Family	Population Growth	Young Population, Blue-collar Jobs
Retail	Retail Sales	Disposable Income, Employment
Warehouse	Inventory Needs	Transportation Employment
Single-Family	Population	Interest Rates, Employment

Real Estate Market Cycles

Rising Demand

Absorption exceeds construction, vacancy falls

Rising Rents

Low vacancy triggers rent increases

Oversupply

Construction exceeds absorption, vacancy rises

New Construction

High rents stimulate development

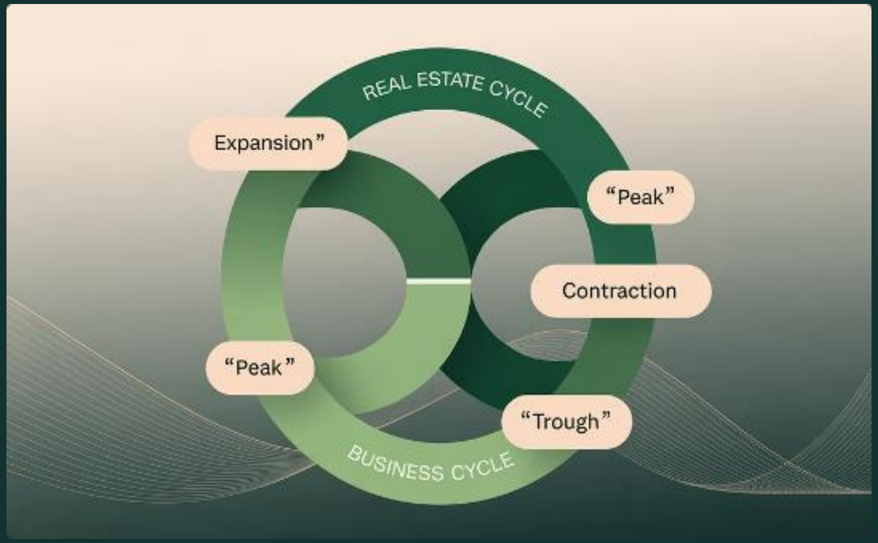
Cyclical Market Characteristics

Construction Volatility

Cycles are more exaggerated in construction than in rents or vacancy.

Leading Indicators

Vacancy cycle leads rent cycle slightly; vacancy peaks before rent bottoms.



Independent Cycles

Real estate cycles may differ from underlying business cycles.

Key Takeaways

Define Your Market

Specify geographic scope, property type, and temporal range for analysis.

Identify Demand Drivers

Focus on property-specific drivers like employment, population, or sales.

Track Key Indicators

Monitor construction, absorption, vacancy, and rent to understand market dynamics.

Anticipate Cycles

Understand that real estate markets are inherently cyclical with predictable patterns.