2024
U.S. Real Estate Market Outlook

Slowing Falling Interest Rates Should Boost Investment Activity
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Executive Summary

— There is an increased chance that the U.S. will avoid a recession and achieve a soft economic landing in 2024, but economic growth will slow and downside risks are elevated.

— Commercial real estate investment activity likely will begin to pick up in the second half of 2024.

— The normalization of hybrid working arrangements will continue to limit the growth of office demand.

— Retail real estate fundamentals are expected to remain strong due to the scarcity of new construction deliveries over the past decade.

— The industrial market is expected to remain healthy, with net absorption on par with 2023 levels.

— The biggest wave of new apartment supply in decades will temper rent growth and improve affordability for renters in 2024.

— The hotel industry will face headwinds to RevPAR growth in 2024, including competition from alternative lodging sources and a slower economy, but fewer Americans traveling internationally will benefit the domestic market.

— Demand for new data center development will attract more institutional investment in 2024, as investors reallocate capital from the office sector to real estate alternatives.
Chapter 2

Economy & Policy
Despite Certain Downside Risks, U.S. Will Avoid Recession

Despite easing inflation, the U.S. economy will face certain headwinds in early 2024, including relatively high interest rates, a strong dollar, near recessions in Europe and China and continued geopolitical conflicts.

Resilience will come from the U.S. consumer, so often the mainstay of the global economy. Consumer balance sheets are strong and wage growth will outstrip inflation for at least the first half of 2024. As a result, spending on services such as health, leisure and hospitality will provide vitality and

There is an increased chance that the U.S. will avoid a recession and achieve a soft landing in 2024. There will be an economic slowdown and downside risks will be elevated but the unemployment rate will rise to only around 4.5%, which won’t materially weaken real estate fundamentals except in the office sector.

Figure 1: U.S. Consumer Wealth Index

![Figure 1: U.S. Consumer Wealth Index](chart)

Note: The model assumes 50% stock and 50% home.
The inflation rate will start the year at around 4% but fall steadily to around 2.7% by year-end. A weaker global economy will keep commodity prices muted, while a return to pre-pandemic supply chain efficiency will buoy the auto industry and an increase in labor supply will temper wage growth to more sustainable levels. Core inflation could even surprise on the downside due to tight credit conditions and broader weakness in the global economy. Upside risks to headline inflation include geopolitical conflicts and oil production cuts. Construction cost growth that has been limiting new development will ease in 2024.
Fed Will Begin Lowering Rates

Despite the risk of higher headline inflation if oil prices rise in 2024, the U.S. Federal Reserve will mainly focus on core inflation, which excludes food and energy prices, and the broader risks from the global economy and the banking sector. The Fed will reduce short-term interest rates to around 4.25% by year-end 2024 and to 3.5% in 2025. This would be a much slower pace than during previous rate-reduction cycles due to the resilience of the U.S. economy. If the downside risks materialize, the Fed can lower rates more quickly due to the decline in inflation.

Gently falling interest rates amid generally solid real estate fundamentals will revive real estate capital markets activity above its currently very depressed levels. However, the federal deficit, which ended fiscal year 2023 at 7.5% of GDP, likely will not be reduced by much in 2024, keeping the 10-year Treasury yield high relative to the past decade, even as inflation eases.

Figure 3: Government Revenue (Deficit) as a Percent of GDP

Note: Data shows central and local government revenues less expenditures expressed as a share of GDP.
Figure 4: U.S. 10-Year Treasury Yield

Source: CBRE Research, October 2023.
Chapter 3

Capital Markets
We expect that commercial real estate investment activity will begin to pick up in the second half of 2024, although an uncertain macro environment and elevated interest rates will continue to weigh on investor and lender sentiment.

We also expect losses in the banking sector due to decreases in real estate values. Even though charge-offs will be spread out over the course of the next several years, some banks will fail and their appetite to lend to commercial real estate will remain muted throughout 2024. It will remain extremely difficult to finance office properties, particularly for non-Class A assets. Select multifamily, industrial and grocery-anchored retail assets can still be financed but asset quality and existing relationships with borrowers will be key considerations for lenders.

Notable amounts of equity capital remained on the sidelines at the end of 2023, particularly for value-add and opportunistic strategies. We expect that some of this capital will be deployed throughout 2024.
Further Cap Rate Increases Ahead

Real estate values for most property types are unlikely to fully stabilize until mid-2024. Cap rates, excluding those for office assets, increased by roughly 150 basis points (bps) between early 2022 and late 2023 depending on market and asset type. Office cap rates rose by at least 200 bps. This implies a 20% decline in values for most property types. We think cap rates will expand by another 25 to 50 bps in 2024, with a corresponding 5% to 15% decrease in values.

Figure 6: Historical & Forecast Cap Rates

Source: CBRE Econometric Advisors, Q3 2023
Conditions Ripe for Opportunistic Investment

Multifamily and industrial assets will be most favored by investors in 2024. Both property types have relatively strong fundamentals (demand, vacancy, rent growth, etc.) and long-term tailwinds that bolster their attractiveness. Retail fundamentals also look strong, although the sector will inevitably suffer from a slowing economy. The higher-for-longer outlook for interest rates will cause some owners of Class B and C office assets to sell due to further erosion in values.

There will be notable opportunities in 2024 for all-cash buyers such as sovereign wealth funds and endowments, as the higher cost of debt capital will reduce competition for prime assets. A large amount of capital has been raised in the private credit market for opportunistic investments, as traditional sources of credit—particularly banks—pull back. We expect that the lowest pricing for assets will be during the first half of the year.
Decline in Investment Activity to Moderate

Total investment volume is expected to decrease by only 5% year-over-year in 2024, stabilizing after a 45% drop in 2023. Lower levels of investment activity are directly tied to expectations that the 10-year Treasury yield will remain elevated throughout the year. This will lead to some distress for Class B and C office buildings and for certain assets that were highly leveraged using floating-rate debt amid ultra-low rates.

However, CBRE Research forecasts an average 10-year Treasury yield of 3.3% from 2025 to 2028, which will support investment activity and asset prices over the medium term.
Trends to Watch

— Cap rates will continue to rise through midyear and stabilize thereafter, marking a trough in asset pricing.

— Industrial and multifamily assets will likely remain most favored by investors due to relatively strong fundamentals.

— We expect notable debt funding gaps for some office and multifamily assets.

— Restricted bank lending will create opportunities for debt funds and other non-bank lenders able to take advantage of high interest rates and more attractive valuations of assets throughout 2024.
Chapter 4

Office/Occupier
Demand for Prime Space Will Remain Strong

An economic slowdown in the first half of the year and the normalization of hybrid working arrangements will continue to limit office demand in 2024. CBRE forecasts that the overall office vacancy rate will peak at 19.8% by year-end as below-average leasing activity persists and new construction deliveries continue to come to market, albeit at a slower pace.

More than half of the respondents to CBRE’s 2023 U.S. Office Occupier Sentiment Survey said they plan to further reduce their office space in 2024. The flight-to-quality trend of recent years will continue to support demand for newer, prime office product with the best amenities.

Since 2017, absorption in newer post-2010 assets has been positive and we expect this will continue in 2024. For pre-2010 buildings, absorption has been negative for the past four quarters. Quarterly demand for post-2010 buildings is expected to begin outpacing new supply added to the market by Q4 2024. A recent increase in tenants that are actively looking for space across major markets suggests that leasing activity will rise by 5% in 2024 but will remain between 20% and 25% below pre-pandemic levels.

Figure 8: Historical & Forecast Office Net Absorption, Completions & Vacancy

Source: CBRE Econometric Advisors, Q3 2023.
High interest rates and limited demand, along with record-high vacancy, will deter developers from breaking ground in 2024. The 36.1 million sq. ft. in total construction completions expected in 2024 would be the lowest annual amount since 2014. CBRE forecasts that average prime office asking rent will increase by as much as 3%, a slower rate than in recent years. However, the shrinking supply pipeline is expected to improve office fundamentals and reduce supply-side risk to vacancy.

Nearly 40% of respondents to CBRE’s 2023 U.S. Office Occupier Sentiment Survey think office utilization will increase marginally in 2024, while 60% said they have already reached a steady state of office attendance. This suggests that more occupiers will be comfortable making long-term leasing decisions, resulting in a modest improvement in leasing activity.

Small occupiers with requirements of less than 20,000 sq. ft. made up 60% of leasing volume by count through Q3 2023 and will continue to account for the bulk of leasing activity. Smaller space requirements will boost the flexible office market, with more landlords offering flexible space options, such as pre-built spec suites, directly to tenants rather than through third-party operators.

Tenant-favorable market conditions will persist in 2024, as the margin between asking and taking rents reached a post-pandemic-era high in 2023. However, the spread is expected to narrow slightly in 2024, as asking rents are forecast to drop by 3.4% from their Q3 2023 average. Concessions in the form of free rent and tenant improvement allowances are expected to moderate in 2024 as asking rents decrease.
Office location, quality, flexibility and amenities will be more important than ever to attract occupiers. While economic headwinds and the prevalence of hybrid working will play a major role in occupiers’ decisions in 2024, those that do lease space will flock to submarkets with an abundance of walkable amenities that help attract and retain the best talent.

Hard-hit gateway markets, such as Manhattan, Los Angeles and Chicago, may recover at a faster pace than previous years and see increased demand in certain submarkets with a higher percentage of prime office space and amenities. CBRE surveys show that public transportation access is the most important building amenity for occupiers. To increase office attendance, companies will need to offer employees top-notch amenities both in and around the workplace, boosting demand in the most desirable and accessible submarkets.
More Office Conversions Expected

Many older buildings that lack modern amenities will struggle to attract tenants in 2024, so a higher percentage of them likely will undergo conversion to other uses. As of Q3 2023, approximately 8% of total U.S. office supply by square footage was less than 50% occupied. Even though vacancy is forecast to grow another 160 bps in 2024, we do not expect this statistic to materially change.

The federal government is supporting office-to-residential conversion projects through a program of grants, low-interest loans and tax incentives. While many conversion projects can be challenging from a cost and technical standpoint, a proliferation of local and federal government incentive programs will aid lenders in mitigating any risk.

Figure 9: Historical & Forecast Office Net Absorption, Completions & Vacancy

Source: CBRE Econometric Advisors, Q3 2023
Markets to Watch

Nashville
The market has seen five consecutive quarters of positive net absorption through Q3 2023, which has bolstered rent growth. Office employment grew by 4.2% in 2023, well above the 1.2% national average. Demand for newly delivered prime office space is expected to remain strong.

Miami
Average asking rent increased by 6.0% year-over-year in Q3 2023—one of the highest rates in the country. A wave of new-to-market tenants led to positive rolling-four-quarter net absorption through Q3 2023 and a 1.8-percentage-point drop in the vacancy rate. For these reasons, Miami’s office market is expected to remain healthy in 2024.

Las Vegas
The 4.5% year-over-year growth in office-using employment in Q3 2023 was fueled by an influx of companies that have either relocated or expanded due to the business friendly and favorable tax environment. Las Vegas recorded positive rolling four-quarter net absorption through Q3 2023. With a recent uptick in leasing activity and strong preleasing at planned speculative projects, the Las Vegas office market is poised for further growth in 2024.
Chapter 5

Retail
Retail Fundamentals to Remain Strong

Retail real estate fundamentals are expected to remain strong in 2024 due to the long-running dearth of new construction deliveries over the past several years. The retail availability rate is expected to fall by 20 basis points and end the year at 4.6%. Asking rent growth will dip below 2% for the first three quarters of 2024 but rise above 2% in Q4. Demand for open-air suburban retail centers will increase at a faster pace than other retail formats, as traditionally mall-based retailers explore new formats for expansion.

High costs in 2023 discouraged construction starts and will ensure the scarcity of new development deliveries in 2024. Quoted construction costs currently range from $300 per sq. ft. for a junior anchor box to $500 per sq. ft. for a multi-tenant pad site. Only a few markets can demand asking rents that are high enough to justify the new construction. CBRE’s Cost Consultancy Group reports that retail construction costs rose by 6.5% in 2023 and are expected to increase further in 2024, albeit at a slower rate. Only a few markets can command asking rents that are high enough to justify new construction.

Source: MSCI Real Assets, CBRE Econometric Advisors, Q3 2023.
Consumer Spending Will Moderate

Consumers will face certain headwinds in 2024, including a lack of affordable housing, high interest rates and the resumption of student-loan payments. The National Association of Realtors Home Affordability Index fell to a 29-month low in August 2023, while the Federal Reserve Bank of New York estimates almost $1.6 trillion of outstanding student-loan debt. This likely will curb discretionary consumer spending in coming years.

CBRE Research forecasts that retail sales growth will moderate to around 2.6% in 2024. Asking rent growth is expected to decrease in early 2024 but rebound in the second half of the year.

Figure 11: Retail Sales & Asking Rent Growth

Source: CBRE Econometrics Advisors, CBRE Research, Q3 2023.
Net absorption of retail space is expected to fall to 28 million sq. ft. in 2024 from 35 million sq. ft. in 2023. Nevertheless, the retail availability rate is expected to reach a record-low 4.6% due to a lack of new supply. Only 14 million sq. ft. of new multi-tenant retail space is scheduled for delivery in 2024—half the amount of projected demand.

Not all retail formats will prosper in 2024. Retailers that have traditionally been mall-based have been closing underperforming stores and are now looking to smaller-format open-air suburban centers for expansion. Neighborhood, community & strip centers will maintain stable occupancy throughout 2024, but availability rates for mall & lifestyle centers will rise by nearly a full percentage point.

Source: CBRE Econometrics Advisors, CBRE Research, Q3 2023.
Luxury Brands Look Farther Afield

Luxury brands that once focused only on space in high-street districts such as Beverly Hills’ Rodeo Drive, New York’s Fifth Avenue and Miami’s Design District are taking fresh looks at resort markets like Las Vegas, Honolulu, Charleston and West Palm Beach. With a slowing Chinese economy, expansion-minded luxury retailers will return to the U.S. for expansion. Texas markets like Dallas and Houston that have long been underserved by high-end brands will see new interest.

Demand for open-air suburban retail centers will increase at a faster pace than other retail formats, as traditionally mall-based retailers explore new formats for expansion.
Markets to Watch

**Orlando**
Year-to-date through Q3 2023, Orlando led all U.S. markets with over 2 million sq. ft. of net absorption, lowering its retail availability rate to just 3.5%.

**Charlotte**
The city continues to attract new retailers and restaurants, although its 3.2% availability rate will make finding space a challenge in 2024.

**Denver**
Like Charlotte, Denver is attracting new restaurant concepts due to a strong local economy and food & beverage industry.

**San Francisco**
Despite a hobbled downtown market, Greater San Francisco, which includes Marin and San Mateo counties, is projected to have one of the largest drops in overall retail availability in 2024 due to continued tech job growth.

**Orange County, CA**
Strong demographics continue to attract major retailers, which has the market on pace to record its second-highest level of annual rent growth in 2024.
Chapter 6

Industrial & Logistics
The U.S. industrial market is expected to stabilize in 2024, with net absorption on par with 2023 levels and taking rent growth moderating to 8%. Construction deliveries will taper off by midyear and finish at half of 2023’s total. New deliveries in the early part of the year will cause the overall vacancy rate to rise to around the 10-year average of 5.0% before falling slightly in the second half of the year. New development will remain low for the foreseeable future due to tight lending conditions, economic uncertainty and an oversupply of large warehouse and distribution facilities in certain markets.

Annual leasing activity should remain around 750 million sq. ft. for the next several years at least. Lease renewals will dominate total activity in the first half of 2024, but new leasing may increase in the second half of the year if economic growth improves. Three demand drivers will affect occupier decision-making: supply chain resiliency, e-commerce growth and population growth.

![Figure 13: Industrial Construction Starts](image-url)

Source: CBRE Research, Q3 2023.

**Slowdown Ahead for Industrial Supply Growth**
Focus on Supply Chains & Energy Savings

Occupiers are focused on strengthening their supply chains by adding more import locations, onshoring or nearshoring more manufacturing operations and adequately staffing their distribution centers. Look for companies to explore alternative seaport and airport markets to hold more inventory. Strong demand for manufacturing and distribution facilities will be sustained by a projected 7.5% increase in U.S. industrial production over the next five years, according to Oxford Economics. Well-trained, affordable and available labor will remain an important factor in site selection. Markets with labor pools that meet these criteria include Memphis, the PA I-78/81 Corridor, Indianapolis, Louisville, the Inland Empire and Savannah.

E-commerce will continue its slow steady growth over the next decade, leading retailers and their suppliers to add more warehouse and distribution space. This will be particularly prevalent in the U.S. South, with many growing population centers.

Figure 14: Historical & Forecast E-Commerce as a Percent of Total Retail Sales

Source: CBRE Research, Q3 2023.
With pandemic-driven demand waning, occupiers will focus more on energy savings for their facilities. Requirements for sustainable energy sources like solar and wind will grow in 2024. Commercial use of solar panels, for example, is expected to grow by 13% in 2024, according to the Solar Energy Industries Association.

Use of sustainable construction materials and installation of electric truck charging stations will also gain footing. Investment in automation and artificial intelligence for both order picking and inventory control will grow. First-generation space that has these amenities will be in high demand. Markets that have reliable power sources and offer incentives for environmentally friendly power options will be particularly favored by occupiers in 2024.
Central Texas
Austin and San Antonio will continue to merge into one large industrial market, with robust logistics advantages, a growing population and a burgeoning manufacturing sector.

Nashville
A growing population, strong labor pool, pro-business government and solid logistics capabilities will drive demand in 2024.

Salt Lake City
The Mountain West is expected to overtake the Southwest as the top western region for population growth, further solidifying Salt Lake City as the region’s primary distribution hub.

Louisville
Louisville’s central location, strong manufacturing base and pro-business environment will make it one of the top emerging markets.

Central Florida
This region checks all the boxes for occupiers, with strong population growth, excellent logistics drivers and one of the most attractive labor markets in the country.
Slight Apartment Oversupply Expected in 2024

The biggest wave of new apartment supply in decades will temper rent growth and improve affordability for renters in 2024. With delivery of 440,000 new units expected in 2024 and more than 900,000 currently under construction, the overall vacancy rate is expected to rise and rent growth to decelerate.

Of the 69 markets tracked by CBRE, 17 are poised to grow their inventories by more than 7% in 2024 and 2025. Construction completions have already peaked in several markets, including Chicago, Washington, D.C. and Las Vegas. Completions will peak in most other markets in 2024. We expect weaker average rent growth of 1.2% in 2024. Supply headwinds limited recent record rent growth to just 0.7% year-over-year in Q3 2023.

Despite near-term economic weakness and vacancy rates that will rise further above their pre-pandemic averages in 2024, enough demand should keep the average occupancy rate above 94%. Developers have correctly anticipated where demand will best support new supply based on job growth figures. Markets with the largest supply pipelines (e.g., Austin, Dallas, Nashville and Atlanta) have the highest job growth projections.

Figure 15: Forecast Multifamily Vacancy Rates vs. Pre-Pandemic Averages

Source: CBRE Research, CBRE Econometric Advisors, Q3 2023.
Multifamily real estate is playing a more important role in alleviating a severe shortage (at least 3.1 million) of single-family homes that is contributing to homeownership challenges, particularly in a high-interest-rate environment. The premium for an average monthly mortgage payment of a newly purchased home vs. average monthly rent is expected to remain above 35% in 2024 versus 52% in 2023.

Multifamily construction starts are down substantially in response to overall weakening fundamentals and the rapid increase in interest rates. We expect starts will fall by 45% in 2024 from their pre-pandemic average and by 70% from their 2022 peak. This decline in starts means that new deliveries will be reduced to less than half the current level by 2026, paving the way for a strong recovery in both occupancy and rent growth.

In the near-term, rent growth and occupancy will remain strongest in the Midwest and Northeast regions, as well as the mature urban hubs of New York, Boston, Chicago and Washington, D.C. Many of these markets had more modest rent growth in 2021 than those in the Sun Belt and Mountain regions and have less supply pressure. Although many markets in the Mountain and Sun Belt regions are expected to continue having negative rent growth through mid-2024, this should bolster rental demand by attracting in-migration.

Many of the markets struggling with imbalanced supply and demand are expected to outperform in the long-term. Local and regional economic drivers will continue to favor large secondary markets across the Sun Belt, as well as most large coastal markets.

![Figure 16: Historical & Forecast Multifamily Construction Starts](source: CBRE Research, Q3 2023)
Softer fundamentals and higher borrowing costs have negatively affected property values and created significant buying opportunities for investors. With investment activity expected to remain muted in 2024, investors have an opportunity to consider their longer-term investment strategy. A typical five-to-seven-year hold period implies they could market these assets to a buyer with a similar investment horizon.

The Midwest and Northeast regions offer the best opportunity for positive leverage in 2024. With cap rates typically 25 to 50 basis points higher than elsewhere and with stronger rent growth expected next year, buyers in these two regions can more easily underwrite to positive leverage. Cap rates are nearing their peak, so the window for favorable pricing opportunities won’t last long.

Local regulatory environments (e.g., rent control policies) and other factors like climate risks, public safety and infrastructure are becoming more important considerations for multifamily investors. Market selection and underwriting are becoming more complicated. The recent increase in both cost and availability of real estate insurance for some coastal states highlights the growing importance of these long-term factors for buyers, sellers and lenders.
Markets to Watch

**Midwest/Northeast**
Supply-and-demand dynamics across the Midwest and Northeast are expected to remain balanced in 2024. This will support rent growth throughout the year, while many markets facing supply pressures will have several quarters of negative rent growth.

**San Diego**
Supply growth remains muted, averaging only 3.1% over the past two years and forecast at just 2.4% in 2024. Strong demand-side fundamentals like high-quality and durable life sciences jobs will help San Diego outperform the overall market next year.

**Boston**
Market fundamentals are buoyed by the growing tech and life sciences sectors, as well as a limited construction pipeline. Balanced fundamentals will support rent growth throughout 2024.

**New York City**
The post-pandemic resurgence of New York’s multifamily market is expected to continue in 2024. With one of the lowest overall vacancy rates in the country, it’s clear developers have struggled to keep pace with renter demand as the city continues to add jobs and residents.

**Dallas**
Even as the pace of new supply lowers rent growth, Dallas has remained the biggest multifamily investment market over the past several years. Additionally, it is the largest market with the lowest average prime multifamily cap rate. These trends are expected to continue, making Dallas the most liquid market for multifamily property investment in 2024.
Chapter 8
Hotels
Headwinds Persist in 2024

The U.S. hotel industry will face many headwinds to RevPAR growth in 2024, including competition from alternative lodging sources (short-term rentals, glamping, cruise lines, casinos, etc.), an economic slowdown, less consumer spending and military conflicts in Europe and the Middle East. On the other hand, the industry could potentially benefit from roughly 4.7 million more overseas visitors if international travel returns to 2019 levels. This influx could eventually boost the overall occupancy rate by 1.2% to a record level.

Given the prevailing headwinds, CBRE expects RevPAR growth of just 3.0% in 2024, supported by a 40-basis-point increase in occupancy and a 2.3% increase in ADR. Urban hotels are expected to outperform in 2024, while airport hotels will benefit from the increase in inbound international travelers. Resort properties, which were a bright spot during the pandemic and benefited from outbound international travel constraints, are expected to see the slowest growth.

Figure 17: 2024 RevPAR Growth by Location Type

Source: Kalibri Labs, CBRE Hotels Research, Q3 2023.
Upper-Midscale Chain Hotels Will Fare Better

On average during economic downturns, RevPAR falls less and recovers more quickly in the upper-midscale chain scale than in other chain scales as guests trade down. We expect this will be the case in 2024 as the U.S. experiences an economic slowdown.

With a forecast of 3.0% overall RevPAR growth in 2024, we expect that margins, profits and cash flows will fall due to wage inflation, higher food & beverage and non-operating costs, increased renovation costs and high interest rates.
Investment Activity Will Remain Muted

Hotel cap rates averaged 8.0% in Q3 2023, while the average hotel CMBS loan carried an 8.4% interest rate. This spread between hotel cap rates and borrowing costs is narrower than other real estate classes, making hotel assets relatively attractive. Nonetheless, heightened risks to RevPAR growth, an expected decline in profits, deferred capex and higher cost of capital will result in less hotel investment activity. We expect trophy assets, newer select-service assets in markets with modest supply growth and hotels focused on group travel in markets with a solid mix of business and leisure demand will be the most attractive for investors.

With a forecast of 3.0% overall RevPAR growth in 2024, we expect that margins, profits and cash flows will fall due to wage inflation, higher food & beverage and non-operating costs, increased renovation costs and high interest rates.

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Source: CBRE Hotels Research, Q3 2023.
*Based on 2023 Investment Performance.
Markets to Watch

**Los Angeles**
The local hotel industry should see a boost from more Asian visitors and an end to the strike by entertainment workers.

**San Diego**
Group travel to the city is expected to improve due to resurgent convention business and the 17% increase in government per diems in 2024.

**Boston**
Hotels should benefit from strong university demand, special events and more group and business travel.

**New York**
More in-bound international travelers and greater restrictions on short-term rentals should benefit the hotel market.

**Washington, D.C.**
The city should experience more group travel, as well as an increase in overseas visitors.
Chapter 9
Data Centers
Advanced Technology to Fuel Increased Data Center Demand

The data center industry is undergoing significant transformation that is making it an attractive investment opportunity. Historically, data centers were predominately utilized for hard drive storage, computing and network connectivity. While these traditional uses remain, data centers now incorporate new applications like artificial intelligence and machine learning, high-performance computing for genome sequencing or high-frequency trading, as well as other more efficient cloud-based solutions.

From an energy-use perspective, new and innovative ways to power and cool data centers are under development, from alternatives to water-using glycol to using excess heat for greenhouses adjacent to data center facilities.
Pricing Continues to Rise

Data center pricing continues to rise due to limited supply and strong demand. Following a projected 16% year-over-year increase in pricing for 250-to-500-kW requirements in 2023, we expect another 10% to 15% pricing increase in 2024. This is due to supply constraints and continued strong demand across all markets. Operators may be willing to lower lease pricing for legacy assets with vacancy, but this discount will not apply to artificial intelligence workloads that require high power density.

Figure 19: Average Asking Rental Rate with Y-o-Y % Change for Primary Markets

Source: CBRE Research, CBRE Data Center Solutions, 2023.

**Rental rates are quoted asking rates for 250 - 500 kW at N+1/Tier III requirements.**
New Development Needed

Demand for new data center development likely will attract more institutional investment in 2024, as investors are under-allocated to digital infrastructure by 1.5% to 3% compared with other asset classes. Power supply in primary markets increased by 19.2% year-over-year in H1-2023, leading to a 25% increase in new data center construction activity. We expect construction activity in primary markets to surpass 3,000 MW in 2024.

Construction completion timelines have been extended by 24 to 72 months due to power supply delays. We believe that Austin-San Antonio and Omaha will continue to see significant interest from investors and developers due to land availability, power infrastructure development and tax incentives.

Figure 20: Under-Construction Capacity in Primary Markets

Source: CBRE Research, CBRE Data Center Solutions, 2023.
More Network Capacity Needed

As AI becomes more prevalent, there will be an increased need for high-bandwidth network connections to facilitate higher data transfer rates. Large Language Models (LLMs) used in generative AI will require significantly more network bandwidth than currently exists. Major cloud-service providers are becoming more interested in less-expensive rural areas to provide their clients with AI training solutions, although many of these sites require new fiber connectivity.

Edge data centers will also play an important role in 2024 due to edge computing reducing latency and enabling AI systems to process data closer to end-users or applications. Smart homes and cities, streaming services, facial recognition technology and autonomous vehicles all benefit from edge data centers because they require low latency to process and react to sensor data in real time.

Additional Power Supply Needed

Increased power supply will remain a big need for the data center industry in 2024. As data center owners and operators adopt more renewable and sustainable energy strategies, increased power transmission and distribution infrastructure will be required.

Congestion, interconnection and build-out issues currently are limiting much-needed new data center development. Congestion on the grid has caused electricity costs to fluctuate wildly in times of high demand. Energy storage solutions can help alleviate this problem. Regarding interconnection issues, the approval process for wind, solar, storage and hydro-renewable projects now takes more than four years on average, with project costs more than doubling since 2020. In addition to delays, renewable energy developers are being asked to contribute capital for the buildout of high-voltage power lines and substations to get their projects on the grid.

Expedited planning, permitting and financing of transmission and distribution would allow for more renewable power to fuel new data center development. Today, there is more renewable capacity in interconnection queues than current generation capacity online.
Markets to Watch

Northern Virginia
This will remain the top market in North America for new supply.

Dallas-Ft. Worth
Transmission infrastructure upgrades will provide advantageous conditions for data center development.

Atlanta
Low cost of power and ample land availability will attract new development.

Chicago
Hyperscale interest and excellent connectivity provide benefits for continued development.

Omaha
The local power district plans to increase generation to meet surging demand.

Austin-San Antonio
Local government incentives are fueling tremendous growth in Central Texas.

Charlotte
Benefiting from Duke Energy’s power availability and transmission infrastructure, Charlotte is poised for growth in 2024.

Denver
The market is increasing its data center inventory at an impressive rate.