Commercial Real Estate Development FALL 2017

Development®

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50 years NAIOP

COMMERCIAL REAL ESTATE DEVELOPMENT ASSOCIATION

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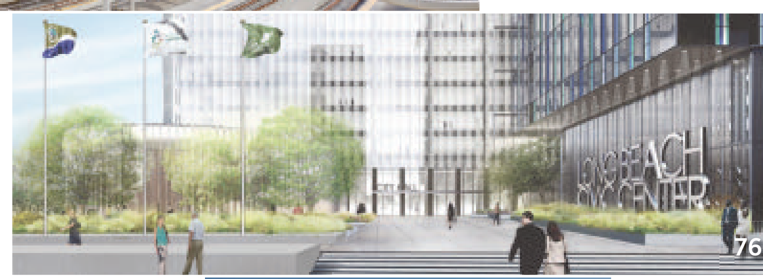

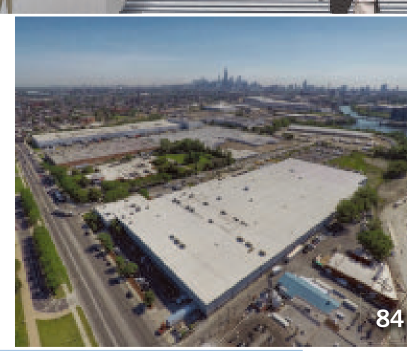

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COLUMNS

Developer of the Year Trammell Crow Company senior executives (from left to right): Craig Cheney (chief investment officer), Michael Duffy (chief operating officer), Adam Saphier (president, Central Operations and Capital Markets), Chris Roth (president, Eastern Operations), John Stirek (president, Western Operations) and Matt Khourie (CEO).
Photo by Jenifer McNeil Baker

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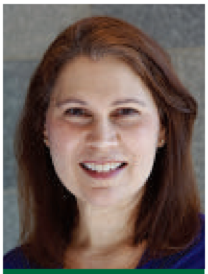
A Note From the Editor

Fall Focus

MID-YEAR 2017 market and economic data came in at or above expected levels, suggesting that the current, very long cycle still has room to run. Against that backdrop, this issue of Development magazine features diverse topics that include public-private partnerships, placemaking, affordable housing, electric buses and small-scale farming on commercial properties, illustrating some of the innovations that are emerging during this slow-and-steady cycle.



Margarita Foster

In order to make it easier for you to quickly review each issue of Development magazine, we've changed the format of this page to summarize many of the articles. Look here for key takeaways from each piece, then go deeper by reading the articles of interest to you, or pass the magazine on to a colleague.

Enjoy the issue,
Margarita Foster
Editor-in-Chief

NAIOP's 2017 Developer of the Year Trammell Crow Company has grown over the past 70 years from a series of partnerships in Dallas to a national, independently operated subsidiary of CBRE, with $5.9 billion worth of projects currently under construction (page 66).

Public-private partnerships are in the spotlight as an emerging mechanism to fund the development of public facilities like courthouses, libraries, government offices and more, in projects that also include private commercial development (page 76).

Once an obsolete warehouse, 2801 S. Western Ave. in Chicago has been redeveloped as a modern distribution facility that meets the needs of today's e-commerce retailers and food distributors (page 84).

The Summit at Fritz Farm's developer is creating an authentic mixed-use destination that reflects Lexington's culture of thoroughbred horse farms and rolling Kentucky bluegrass landscapes by engaging local designers, chefs and artists (page 88).

The amount of office space per employee, which has been declining steadily since 2010, currently sits at about 180 square feet (page10).

A mall near Salt Lake City, Utah, is embracing digital technology and using it to transform a traditional retail center into a vibrant community hub (page 12).

To tackle its affordable housing shortage, San Francisco now allows property owners to develop accessory dwelling units in previously underused parts of existing multifamily buildings such as utility and laundry rooms (page 14).

Hotels, retailers, shopping centers and even hospitals are using scent to build their brand, enhance the user experience and improve their bottom line (page 18).

In the future, office space may be operated "on demand," transforming property owners from rent collectors to service providers (page 22).

The master plan is a valuable tool for evaluating alternative sites as well as for selecting the most appropriate use for a given site (page 28).

Many developers and owners are unaware that selling even a portion of a real estate project in a tenancy in common (TIC) or joint venture (JV) structure may trigger securities compliance (page 30).

Most Popular From Summer 2017

1) **The Future of Family-owned CRE Businesses** (naiop.org/familybusiness, page 86).
2) **How to Attract Institutional Capital** (naiop.org/institutionalcapital, page 30).
3) **Colliers International's Advisor Development Program** (naiop.org/employeedevelopment, page 54).
4) **Beyond 72 Degrees and Sunny: Optimizing the Indoor Work Environment** (naiop.org/indoorwork, page 78).
5) **Innovative Financing for Roads and Highways** (naiop.org/financingroads, page 70).

Future NAIOP Events

- CRE.Converge 2017, Oct. 10-12, Chicago
- CRE.Insights: The Office Evolution 2017, Nov. 9-10, Brooklyn, New York
- Chapter Leadership and Legislative Retreat 2018, Feb. 5-7, Washington, D.C.
- National Forums Symposium 2018, May 1-3, New York
- I.CON 2018: Trends and Forecasts, June 7-8, Jersey City, New Jersey

Exclusivity provisions can give tenants the exclusive right to operate a particular type of business as well as prevent future tenants from using their space in certain ways. (page 42).

An urban farming company is replacing lawns on commercial properties with attractive farm plots and helping expedite development approvals (page 52).

Microsoft's high-tech indoor urban farming project provides employees and guests at its Seattle-area campus with thousands of pounds of lettuce and microgreens each year (page 56).

The first privately operated zero-emission battery-powered electric bus fleet now serves tenants at Aon Center and Prudential Plaza, two of Chicago's largest office properties (page 58).

Now that ride-hailing services like Uber and Lyft have become nearly ubiquitous, developers and property managers are increasingly using these services to boost the profile and profitability of their properties (page 60). ■

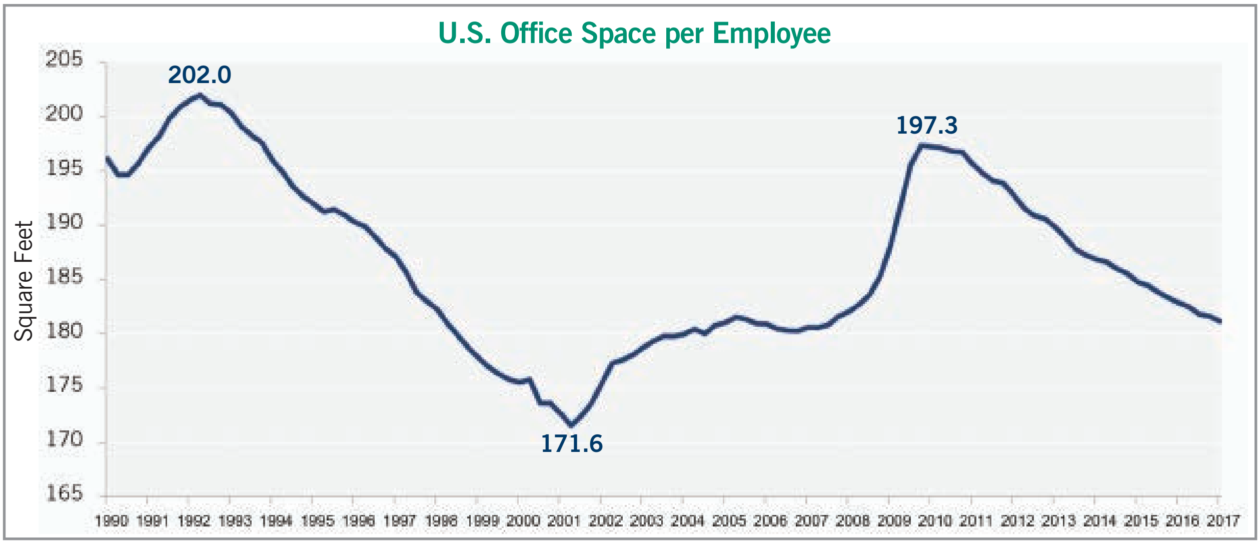
Trends in Square Feet per Office Employee: An Update

Is the push for office space efficiency a silent killer for the U.S. office market?

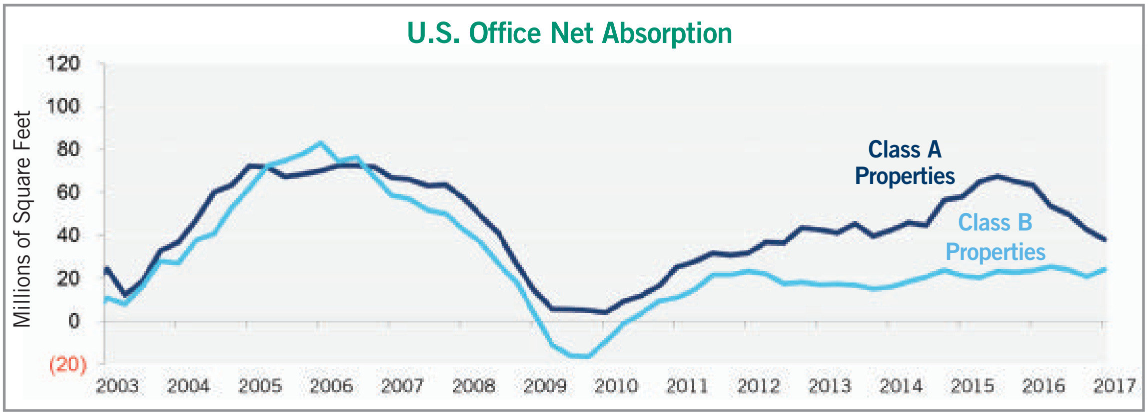
By Adrian Ponsen, CoStar Portfolio Strategy

THE SHIFT TOWARD online shopping has wreaked havoc on many traditional brick-and-mortar retail tenants, and by now, most landlords of all property types have had just about enough of fast-emerging trends that change how businesses utilize their real estate footprints. Yet one of the largest office users in the U.S., the federal government's General Services Administration, is in the midst of a major effort to use its office space more efficiently. Meanwhile, within the private sector, "creative" office environments — often accompanied by "benching" layouts, where multiple workers share a single large table — are becoming all the rage. Real estate investors are wondering whether the office sector is next in line for a painful shakeup, as tenants continue to use office space more efficiently.

The graph labeled "U.S. Office Space per Employee" plots the amount of occupied office space per office worker in the U.S. over time. Think of this as the level of spaciousness within the typical American office at any given time. Despite jumps that

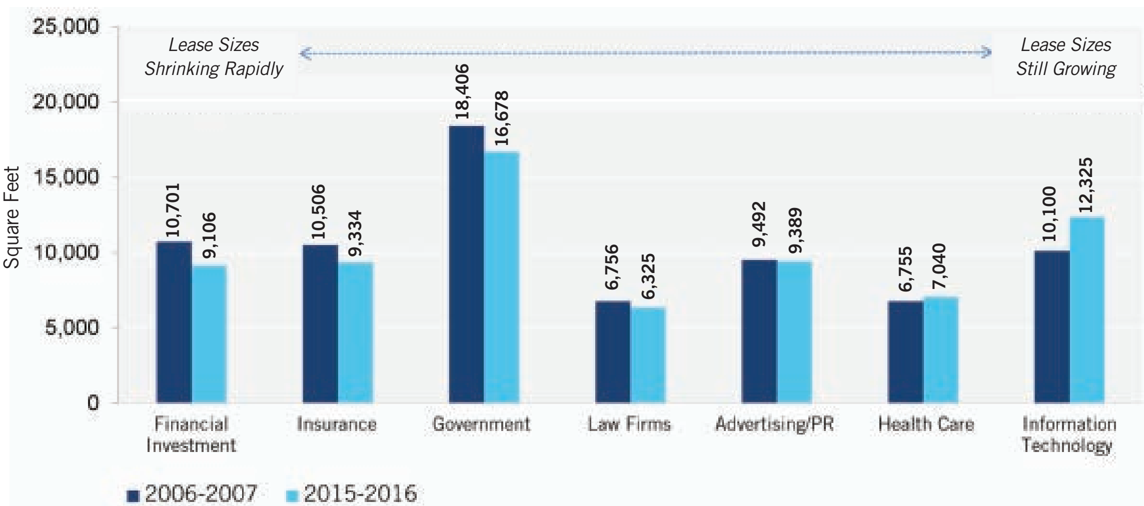


Source: CoStar Portfolio Strategy



Note: U.S. office net absorption is displayed as a trailing four-quarter total.
Source: CoStar Portfolio Strategy

Average Size of New Office Leases by Tenant Industry



Source: CoStar Portfolio Strategy

occur during recessions, when many companies cut staffing levels but retain their existing office leases, the long-term trend in square footage per worker is clearly down. Smaller computers, digitized libraries and the entrance of the so-called "sharing generation" into the workforce have all made it easier for companies to fit more workers into less space. Landlords are understandably leery of this trend, since greater space efficiency means tenants will lease less office space overall.

The impact of tenants' push for greater space efficiency has created winners and losers within the office market. Fitting more employees into less space has definitely enabled office tenants to sign smaller leases. But the savings from signing smaller leases allow tenants to afford higher-end space. This is a particularly compelling tradeoff in the current market, as tenants are increasingly relying on amenity-rich office environments to help recruit the highly skilled workers who are now in short supply.

"Tenants in more rapidly growing sectors are … expanding their operations and leasing high-end, amenity-rich office space to help recruit talent."

Adrian Ponsen

The recent shift in leasing from Class B properties to higher-end Class A properties has been enormous. Whereas U.S. office absorption in the Class A and B office markets was nearly identical from 2004 to 2007, since the end of 2011, absorption in the Class A market has outpaced that in the larger Class B market by more than 145 million square feet, about the size of the entire Denver office market. Moreover, the spread between Class A and Class B office absorption reached a record high in 2015.

The speed at which tenants are adapting their floor plans to accommodate more workers also varies by industry. In general, tenants in more rapidly growing sectors are simply more focused on expanding their operations and leasing high-end, amenity-rich office space to help recruit scarce talent. Tenants within slower-growing, more revenue-challenged sectors are significantly more focused on economizing their office space use as a way of cutting costs. This trend is reflected in analysis of CoStar's database of more than 2 million U.S. office leases. (See the graph above.) While the average lease size has fallen since 2006/2007 for tenants in slower-growing sectors such as legal services and government, lease sizes have increased in more rapidly growing sectors such as health care and information technology. ■

By **Adrian Ponsen**, senior real estate economist, CoStar Portfolio Strategy

Reinventing the Mall Shopping Experience

A shopping center owner uses digital technology to transform a traditional retail center into a vibrant community hub.

By Najla Kayyem, Pacific Retail Capital Partners

WALK THROUGH The Shops at South Town near Salt Lake City, Utah, and you'll find toddlers, millennials and senior citizens taking a break from shopping at digital screens throughout the center. Young and old alike interact with the touch screens, enjoying games, live feeds and art, gathering together in open spaces that encourage connection and social interaction.

In 2015, property owner Pacific Retail Capital Partners decided to undertake a renovation project to encourage shoppers to spend more time and, consequently, more dollars, at The Shops at South Town. The company has used technology to turn a traditional retail center into a vibrant community hub. The 1.3 million-square-foot shopping center's multimillion-dollar renovation included a distinctive digital sensory experience — the first of its kind in the state — that has driven additional traffic to its restaurant and retail tenants.

In this ever-changing retail world, digital, mobile and physical shopping experiences need to work in sync. People's social lives now take place in both the physical and digital worlds. Building environments that use technology to embrace both of these worlds are the key to the future of shopping center experiences. Combining need-based offerings with interactive, customized, personalized and social experiences appeals to both sides of the customer coin.

Visitors to The Shops at South Town near Salt Lake City play a custom-designed emoji game created by Pacific Retail Capital Partners and Quince Imagining Inc. on one of the center's two new digital walls.
Deseret News and Scott G. Winterton

The Digital Experience

Highlights of the new digital sensory experience at The Shops at South Town include the following:

A ShareRails O2O (online-to-offline) software application that transforms center retailers' inventory data into digital content, which makes it possible for shoppers to find products for sale at the center in their online searches on Google and other search engines. This enables the center's brick-and-mortar retailers to compete with online giants.

Six digital directories feature touch screen technology, real-time deals from guests' favorite stores, social interaction, live streaming, beacon technology, selfie photo capabilities and mobile app functionality.

A 13-foot by six-foot, ultra-high resolution interactive play wall offers unique gaming options that include a custom-developed emoji game created by Pacific Retail and Quince Imaging Inc. with input from Generation Z, those born roughly between 1995 and 2014.

A massive multimedia wall displays movies, sporting events, livestreams, digital art and other entertainment options. The multimedia wall also displays, in near real time, answers to text inquiries received from shoppers.

The displays and seamless online to in-person shopping experience were an instant hit with guests. The technology blends seamlessly into the center's modern architecture and design, and is presented in ways that are intuitive to users, so customers aren't overwhelmed.

The shopping center's new interactive digital directories enable shoppers to get on-the-spot answers to their questions via a digital concierge system. The directories also display up-to-the-minute information on sales and other special deals.
Deseret News and Scott G. Winterton

Forecasting the Future

Skeptics may wonder if too much technology might detract from the ultimate goal of store sales. From a business perspective, research continues to indicate that time spent in a shopping center correlates directly with dollars spent. But there's another important component to this equation: retention. The more Pacific Retail can retain loyal patrons and encourage them to bring others, of all ages, to build memories with them, the more successful the center and its tenants will be. This, in turn, creates more value for the asset.

Future Projects

As The Shops at South Town moves into a second phase of redevelopment with the opening of additional digital entertainment options such as Round 1 Bowling & Amusement, the positive experience gained by offering customers exclusive, technologically savvy experiences proves that digital integration will continue to grow.

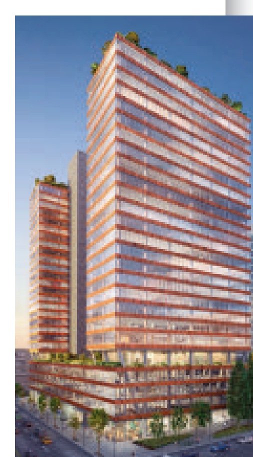
New & Noteworthy

1.9 million sq. ft.

Fenix Development has broken ground on the first phase of The Watermark|Tempe, a 1.9 million-square-foot project at the north bank of Tempe Town Lake in Tempe, Arizona. The project will be Tempe's first vertically integrated mixed-use development. The first phase will consist of two buildings containing 250,000 square feet of office space, 44,000 square feet of high-end restaurants and boutique retail space, and 360 luxury apartments. Future phases will include an additional 360,000-square-foot office tower, another 20,000 square feet of restaurant and retail space, and a 170-room hotel. The first phase is expected to deliver in fall 2018.

1.2 million sq. ft.

Tishman Speyer, with development partner Qatari Diar Real Estate Co., is constructing The Jacx, two 26-story office towers in Long Island City, New York, with a shared, 1-acre park atop a fifth-floor podium. Each tower will contain 570,000 rentable square feet of office space, with floor plans ranging from 20,000 to 90,000 square feet. The vertical office campus will also feature more than 40,000 square feet of retail space and restaurants, including a food hall; a 550-space garage with 24/7 valet service; and a 175-space bike parking area with showers. The development team is aiming for WiredScore Platinum and LEED Silver certification. Delivery is expected in the first quarter of 2018.



686,000 sq. ft.

Ridge, the industrial arm of Transwestern Development Co., has broken ground on Charleston Logistics Center, 686,000 square feet of speculative industrial space on a 63-acre site in Jedburg, South Carolina, approximately 30 miles northwest of Charleston. The center's two 343,000-square-foot rear-load buildings have been designed for multitenant use and each will feature a 32-foot clear height ceiling, 54-by-48-foot column spacing, a 60-foot staging bay, an ESFR sprinkler system, 64 dock doors, two drive-in doors, 202 car parking spaces and 76 truck parking spaces.

Utah was the test market for this innovative digital sensory experience. Pacific Retail will confidently launch similar digital enhancements at additional shopping centers across the nation, beginning with Eastridge Center in San Jose, California, at the end of 2017. The rebirth of brick-and-mortar retail will continue as developers, retailers and cities recognize the importance of creating timeless and enduring shopping experiences. People want to engage, feel a sense of community and be proud of their local shopping destinations.

Retailers also need to listen to their guests when it comes to deciphering which technological innovations are best for a particular shopping center. As a national developer, Pacific Retail Capital Partners plans to customize the technology offerings it chooses for other communities and markets.

Retail centers will likely continue to experience a hybrid approach to store design, footprint efficiency and online integration. Developers, property owners and retailers all must focus on making it easier for shoppers to buy through an omnichannel experience that integrates the entire search and purchase process, from smartphone to laptop to store — or any other combination — so that customers can leave a shopping center with the best-selling items, have other items shipped directly to their homes and/or easily return goods. This is the future of shopping. ■

By **Najla Kayyem**, senior vice president of marketing, Pacific Retail Capital Partners

Creating New Housing Units From Thin Air

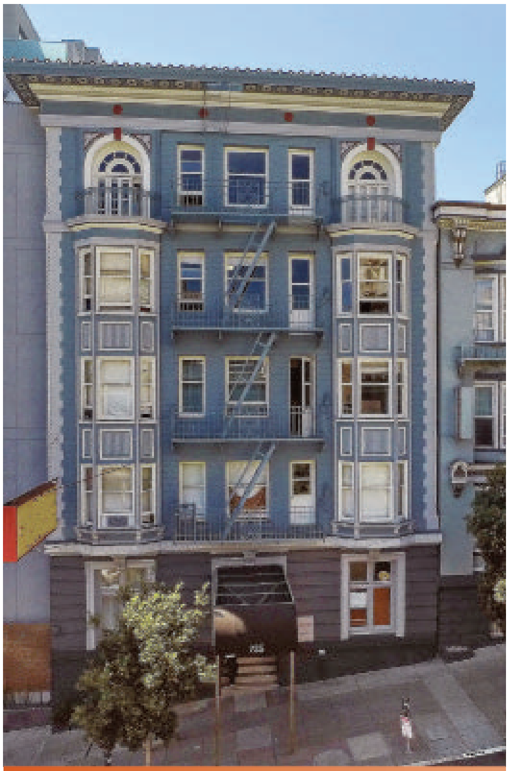
San Francisco has passed legislation that enables the development of accessory dwelling units in previously underused parts of existing multifamily buildings.

■ By Yat-Pang Au, Veritas Investments

ADDING NEW HOUSING units is crucial for a city in a housing crisis. San Francisco's recent growing pains are well documented, as new development has failed to meet the demand for housing at the full range of price points that urban renters need.

One recent solution is San Francisco's passage of citywide legislation that better accommodates accessory dwelling units (ADUs) in previously underutilized spaces such as utility and laundry rooms in existing buildings. In September 2016, the city's Accessory Dwelling Unit program — which reduces some planning code requirements — became available for use citywide. The city's planning department has also published an ADU Handbook, which includes a prototype example demonstrating how an ADU could replace some of a multifamily building's underutilized space.

Other spaces ripe for conversion into ADUs include storage areas, utility and laundry rooms, and basements. The city of San Francisco is hoping to add 14,000 ADUs in the next few years. Veritas Investments is among the first property owners to respond to the opportunity, with dozens of new units under construction, including 10 projected to open and another 41 permitted by the end of 2017. Eighty more are expected to open in 2018, but property owners continue to face challenges in helping the city to reach its ambitious goal, and to help ease the housing crunch.



Veritas is adding seven accessory dwelling units (ADUs), as well as updated amenities, at 735 Taylor Street, a 62-unit residential building near San Francisco's Union Square, in former banquet/meeting space.
Courtesy of Veritas

Challenges and Opportunities

ADUs are not new, but this recent wave of innovation is accelerating opportunities to develop them. Enterprising apartment building owners in California, New York, London and elsewhere have long converted underutilized space into housing, but economics and regulation have made


Yat-Pang Au

this a rare occurrence. Lately, the development of ADUs in the backyards of single-family homes, where they are also known as "granny flats," has taken off in cities that have embraced them. These include Vancouver, Seattle and Portland, Oregon.

San Francisco's ADU effort now offers a test case for cities wanting more housing at a range of affordability levels. Creating ADUs within existing apartment buildings requires significant effort to balance the needs of residents, owners, neighbors, investors and the community. San Francisco is beginning to demonstrate that this process can work in one of the tightest housing markets in the U.S.

Adding ADUs is a timely response to market conditions and consumer trends. More and more urban dwellers are seeking smaller living spaces than those they grew up in, and many see value in adding density that reduces a building's ecological footprint. They also love the walkable retail- and entertainment-rich neighborhoods usually found at the heart of American cities.

Key Elements

The following are among the key elements of San Francisco's ADU regulations and similar efforts to encourage the development of ADUs elsewhere:

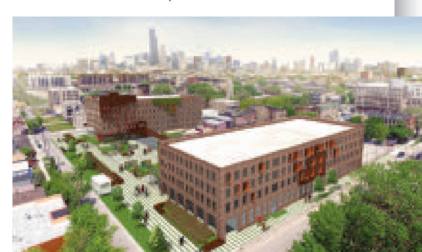
Fast-tracking Reviews. At the San Francisco Planning Department, the goal for ADU plan reviews is three to four months, compared to the standard six months for most plan reviews.

New & Noteworthy

274,000 sq. ft.

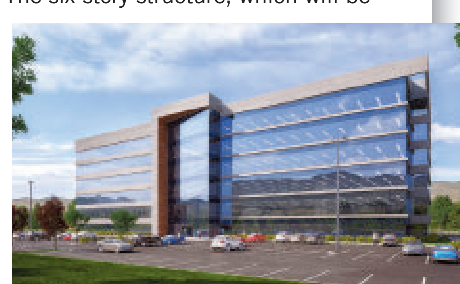
Pure Development has broken ground on a mission-critical manufacturing facility for BeijingWest Industries Co. Ltd. (BWI), a growing Chinese supplier to the U.S. automotive market, in Greenfield, Indiana. Pure will invest approximately $40 million to develop the facility; BWI will invest another $50 million over the course of its 20-year lease. BWI will use the facility to manufacture brake and suspension systems for global automotive companies like Audi, BMW and Honda. Construction of the almost 275,000-square-foot facility began in July; BWI expects to begin operations at the facility by August 2019.

200,000 sq. ft.

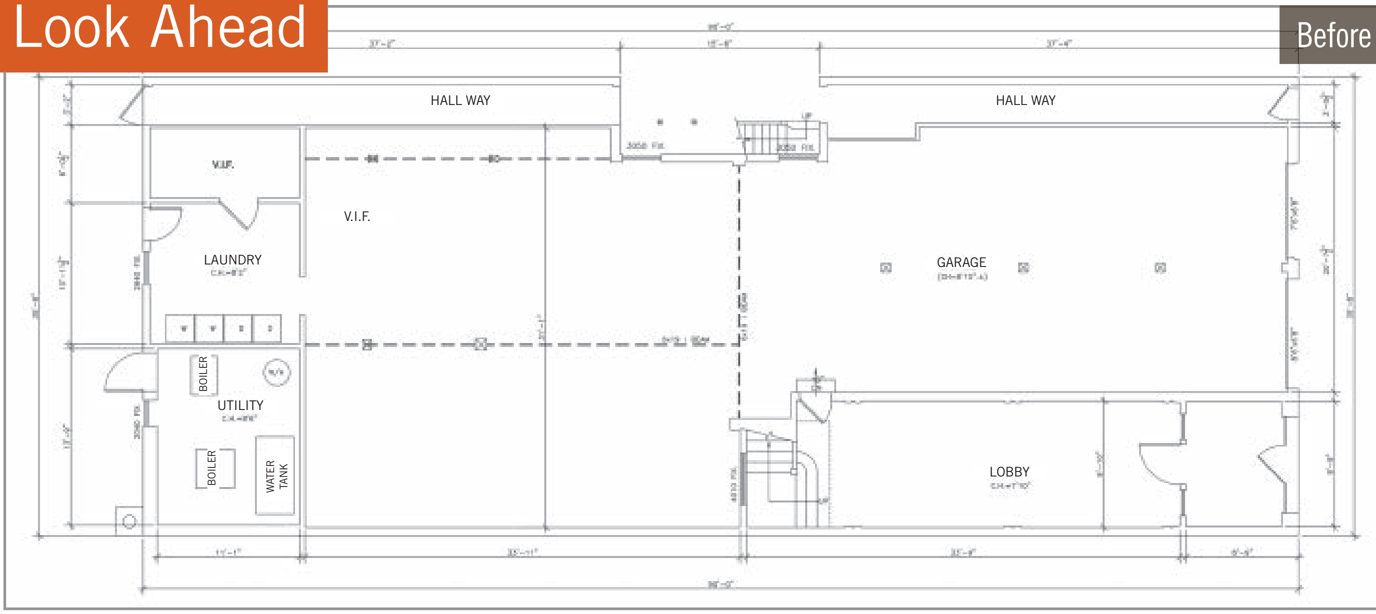


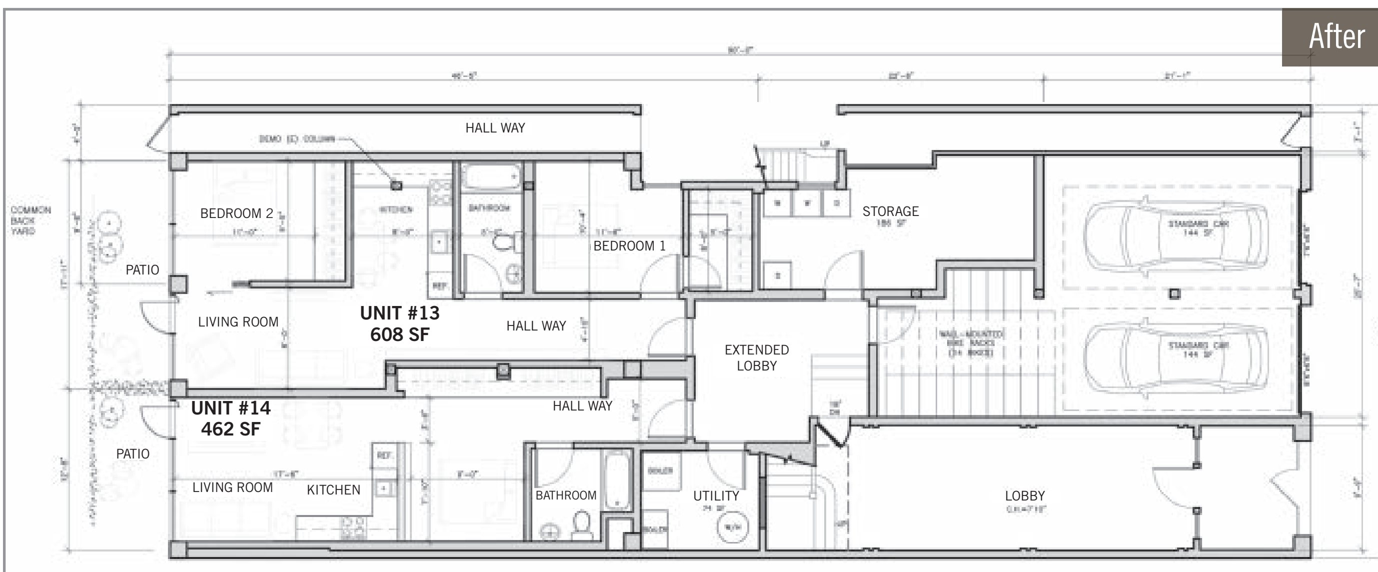
Condor Partners is redeveloping two 100,000-square-foot loft buildings in Chicago's Pilsen neighborhood into Mural Park, a mixed-use project that will include office, light manufacturing and retail space. The project, which has been designed to celebrate the local community's rich cultural history, is expected to be ready for occupancy in the first quarter of 2018. It will cater to existing Pilsen businesses as well as local startups and nonprofits. Amenities will include a restaurant, cafe, rooftop deck and bicycle storage. A plaza will feature murals in conjunction with the local National Museum of Mexican Art and other local artists. Transwestern is providing leasing services.

190,000 sq. ft.



St. John Properties is building Grove Tower, a 190,000-square-foot office building in Pleasant Grove, Utah. The six-story structure, which will be the largest multitenant office building between Provo and Sandy, will be adjacent to two single-story office buildings St. John has already completed in the 60-acre Valley Grove master-planned development. Grove Tower is expected to be completed in December 2017, with tenant occupancy beginning in January 2018. Software developer Instructure will be the anchor tenant.





These floor plans illustrate how Veritas is adding two ground-floor ADUs to space currently occupied by laundry and utility rooms as well as part of the garage in a four-story, 12-unit apartment building at 1750 Golden Gate Avenue.
Courtesy of Veritas

Adding Flexibility to City Guidelines. Regulations put in place decades ago that typically were aimed at new construction need to be made more flexible to encourage the addition of ADUs when older properties are renovated or redeveloped.

Lender, Investor and Industry Support. For ADUs to find larger acceptance, lenders, insurers and the broader real estate community all need to get their arms around the market demand for these units and discover how to make the most of this new opportunity.

One promising financing tool for ADUs is Property Accessed Clean Energy (PACE) financing. Sausalito, California-based CleanFund, which has a long track record of providing property owners with PACE financing for water, solar and other energy technology systems, is working with the city of San Francisco, the Bay Area Council and other groups to enable property owners to use PACE financing to develop ADUs.

The city has already adopted policies enabling property owners to use PACE financing to retrofit apartment buildings with seismic improvements, energy efficiency or water conservation upgrades, as well as solar energy systems. PACE financing from CleanFund also is currently available for a portion of the cost of adding ADUs. But PACE financing for the full construction costs of ADUs would widen the opportunities for this new source of housing, particularly at buildings owned by the smallest mom-and-pop property owners. This is a natural follow-on from the city's approval of using 100 percent PACE financing to retrofit earthquake-prone buildings, a process known as soft-story retrofits.

An Example

While additional financing sources would help property owners develop more ADUs, Veritas already has several projects underway in San Francisco. At 735 Taylor Street, a 62-unit residential building near Union Square with a Walk Score rating of 99 out of a potential 100, the firm is adding seven new units in former banquet/meeting space. This classic Victorian-style building had a classic problem: While floor plans and resident tastes have changed over the years, the building hadn't. By redeveloping underutilized portions of the interior, the company is adding modern amenities as well as ADUs.

The city's ADU legislation has made it possible for Veritas to create new housing while preserving the building's historic character, at a cost less than that of comparable new construction in San Francisco. In another example, 1750 Golden Gate Avenue, the firm is converting underutilized garage and storage space to create two new apartments scheduled to open in 2018.

Over the next five years, Veritas would like to develop some 200 to 400 ADUs in more than 100 multifamily and mixed-use multifamily and retail buildings throughout San Francisco. The experience will be a test case for innovation that can be tailored to other cities with housing crises, as well as an example for smaller property owners in San Francisco and elsewhere. ■

By **Yat-Pang Au**, CEO, Veritas Investments

New & Noteworthy

177,000 sq. ft.

New South Construction Co. has broken ground on the Hull McKnight Georgia Cyber Innovation and Training Center on the Augusta University campus in Augusta, Georgia. The $60 million project, which is being fast-tracked, is slated to open in July 2018. The Georgia Technology Authority is overseeing construction of the 177,000-square-foot building, which will include a parking deck with more than 500 spaces. The facility will house the university's Cyber Institute and Augusta Technical College programs as well as the Georgia Bureau of Investigation's new cyber crime unit plus research and development and incubator space.

145,000 sq. ft.

SmithGroupJJR has designed a new three-story Silicon Valley office building that will be developed by Spear Street Capital at 221 N. Mathilda Ave. in Sunnyvale, California. The 145,000-square-foot building's most significant design feature will be a custom 2,000-square-foot laminated glass artwork that will span the east facade. Commissioned from artist **Stephen Galloway,** the artwork reflects the site's history as an orchard. The building, which is slated for completion in fall 2018, will feature large floorplates up to 49,500 square feet, floor-to-floor windows and industrial elements that create an open, warehouse feel. The site also includes a 1,200-square-foot historic home, which will be redeveloped as a multipurpose conference/amenity facility.

78,000 sq. ft.

Terra, in partnership with Mayfair Real Estate Advisors, is transforming a 1980s-era parking garage in central Coconut Grove, Florida, into a mixed-use building. The redeveloped structure, which will include 78,000 square feet of office space on three floors and 18,000 square feet of street-level retail frontage while retaining the existing public garage, will mark the first delivery of new Class A office space in the neighborhood in more than 20 years. Known as Mary Street, the project will also feature electric car-charging stations and bicycle storage. Construction began in August 2017 and is expected to be completed in late 2018.

Ambient Scenting and Commercial Real Estate

Retailers, shopping centers, hotels and even hospitals are using scent to enhance the user experience and improve their bottom line.

By Adrienne Schmitz

SCENT CAN BE part of the toolkit that helps to build a brand and enhance how a customer or guest experiences a place. The right scent can instill calmness, evoke pleasant memories or increase worker productivity. An appealing scent can help customers form an emotional bond with a place that they will remember long after they've forgotten the draperies or artwork.

Recognizing that scent can be a useful branding component, many shopping malls, hotels, hospitals, restaurants, theaters and casinos are using ambient scenting to elevate the user experience and improve the bottom line. Even airports and subway systems are finding that customer feedback improves with scenting.

Scenting can be used to erase negative odors, replacing them with a more desirable fragrance. **Richard Weening**, chairman and CEO of Milwaukee-based Prolitec, one of several companies that provide scenting services to real estate and other clients, likens it to noise-canceling headphones. That is, it cancels bad smells and replaces them with a pleasant scent. "A bad odor repels customers and conveys a long-lasting negative impression of the establishment and the brand," says Weening.

Odor remediation can be particularly useful in grocery stores, restaurants, restrooms and places where lots of people gather or work, such as casinos and call centers.

How It Works

Typically, a very low concentration of a pleasant scent is dispersed into the air using a diffuser. The size and power of the diffuser are determined by the space being scented. The high-quality, hypoallergenic scent is carefully selected to heighten the company's

"Scent should be consistent with the decor. For example, you wouldn't want a tropical or ocean-breeze scent in a dark woodsy ski chalet."

Farah Abassi

brand and to appeal to target market segments. In many cases, a custom scent is developed for the client. Very subtle, natural kinds of scents are usually most appropriate. They are often so subtle that customers may not even realize they smell something.

Most companies begin with a scent selection consultation, then design a subscription package with a monthly fee for scent replenishment. The cost can range from less than $100 a month to as much as $20,000 a month for a large space like an airport.

Farah Abassi, founder of Boca Raton-based Aroma360, describes her firm's scent consultation, which involves asking a lot of questions. "What makes your brand unique? Who are your customers? What kinds of feelings do you want to evoke?" She adds, "Scent should be consistent with the decor. For example, you wouldn't want a tropical or ocean-breeze scent in a dark woodsy ski chalet."

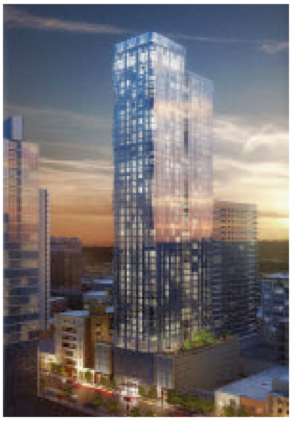
Ed Burke, vice president for consumer strategy at ScentAir, based in Charlotte, North Carolina, says, "Choosing the right scent is a collaborative process. Usually the customer has already thought about the look of the property and the music. We work with them to coordinate the scent to those

New & Noteworthy

60,000 sq. ft.

TM Montante Development and Morgan Communities with design partner BLT Architects are developing a six-story, 60,000-square-foot mixed-use building on the site of the former Millard Fillmore Gates Circle Hospital in Buffalo, New York. Slated for completion in 2018, the 1299 Delaware Building at Lancaster Square will contain about 60 residential units above ground-floor retail space. Future development on the site will include office space and a central square that will serve as a public gathering place.

47 stories



Murphy Development Group and CIM Group are constructing 1326 S. Michigan Ave., a new 47-story apartment tower on a 0.6-acre site that will bring 500 units to the southern portion of this famed Chicago street. Flanked by two lower structures, the tower will provide a mix of studios; one-, two- and three-bedroom units; and approximately 7,500 square feet of ground-floor retail space, as well as parking for 188 cars. Two full floors of amenities will include co-working space, lounges, an outdoor deck with a pool, a dog park, a 47th-floor fitness center with lake views and more. It will be the first apartment building in the city to feature Google Fiber's Webpass service. The building is expected to be completed in early 2018.

8.5 acres

Cooper Robertson has planned and designed the public areas of a new 8.5-acre clinical research campus along the Schuylkill River for the Children's Hospital of Pennsylvania (CHOP). The design, which incorporates cutting-edge resiliency practices to protect against stormwater and flooding, will collect, convey and retain 85 percent of the stormwater that hits the site through a combination of green roofs, rain gardens and underground systems, all of which are expressed as landscape features. The space will include four distinct public open spaces totaling 4.55 acres. Those public spaces will also buffer the scale of the up to 2 million-square-foot research campus. ■

Do you have a new and noteworthy project in the planning, design, or construction stage that you'd like to share with fellow real estate professionals? Send a brief description and high-resolution rendering to developmentmagazine@naiop.org.

themes. Our team also considers who the audience is. Demographics — age, gender and cultural characteristics — can determine the type of scent."

Prolitec's **Weening** says, "We develop a custom scent to appeal to the client's target customers, or the client can choose a scent from our collection that reflects their brand and image. Our master perfumers understand which scents appeal to which demographics." He adds that American customers tend to prefer citrus scents such as lime and grapefruit, whereas Europeans find bergamot appealing. Americans and Europeans even differ in the variety of cedar scent they prefer. In Europe, the farther north, the less intense the preferred scent. Japanese customers like a lighter scent than those in the U.S., whereas mainland Asians like a more intense scent. In the Middle East, people prefer somewhat spicy scents such as frankincense.

Abassi has found similar cultural preferences and adds, "We are drawn to the scents of our childhood. The smells we remember from the markers or play dough we had as children can evoke positive memories."

ScentAir offers a palette of scent samples from its library of more than 2,000 scents or can produce a custom scent. The most common scents come from teas, citrus, floral, woods and other natural products. Aroma360 also offers seasonal scents. A summer collection is based on fresh ocean and beach-related scents. For the fall, pumpkin spice and warm, cinnamon-like scents are key.

All Kinds of Users

Prolitec works mostly with large global and domestic clients such as airports, shopping malls, hotel chains and national retailers; "anyone who is brand focused or for whom scent is an important part of the customer experience," according to Weening.

"Hotels find that an exceptional arrival is key to the guest experience. Having an appealing scent in the lobby is part of that experience."

Ed Burke

Abercrombie & Fitch is working with Prolitec to present a new fragrance in stores that reflects the retailer's new branding. Prolitec has also worked with Soma Intimates, a national lingerie merchant.

Hotels are major users of scenting. ScentAir's Burke notes, "Hotels find that an exceptional arrival is key to the guest experience. Having an appealing scent in the lobby is part of that experience." Westin Hotels & Resorts worked with ScentAir to develop its signature White Tea fragrance, which is used not only for scenting the air but also is reinforced in its bath amenities. Today, Westin offers a broad collection of White Tea-scented bath products, room spray, potpourri and even a scent diffuser for guests to purchase for home use.

Marriott International began working with ScentAir about 10 years ago. The hotel chain first tried scenting in about 100 properties. It got such positive feedback through guest surveys that the chain expanded it to all Marriott properties.

Abassi says Aroma360 works with a variety of clients, including hotels, spas, offices, retailers and medical centers, where scent can help to soothe patients' anxiety. She also has worked with auto dealerships. "Buying a car can be so stressful and the proper scent can make clients feel more relaxed," says Abassi. ScentAir's Burke adds, "The service department is important for the auto dealers' bottom line, so the atmosphere there is important."

Prolitec's Weening says, "Everything smells like something. We try to make that something really beautiful." ■

By **Adrienne Schmitz,** a freelance real estate writer and researcher

Space as a Service

As work becomes more flexible, so will the workplace.

By Antony Slumbers

IN ITS 2016 "Workspace, Reworked" report, JLL stated that "up to 30 percent of corporate real estate portfolios will include flexible space by 2030." Although even this is something much of the industry does not want to hear, their prognosis is not nearly aggressive enough. The numbers are likely to be closer to 30 percent by 2022 and more than 40 percent by 2030.

Why? Because the commercial real estate industry is undergoing a structural change that will reshape every facet of the market that has existed for the past 50 years or more. This change is not just a function of the natural, cyclical real estate cycle. Rather, it is a set of structural changes to the fabric of the market. These changes are the byproducts of a world where technology is leading to fundamental changes in how businesses operate, the work people do and, especially, how and where they do it.

Five technological megatrends are the "great enablers" of all the changes now taking place. And each of these trends is on an exponential growth trajectory. Indeed, they are all hitting the uptick of the exponential curve. They are:

1) The ubiquity of the supercomputers (aka smartphones) now in everyone's pocket.

2) Pervasive high-speed connectivity.

3) Cheap and abundant cloud computing.

4) Billions of internet of things (IoT) sensors connecting anything that can usefully be connected to the internet.

5) The rise of artificial intelligence (AI) and robotics.

In combination, all of these trends are reshaping demand for space. The very nature of the work people do is being reshaped to the point that many people no longer need an office in which to work, or even a store in which to shop. People may *desire* them, but they do not *need* them.

The Changing Nature of Employment

On-demand or some other form of contingent work is becoming the norm for many people — perhaps up to 40 percent by 2020, according to an Intuit study conducted in 2015. In its 2016 "Workplace 2020" report, Google wrote that "Flexible working will be the defining characteristic of the future workplace," and the bigger the company the more so this will be true. "Companies employing over 6000 people will be 66% flexible by 2018," Google concluded.

From Rent Collector to Service Provider

In this world, purchasing flexible space, or "#SpaceAsAService," becomes an obvious response for individuals and companies. Just as it is technology that changes behavior, not the other way round, so this demand will lead to a change in the nature of supply. Put simply, the real estate industry is going to be forcibly moved from being a rent collector to being a service provider.

And that changes everything. The shifting purpose of offices — robots will do anything rote or predictable, so offices will need to be places that catalyze human skills — and the fact that they will often be operated "on demand" will lead to a lot of obsolete space.

The necessity for office buildings to become much "smarter" will transform what it means to be a property manager. Short leases, or rather the death of the lease, change notions of valuation, financing and asset management.

The really big change, though — the fundamental, maybe even existential challenge for the real estate industry — is that the business of real estate will no longer be real estate. Rather it will be all about service, data and brand.

In a #SpaceAsAService world, your customer will be anyone who enters into and/or works in your building. The value you are able to build around your physical asset will be a reflection of the user experience (UX) that you can provide each and every one of those customers. Because in an on-demand world, they can simply go somewhere else.

How do you build a great UX? By using data in a way the industry has not even touched upon to date. You need to know who your customers are, their needs and desires, how they wish to work, what services they require and what it is about your space that they engage with. Then you need to understand how your space is being used at a much more granular level than most property owners and managers do today. You need this information not only to allow you to move from preventative to predictive (on-demand) maintenance, but also to analyze and A/B test new layouts and configurations.

Put all that together, the services and the data, and that will be your brand. Today, brand really is everything. It is your brand that will attract users, enable you to maximize revenue and build a waiting list for your space. There will be a large yield gap between the best branded spaces and the rest.

Thus the consequences of #SpaceAsAService go far beyond "a bit more co-working space." Physical assets are going to need to become smart by default, property managers are going to need to refocus from operations to user experience, landlords are going to need to become experts in AI and data analytics — as well as morph from product to service companies.

If demand does indeed result in all of the above coming to pass, commercial real estate will become a very different industry, providing a better "service" to a happier customer. Those of you who recognize and embrace this shift will probably make more money as well. Are you up to the job? ■

By **Antony Slumbers**, digital transformation in real estate consultant and writer

This article is adapted from one that originally appeared on April 24, 2017, in the author's blog. See www.antonyslumbers.com/theblog.

"Worth Repeating"

Sound Bites from I.CON '17: Impact Projects, May 8-9, 2017, in Toronto:

"We will go from four shipping alliances to three, and from 20-plus shipping companies to less than 10 in the next three to five years. For industrial real estate, those relationships and alliances, the ports they call on and the rail infrastructure they use, will be really important to intermodal and inland distribution network[s]." **K.C. Conway**, *MAI, CRE, senior vice president, credit risk management, SunTrust Bank*

"Today in the industrial markets, leasing fundamentals are excellent, user demand is unbelievable, it's generally supply constrained, capital is abundant and it's a class that is resistant to disruptors." **Jim Clewlow**, *chief investment officer, CenterPoint Properties*

"The No. 1 decision when companies choose location is labor. The No. 2 criteria for site selection decisions is no longer business costs; it's logistics and access to markets and transportation networks." **Diane Gray**, *president and CEO, CentrePort Canada Inc.*

Sound Bites from I.CON '17: Trends and Forecasts, June 8-9, 2017, in Long Beach, California:

"Productivity growth has been low for a number of years. Part of what is going on is that [the U.S. economy] is moving [from producing goods] to [producing] services and we don't know how to measure [productivity for] services very well." **Walter Kemmsies, Ph.D.**, *managing director, economist and chief strategist JLL Ports, Airports and Global Infrastructure*

On capital markets and industrial real estate: "Development returns are coming in and compressing [somewhat], but we still see attractive opportunities there. … In the existing portfolio, while cap rates have compressed and you will see even more compression [in the future], we feel that we have [considerable] runway in NOI growth over the next few years. I think that's where the returns are going to [continue to] come from." **Dayton Conklin**, *director, Clarion Partners*

On negotiating with sellers of infill industrial space: "Sellers in this space are not institutional [for the most part] and, quite frankly, we scare them away with our due diligence standards and some of the contract requirements. So we understand that to grow our industrial book, we need a DNA change." **Scott Strauss**, *executive director, JP Morgan Asset Management*

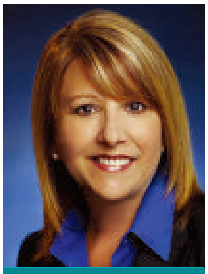
"The data that we use is no longer an exhaust gas of our business; it is the fuel of our business." **Tom Sheraden**, *senior vice president and chief information officer, Prologis*

"Who is the 100 pound gorilla [in e-commerce]? Alibaba. Alibaba is coming to the U.S. It has 26 percent of global e-commerce sales, while Amazon has 13 percent." **Gregory Healy**, *executive managing director, supply chain and logistics, Colliers International* ■

CEO on Leadership:
Jaclynn Walsh, President/COO, Irgens

The president and COO of this Milwaukee-based diversified commercial real estate development company shares her insights on the industry.

By Ron Derven



Jaclynn Walsh

"Don't leave others guessing at where things stand; always be out in front and communicate progress."

Jaclynn Walsh

JACLYNN WALSH'S real estate career began at what was then one of the Big Eight accounting firms, providing consulting services at the organization's Los Angeles tax division. After six years in LA, she followed her heart back to Milwaukee, where she blanketed area real estate companies with her resume.

One of those resumes landed on the desk of **Mark Irgens**, who was then president of Boldt Development. At the time, Irgens was expanding the company's consulting services, and thought Walsh's experience would add value to the firm. During her more than 15 years there, she focused on representing clients in real estate, including site selections, acquisitions, development entitlements, team selection and management, design and construction administration, and ultimately property management.

In 1998, Mark Irgens, Walsh and two other people purchased the assets of Boldt Development — including contracts and around 45 employees — and formed Irgens, a developer, investor and operator of office, mixed-use, health care and manufacturing properties. Over the years that followed, Walsh applied her skill sets to Irgens' real estate portfolio. In October 2014, she was named president/chief operating officer of Irgens, which has grown to more than 100 employees at three offices in Milwaukee, Chicago and Phoenix.

Development: *How has your role evolved at Irgens?*

Walsh: At the time we formed Irgens, my role began to change. As a small company with 45 employees, we realized we no longer had many of the resources of a large company. That is, we had no human resources or information technology departments to handle all of our operational needs. I began to manage those aspects of our business. As my operational role — and the firm — expanded, the time I had to focus on direct project development became limited.

While I enjoy the challenges and successes experienced through managing real estate development projects, my role at Irgens has evolved into making sure we have the right resources in place to identify and administer real estate investments for others and for ourselves.

Development: *What are your core areas of focus?*

Walsh: My primary focus in operations is risk management. By improving our internal processes, we can better manage the risks facing Irgens and our clients. I believe there is always a better way to do things. We are continually working to improve our processes with the goal of deploying improved solutions. For example, if asked about the reliability of internally presented information, we had better know the answer with a certain degree of accuracy.

Over the past 10 years, we have invested heavily in technology to better manage and share information, both internally and externally. Data integrity is a very simple but important example of how we manage our risk exposures. Having the best resources in place also manages our risk. We have a highly qualified team with varying backgrounds, all contributing to the whole. Through continuing education and the school of hard knocks, we learn through our shared experiences.

Development: *What qualities do you look for when hiring senior staff?*

Walsh: We target those with an entrepreneurial spirit who are passionate about what they do. We routinely say, "If it were easy, everyone would be doing it." Those driven by identifying opportunities, addressing challenges head on and who have a desire to succeed will do well. To accomplish such feats, we believe they must be excellent communicators. Further, it is critical that they understand the risks associated with our business, recognize their strengths and weaknesses, and take advantage of the resources around them.

Development: *What economic or market indicators do you track on a regular basis to keep up with the industry?*

Walsh: Since our primary business is in developing and redeveloping real estate, we must continually monitor the hard and soft costs of development. Critically important are financing costs, and those are not always simply monetary in nature. We must align our project costs with market rental conditions. This can be a delicate balance during challenging economic times. In addition, we closely monitor national and local transaction trends to evaluate and optimize the timing of refinancings and/or sales.

Development: *Over the next 18 months, what challenges and opportunities do you see for the commercial real estate development industry?*

Walsh: We are optimistic about the next 18 months. The markets appear stable and we have enjoyed high demand for our product for the past several years. We see this continuing over the near term. We're monitoring the banking industry and the challenges ahead for financing real estate. In addition, we actively participate in the ongoing discussion regarding how taxation changes can influence how we do business.

Development: *Looking out three to five years, what do you see on the horizon that will impact the industry? What are you doing today to prepare?*

Walsh: Our business model continues to evolve. Structuring transactions to maximize the investments of our stakeholders is paramount to our success. Instead of waiting for the news and reacting, we are actively involved in leading real estate organizations such as NAIOP. This helps us to understand and/or influence relevant issues and to be prepared for the future.

Development: *How has the industry changed during your career?*

Walsh: Over the years there have been ups and downs, and that can be expected. Living through the Great Recession and seeing and understanding the devastating and profound effect on the real estate industry was most certainly an eye-opener. The entire industry learned from it. Those who survived came out stronger and smarter.

At Irgens, we have become more focused in our service delivery. We do not attempt to be everything to everyone; instead, we aim to be the very best to the valued few.

Development: *What is the most valuable lesson you've learned over the course of your real estate career?*

Walsh: Do not fall behind. Stay ahead and lead. Don't leave others guessing at where things stand; always be out in front and communicate progress. If you don't do this, you are simply reacting to others. ■

By **Ron Derven**, contributing editor, Development

Master Planning: A Powerful Tool to Add Value to CRE Developments

A master plan can help a developer strike the right balance between long-range investment objectives and the right mix of programmatic elements.

By Nitin B. Desai and Philip Wilkinson Jr., AIA, AE7 Planners and Architects

THE MASTER PLAN is the quintessential tool to enable developers to make informed decisions about site selection, financial viability and program planning, including use, scale and timing. While master plans are essential for large-scale projects and complex mixed-use developments, they can also help developers make decisions about smaller commercial development projects.

The master plan is a valuable tool for evaluating alternative sites as well as for selecting the most appropriate use to ensure the best development potential and return on investment. Master plans can also help the development team embrace sustainable design early in the development process to increase a project's financial viability while decreasing short- and long-term costs.

A complex master-planning process is transforming Manhattan's West Side Rail Yards into Hudson Yards, a 28-acre, 18 million-square-foot mixed-use development that, upon completion, will include office, retail and residential space as well as parks, open space, and cultural and entertainment facilities. The first tower opened in 2016; the remaining development will roll out in phases over the next decade.

Rendering courtesy of Related-Oxford

Smart Site Selection

Commercial development projects become financially viable when their site and programs are compatible. Planners must evaluate the following factors in order to determine the feasibility of a development, to maximize a site's full development potential and/or to determine which of several potential sites is optimal for a particular project.

1) Geometry: Does the site's shape easily accommodate a complex program or does it add to development costs?

2) Geology: How does soil quality impact the type of construction or treatment needed?

3) Zoning: How will the site's zoning — including any stipulations, benefits and/or incentives — impact its development potential?

4) Accessibility: Can access to existing roadways and utilities reduce infrastructure development costs?

5) Legal Attributes: Do covenants, easements or deed restrictions limit how the site can be developed?

6) Financial Attributes: How might the cost of the land and any potential tax incentives impact commercial development?

7) Intangible Assets: Can the project leverage panoramic views or natural features to help create a unique a sense of place?

Financial Viability

A master plan provides valuable information about a proposed development to help determine its financial viability. One particularly useful way to do this is through intelligent master plans with real-time updates. Smart 3-D building information modeling (BIM) enables designers and developers to visualize complicated or large sites with varying development programs, options or phasing in real time. These models can quickly quantify what changes to the master plan will mean in terms of the total development area, detailed program components, site density and floor-to-area ratio. When combined with construction cost and development pro forma data, the program also can quickly assess a project's financial viability.

Sustainable Site Planning

A good master plan should integrate environmentally sensitive planning principals to help decrease short- and long-term development costs as well as environmental impacts. The master plan can help reduce the project's energy use, emissions and site infrastructure costs, while also embracing natural features unique to the site.

By placing buildings and pathways in line with existing topography and groundwater conditions, for example, a master plan can avoid undesirable damage to sensitive ecology and retain a site's existing natural features. This typically makes a commercial project more attractive as well as more lucrative for the developer, tenants and customers, since sites with panoramic views and unique natural elements typically fetch higher premiums.

Master Planning at Work: Hudson Yards

Hudson Yards, one of the largest private real estate developments in the U.S., is currently under construction in New York City. While the project is exceptional in many ways, it also demonstrates the potential of strategic master planning to benefit any project. The 28-acre master plan is transforming Manhattan's West Side Rail Yards, once considered undevelopable, over the fully operational rail yards feeding into Penn Station. The city rezoned the land in 2005 and, after the Metropolitan Transportation Authority solicited RFPs in a competitive process, awarded the project to Related Companies at the depths of the 2009 financial crisis. (For more on this project's early development, see "Building a NYC Neighborhood Atop a Rail Yard," Development, summer 2014.)

The master plan for Hudson Yards supports a strong return on investment by applying simple master-planning principles to extreme circumstances. The plan maximizes the development's density to financially balance the large upfront site development costs needed to build over the rail yards. In addition to affording views across the Hudson, the plan has leveraged the site's connectivity with a new subway station and a link to the popular High Line public park.

After three years of revising and developing the master plan, testing multiple retail podium designs and tower configurations, construction began on the first tower in December 2012. Related continued to test variations on the master plan to maximize the site's development potential for another two years. In the process, it eliminated one of the three original towers, varied the number of retail floors within the podium, tested multiple anchor tenant sizes and locations, and added and subtracted entertainment and food and beverage programs to find the optimal mixed-use program for the project.

A master plan can impact surrounding land values even before construction begins. Property values on Manhattan's entire West Side skyrocketed as the Hudson Yards master plan advanced. According to "An Investment That's Paying Off: The Economic and Fiscal Impact of the Development of Hudson Yards," a 2016 report prepared for Related and its partner in this project, Oxford Properties Group, the economic impact of the development project, once it is fully operational, is expected to add nearly $19 billion annually (in 2018 dollars) to New York City's GDP, accounting for about 2.5 percent of citywide GDP.

Investment in master planning continues to pay off in projects large and small. A little planning goes a long way. ■

By **Nitin B. Desai** and **Philip Wilkinson Jr.**, AIA, architects, AE7 Planners and Architects

Note: Wilkinson was project architect for the design team that master planned the retail podium at Hudson Yards while at Elkus Manfredi Architects, which is designing The Shops at Hudson Yards.

Private Equity Finance and Securities Compliance for Real Estate Developers

Developers and property owners must understand the risks involved in recruiting passive investors.

By Suzanne Mulvihill, Haight Brown & Bonesteel

ANY REAL ESTATE development transaction requires many moving parts. Raising capital is one of the most important aspects of the transaction. Without it, most deals would not proceed. But negotiating the transaction and inking the deal with potential investors does not end when the funding has closed. And, more often than not, the last thing on a developer's mind is compliance with securities laws.

Securities Compliance

Many developers and owners are unaware that selling even a portion of a real estate project in a tenancy in common (TIC) or joint venture (JV) structure may trigger securities compliance. Interests in any JV entity are generally defined under the statute as a de facto security. And although the law was previously considered a gray area for TIC interests, the U.S. Supreme Court unequivocally answered the question in ruling that an undivided interest in a TIC is also within the definition of "security" under the Securities Act of 1933.

Developers face two potential pitfalls where securities compliance is triggered: 1) registration of the securities themselves and 2) sale of the securities by an unauthorized person. Under the Securities Act of 1933, any offer to sell securities must either be registered with the Securities and Exchange Commission (SEC) or meet an exemption. Regulation D of the Securities Act contains three rules providing exemptions from the registration requirements, allowing companies to offer and sell securities without registering them with the SEC — Rules 504, 505 and 506.

Filing Notices and Selling Interests

Most issuances for developers are exempt from registration, provided the offerings are limited in nature. The regulations provide a safe harbor for issuers, or sponsors, where they may file the requisite paperwork setting forth the applicable limited offering exemption with the SEC and state regulators.

Failure to file such notices could result in the issuer being barred from qualifying for any Regulation D exemption in the future. Rule 506, in particular, includes the so-called "penalty box" binding the founders to the disqualification as well as the company. Developers acting as sponsors should always review pertinent federal and state laws before any kind of issuance to determine if an applicable exemption is available.

The very act of selling the interests in such projects may also trigger compliance with securities laws. Any person engaged in the business of buying and selling securities for their own account through a broker or otherwise is considered a broker-dealer requiring registration with the SEC, subject to certain exemptions. This catch-all definition would include many, if not all, developers who act as sponsors seeking to sell interests in any portion of their projects.

To determine if the broker-dealer must register, the SEC analyzes the

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Skypro Clear	SPC	96%	0.94	0.80	94%	0.90	0.50
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activities that an entity, through its employees, performs and how it participates in securities transactions.

Issuer Exemption

Some issuers rely on the so-called issuer exemption to conduct sales activities without their personnel being required to register as brokers or dealers. The rule provides a nonexclusive safe harbor for "associated person(s)" of the issuer (i.e., employees, partners, officers and directors) who sell interests in the projects, if they meet certain conditions.

To qualify for safe harbor, these individuals cannot receive compensation on the basis of the success of the transactions. Compensation that is contingent on a securities sale or that is based on a percentage of investment is viewed by the securities regulators as a commission. Bonuses paid according to the amount of equity raised, for example, would likely also fall within the definition of sales-based compensation.

"Taken as a whole, the issuer exemption is clearly intended to provide a means for a smaller developer to raise capital for a one-off transaction."

Suzanne Mulvihill

Forms of compensation that may not be viewed as commissions, depending on all the facts and circumstances, may include 1) professional fees based on hourly billing rates or fixed fees, 2) nontransaction-based consulting fees, and 3) nontransaction-based due diligence fees or expense reimbursements. In addition to the compensatory element, the associated person's sale activities must be passive and fall in one of three categories.

Raising Capital

Taken as a whole, the issuer exemption is clearly intended to provide a means for a smaller developer to raise capital for a one-off transaction. The exemption is not meant to provide a vehicle for developers to regularly sell portions of their own projects, even if the developers meet the letter of the exemption requirements. The SEC could take a substance-over-form position, attacking developers who form separate and distinct entities for each individual deal. Courts may also uphold a disgruntled investor's suit for a right of rescission, which allows the investor to receive all of the original investment back plus interest. This remedy is particularly onerous and has widespread implications should a downturn in the economy affect real estate, as it did in the global recession that began in 2007.

Developers should procure legal advice before raising private equity for every transaction to ensure compliance with securities laws. Exemptions are available to the cautious developer and sponsor, but they are tedious, and the filings that are required must be made within very specific time constraints. Careful planning is required to successfully avoid SEC enforcement actions, which could include fines, penalties and criminal prosecution or private rights of rescission. ■

By **Suzanne Mulvihill**, managing partner, Haight Brown & Bonesteel's Sacramento office, and leader of the firm's transactional practice group


WE GO
BEYOND
REAL ESTATE

Bringing the Outside In

A fresh-air, 28th-floor amenity lounge has transformed a Chicago office tower.

By Roger Heerema, Wright Heerema Architects

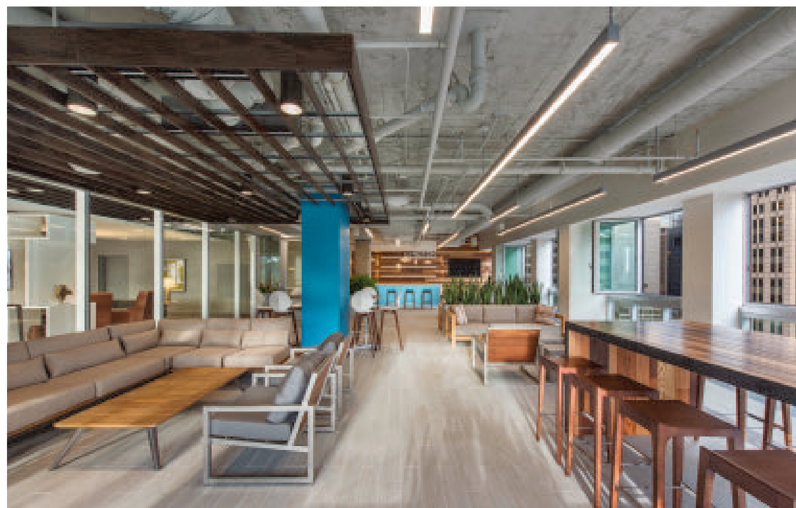
EXPANSIVE CITY views might be the greatest advantage offered by an upper floor of a downtown high-rise. But once you turn your back to the windows, it's easy to forget that you're in the center of a bustling city. You could be on any floor of any office building, anywhere.

That's not the case at 200 West Jackson, a recently redeveloped building in downtown Chicago. On the 28th floor of this office tower, windows open during warm weather months to bring in fresh air and the sounds of the city below. This full sensory experience creates an inviting and comfortable atmosphere for a hospitality lounge, where building tenants socialize, collaborate and recharge.

The four-season tenant lounge was added as part of an $8 million renovation at 200 West Jackson led by White Oak Realty Partners. When White Oak bought the property in 2015 with investment partner Angelo Gordon & Co., they saw an opportunity to reinvent a 46-year-old building that had been shedding tenants. The property boasted an ideal location in Chicago's West Loop, close to numerous Chicago Transit Authority bus and train lines, but lacked the amenities and "wow" factor many companies demand to attract and retain employees in today's fiercely competitive talent market.

Reinventing a Classic Building

White Oak immediately launched the design process for new amenity spaces and transformed the lobby and exterior. The new experience begins at the entrance, where an aluminum retail facade has modernized the building exterior. Inside, the lobby



Fully operable windows in The Notch lounge open to let in fresh air in the summer, while plentiful green plantings transform the space into a winter garden in colder months.

All photos courtesy of Wright Heerema Architects. © 2017 James Steinkamp Photography

has been updated with a textured stone feature wall that includes a large-scale recessed LCD media wall. A perforated metal organic backlit "tree wall" featuring images of tree trunks and branches runs the length of the lobby.

On the top floor, the new 2,700-square-foot amenity lounge, dubbed "The Notch," offers Wi-Fi service and features dark wood wall paneling, wood slat ceilings and warm ambient lighting. A variety of furniture groupings offer leather, mohair and wool seating juxtaposed with metal, glass and wood tables and lamps. The lounge's bar and recreation area also features multiple seating areas and chair types, to encourage collaboration, independent work and networking. Building tenants can reserve The Notch for private events during or after the workday, for no additional charge. While there is no permanent bartender on

A new aluminum retail facade has modernized the building exterior, featuring new address signage made of stainless steel and frosted backlit glass.

staff yet, the bar is equipped for use by caterers during events.

Employees are drawn to the airy, open space, which blurs the line between indoors and outdoors with abundant

200 West Jackson Project Summary

Location	Chicago
Type of Site	Urban
Development Type	Redevelopment
Transportation Modes	Car, Train, Bus, Pedestrian, Bicycle (Divvy Bikeshare)
Uses	
Office	487,000 sq. ft.
Cafe	Approx. 3,000 sq. ft.
Amenity Floor	8,700 sq. ft.
Number of Floors	29
Major Tenant	
Nielsen	Floors 14-27, with the exception of 16 and 20
Annual Rent	$21/sq. ft. net
Lease Terms	15 years
Development Team	
Developer	White Oak Realty
Project and Interiors Architect	Wright Heerema Architects
General Contractor	Morgan Harbour Construction
Leasing Agents	White Oak Realty
Property Manager	JLL
Financial Partner	
Co-owner	Angelo Gordon & Co.
Timeline	
Building Acquisition	2015
Project Completed	October 2016
Development Cost Information	
Hard Costs	$6,478,000
Soft Costs	$1,013,000
Total Project Costs (Include Lobby, Signage and Amenity Floor)	$7,491,000

natural light, glass walls, large operable windows, outdoor furniture and plentiful greenery.

The lounge is only one of the focal points on the new amenity floor. Building tenants can also take advantage of a new 2,500-square-foot full-service conference facility and a 3,500-square-foot fitness center. Both the conference facility and the fitness center are available for tenant use at no additional cost.

The property management team also has implemented new initiatives to help companies in the building achieve their health and wellness objectives. They launched a "free fruit for tenants" program and added new vending machines located just outside the conference center adjacent to the amenity lounge that are stocked with freshly prepared snack and meal options from Farmer's Fridge, a Chicago company focused on local sourcing of healthy vending machine food.

The Results

In early 2017, Nielsen, the TV ratings firm, signed a 215,000-square-foot lease to consolidate all of its Chicago-area employees into one space at 200 West Jackson. Companies such as video marketing firm Liquidus Marketing have signed additional leases,

The lounge boasts a rich hospitality vibe, with varied seating groups for impromptu gatherings, a fireplace, a pool table and private niches for TV watching and relaxing.

bringing building occupancy up to 81 percent from its original state of less than 50 percent occupancy when White Oak purchased the building in 2015.

Loyalty from existing tenants who have been in the building since before the renovation began has also seen a boost, thanks in no small part to a consistent approach to property management, which helped keep current tenants happy throughout the year-long transformation. Property management hosts a weekly happy hour for all tenants; it also brings a different food vendor — who offers convenient lunch options — to the amenity lounge each day.

The world of work has changed. Office tenants today expect their buildings to provide much more than simply a place in which to work at a desk or hold the occasional meeting in a conference room. They're seeking to provide rich experiences for employees in environments that set their company apart. The opportunity for owners and developers to reinvigorate older buildings is immense. Sometimes what's needed is a simple breath of fresh air. ■

By **Roger Heerema**, a principal with Wright Heerema Architects, NAIOP Chicago's 2016 Design Firm of the Year

Tenant Communications: Connecting With People Who Are Always Connected

How you say things says a lot, and can have a big impact on tenant retention and rent premiums.

By Michael Broder, Brightline Strategies and Rockerbox

COMMUNICATION IS AN age-old problem. The audience you are trying to reach may indeed see but never perceive; they may hear but never understand. In 1950, urbanist and organizational analyst **William H. Whyte** noted in Fortune: "The great enemy of communication, we find, is the illusion of it."

Despite vast enhancements to communications in the past 67 years, the core problem remains: All of us are quite certain that because we have said something, we have communicated. Often, however, we haven't.

Connection Matters

In today's world, information is a commodity. The resource in short supply is attention. Therefore, it is more important than ever that you focus your communications on what creates value for you, based on what is valued by your tenants. Everything else is just noise.

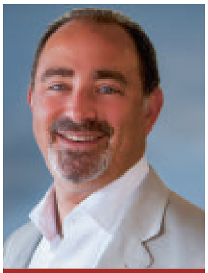
Commercial real estate companies are pretty good about making information available. But is it the right information? Is it expressed in the right way, across the right channel, to the right audience? Are the messages not just seen but heard, understood and acted upon? Do they measurably drive tenant engagement, preference, loyalty and advocacy?

In today's wired world, there is more to communications than simply coordinating content and channels to hit as many tenants from as many directions as possible. Effective property management programs make communications a signature element of the tenant experience. And their success should be measured in efficacy and outcomes, not number of impressions or size of effort.

How do you rise above the din of competing voices, capture greater "mind share" and make yourself more relevant to those you serve? The process starts with distilling the essence of what is important to your tenants, the core idea that compels them to connect with you.

Awareness Matters

If you're already focused on creating a superior tenant experience — that is,



Michael Broder

one that is differentiated and relevant — you're one step ahead of the pack. But if you aren't effectively communicating with your tenants about those experiential elements, you're missing an opportunity.

In every commercial real estate study conducted by Brightline, the data indicate that tenants who are most aware of experiential offerings or other related improvement initiatives are also more likely to renew, advocate for their existing landlord and pay a higher rent premium.

A 2017 study conducted by Brightline among more than 1,000 tenant decision-makers (C-suite occupants) and influencers (senior vice presi-

Rankings of Workspace Priorities By Office Tenants

	#1 Priority	#2 Priority	#3 Priority
Having a functional workspace	34%	21%	12%
Keeping cost/operating expenses down	22%	16%	16%
Having a modern, technologically connected space	15%	28%	19%
Having a space that promotes wellness/work-life balance	12%	13%	16%
Impressing or attracting current/new clients	9%	6%	12%
Keeping current employees/talent retention	7%	9%	19%
Attracting new employees/talent recruitment	1%	8%	7%

“The secret is to say the least but get the most across.”

Michael Broder

dents and vice presidents) across multiple portfolios nationwide found awareness to be a key driver of retention, recommendation and rent premiums.

Take, for example, decision-makers who are “extremely” or “very aware” of experiential offerings and/or related improvement initiatives: 51 percent say they are “extremely likely” to renew their lease. Of those only “somewhat aware,” 39 percent are “extremely likely” to renew. The trend continues downward among the “un-aware,” with only 34 percent saying they are “extremely likely” to renew, leading to a double-digit difference in renewal intention and intensity across the range of responses.

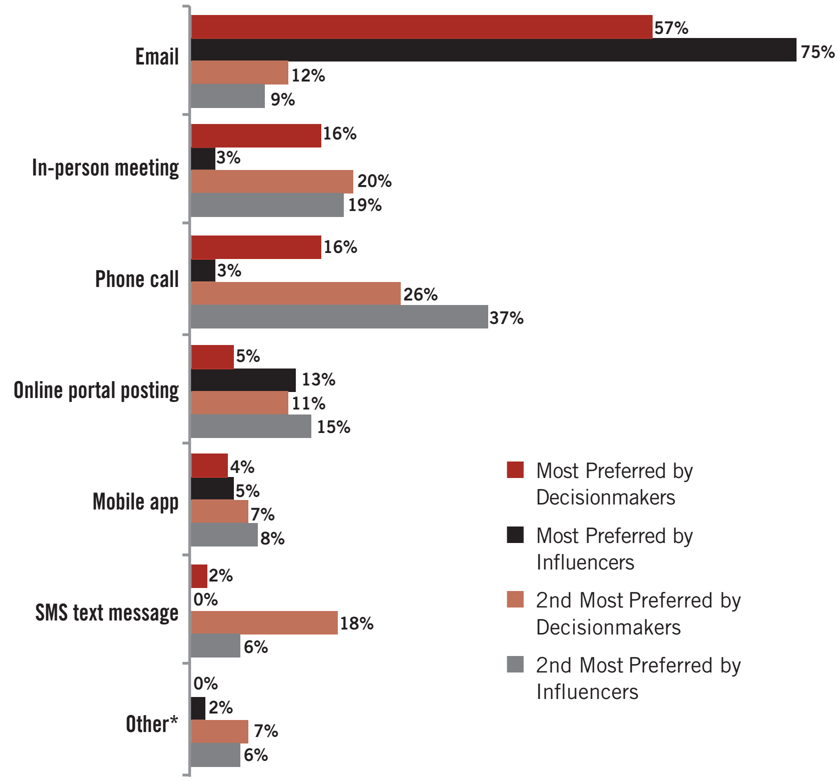
Awareness in the marketplace is likewise correlated with consider-ation and choice. Prospects aware of specific property investments and/or enhancements to the tenant experi-ence — those that are relevant to them and what they care about — are more likely to consider and choose that building over others, accelerating lease-up, reducing vacancy costs and commanding higher rent premiums.

Messaging Matters

At the most fundamental level, effec-tive communication requires a deep understanding of your tenants. What matters to them? What are their pri-orities and objectives? What do they care about?

Take, for example, space attributes. As the “Rankings of Workspace Priorities” table on page 38 demon-strates, tenants identified “having a functional workspace” and “keeping expenses down” as their two most important space-related priorities.

Methods of Communication



**Includes social media updates, hard copy mail and video calls*

Having a “modern, technologically connected space” and having a space that “promotes wellness and work-life balance” come in strong as secondary and tertiary priorities.

In Brightline’s experience, the most effective tenant messages focus on communications, connections and community. Examples include:

- “We provide proactive communica-tion and service delivery.”
- “The process of becoming a tenant is smooth and efficient.”
- “Our employees are advocates for tenants.”

While these messages consistently resonate with all tenant populations, their impact varies across different groups. By examining data in differ-ent ways, you can understand not only what to communicate but to whom, how and why.

Audience Matters

It is also important to distinguish between influencers and decision-makers. The thoughts and opinions of influencers certainly matter, but the decision-maker signs the lease.

When Brightline asks decision-makers how much they communicate with their landlord, nearly half will typically say at least weekly. When we ask how often they would like to communicate with their landlord, the answer is typi-cally less often. From their perspective, more does not mean better. Communi-cating the right information, in the most relevant terms, does. Effective commu-nication therefore delivers information substantively and succinctly, based on what audiences want and need to know. The secret is to say the least but get the most across.

Another distinction that Brightline has observed is the difference between “utilitarians” and “tastemakers.” Utilitarians are focused on functional office space and its related costs. Tastemakers, by contrast, are less concerned about expense and more focused on technology, collabora-

continued on page 41

WIRELESS: THE FOURTH UTILITY

World-Class Properties Turn to Boingo for In-Building Wireless Solutions

DAS, small cell and Wi-Fi networks answer tenants' demand for seamless mobile connectivity

By Doug Lodder, Boingo Wireless

At approximately 800,000 square feet, Manhattan's Oculus/World Trade Center Transportation Hub connects millions of annual visitors with Boingo Wi-Fi and DAS networks.

Managing mobile connectivity has become a cumbersome affair for developers, owners, investors and property managers of office, retail and mixed-use real estate. From soaring mobile data trends to the growing number of devices people carry, winning over the hyperconnected consumer presents more challenges than ever before.

By the numbers, mobile data traffic is forecasted to increase sevenfold by 2021; 85 percent of businesses are projected to support Bring Your Own Device (BYOD) policies by 2020; and 80 percent of mobile traffic is currently consumed indoors. These stats flag two key takeaways for the commercial real estate industry: the demand for seamless connectivity will only continue to expand and the appeal of a property can skew based on its ability to deliver premier wireless connectivity.

Boingo Wireless, the leading Distributed Antenna System (DAS), small cell and Wi-Fi provider, has become a sought-after partner for Class A and B office buildings and other large venues. Buildings turn to Boingo to power wireless networks end-to-end for a superior connected experience. Iconic and high-traffic venues like the newly opened Oculus World Trade Center Transportation Hub in New York and One North Wacker in Chicago rely on Boingo to ensure mobile connectivity.

Located in the West Loop submarket of Chicago's Central Business Network, One North Wacker is an office tower with 51 stories of workspace arrangements and amenities. Boingo fully manages and monitors the DAS network at the property to deliver optimal cellular performance for tenants, regardless of their wireless carrier. This approach allows the building to preserve valuable IT and business resources for other strategic initiatives and core competencies.

A Closer Look at DAS and Small Cells

DAS is a go-to for boosting in-building cellular coverage in commercial real estate. The technology solves cellular capacity and coverage issues by deploying hundreds of small antennae throughout a facility, and integrating them into a cohesive cellular network. These individual antennae can be turned up or down and easily adjusted to provide additional capacity when it's needed most, such as the height of the work day.

DAS is universal in a range of indoor buildings, whether new construction, aging historic buildings or modern architectural structures. The design of the network is crucial to overcoming structural obstacles—for example cement columns—and transporting mobile signals at full strength. DAS technology can also improve emergency response operations at a building as public-safety DAS networks ensure robust communication among first responders.

Revenue also comes into play with DAS via carrier access fees. Boingo has established relationships with all Tier 1 carriers—AT&T, Sprint, T-Mobile and Verizon—and follows a neutral-host business model to ensure maximum network participation, balancing competing interests of the carriers with the goals of a venue. This is important as you never want to underdeliver on providing connectivity because an employee's cell provider is not supported.

Taking a look at small cells, this is a newer technology with similar benefits to that of a DAS, but in many cases, the solution can be deployed with a lower cost of operation. Small cells improve cellular experiences, especially in building areas that are congested or have difficulty receiving signals from cell towers. When deciding between DAS and small cell networks, Boingo can work with carriers to identify which solution is ideal for the venue.

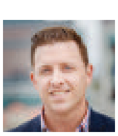
Real estate owners, REITs and property managers will rise or fall based on their ability to deliver first class wireless coverage to buyers and tenants.

Wi-Fi Reimagined

Outside of cellular, skyrocketing mobile data traffic will significantly impact traditional Wi-Fi networks, requiring new technology upgrades that supply more bandwidth and faster speeds. Wi-Fi for voice calling is also gaining popularity in the enterprise as more companies adapt to open office design concepts. Building owners and property managers can address these trends with premium Wi-Fi networks that increase the number of Access Points (APs) and support a combination of speed, density, security encryption and device flexibility.

The Bottom Line

A new era in mobile connectivity has arrived. Real estate owners, REITs and property managers will rise or fall based on their ability to deliver first class wireless coverage to buyers and tenants. Don't be caught in a predicament when customers start complaining about little to no coverage and move over to the competition. Embrace change and respond to it with a strategic wireless business plan.



Doug Lodder *is senior vice president of business development for Boingo's DAS, offload and wholesale businesses. He oversees the strategy and development of Wi-Fi, DAS and small cell networks for Boingo's new and existing venue partnerships in the commercial real estate sector and other verticals. He can be reached at dlodder@boingo.com and 310-586-4023.*

In Touch With Tenants

"Effective property management programs make communications a signature element of the tenant experience."

Michael Broder

continued from page 39

tion, experiential amenities, wellness and aesthetics that impress current clients and employees as well as attract new ones. On average, about 60 percent of commercial tenants are utilitarians; about 40 percent are tastemakers. Both have specific wants, needs and expectations that impact their relocation, renewal and recommendation decisions.

Medium Matters

Almost always, across most audiences, email is the preferred method of communication. The truth is, however, that one cannot rely entirely on email, particularly in dealing with decision-makers. Consider the "Methods of Communication" chart on page 39.

Decision-makers are less likely than influencers to opt for email as the most preferred method of communication, and are more likely than influencers to choose phone calls and in-person meetings as the preferred method of communication.

Although they say they like emails best, more can be said and absorbed by phone or in person. You will need to condition tenants to expect in-person interactions, and will deliver a far superior experience when you do. When you need to communicate by email, make your messages personal, with named recipients. "Dear Tenant" just doesn't suffice anymore.

While mobile apps for commercial real estate are quite popular — 58 percent of all tenants in the aforementioned study said they would be extremely or very likely to use one — they are not yet at the top of most tenants' minds. Tenants see them as an "accessory" to achieving superior service. For example, the most requested feature of a mobile app is the ability to snap pictures of maintenance issues and send them directly to property management.

Communication Is Fundamental

Communication matters, but not just because awareness breeds a higher likelihood of recruitment and retention. Communication is fundamental to good and lasting relationships. Effective communication requires that you understand what you need to say, to whom you need to say it and by what means you need to get the message across.

Commercial real estate employees see email as the easy and therefore preferable option. So do tenants. But just because something is easy doesn't mean it is right. The tenants who are most likely to renew and pay a rent premium are those who have enjoyed the personal touch.

So how do you connect with people who are always connected? You make communications an essential ingredient of the tenant experience. Communication is a two-way street that should be viewed as a service that you provide to your tenants. Shift your thinking from communications as a vehicle to communications as an integral element of the value you provide. ■

By *Michael Broder*, CEO, Brightline Strategies, and principal, Rockerbox, a joint venture with McWilliams|Ballard

Note: For more on this topic, see "Building the Tenant Experience: 'Moneyball' for Commercial Real Estate," Development, winter 2016/2017.

Exclusivity Provisions in Commercial Leases

Exclusivity provisions can give tenants the right to operate a particular type of business as well as prevent other tenants from using their space in certain ways, with lasting implications for both landlords and tenants.

By Steven D. Weber, Weber Law

BEFORE SIGNING A commercial lease, pay careful attention to the exclusivity provision. An exclusivity provision can provide a tenant with the exclusive right to operate a business, and prevent another tenant from using its space in certain ways. An exclusivity provision can also incentivize a tenant by restricting its competitors from leasing space.

The leasing process should begin with the landlord inspecting any existing leases for an exclusivity provision that would restrict new tenants or uses. If existing leases do not have such a provision, and a new tenant desires one, the provision should not go beyond the intended scope, grant more favorable restrictions than intended, or conflict with existing tenants' leases.

From a tenant perspective, an exclusivity provision must be specific enough that the landlord cannot bypass its intent. The tenant should know the scope of any existing exclusivity provisions that it agrees not to violate. While these concerns may seem obvious, even seemingly straightforward language can make it difficult to define an exclusivity provision's scope.

The Winn-Dixie Example

One example of an exclusivity provision dispute played out in several Florida lawsuits involving Winn-Dixie Stores Inc. In a 2002 case, Winn-Dixie's lease contained an exclusivity provision restricting its landlord from permitting other tenants from selling certain products sold by Winn-Dixie. The lease provided that the landlord could not permit other tenants to sell "any staple or fancy groceries, meats, fish, vegetables, fruits, bakery goods, dairy products or frozen foods without written permission of [Winn-Dixie]." The landlord subsequently entered into a lease with 99 Cent Stuff-Trail Plaza LLC, which stated it "shall not operate its premises in a manner which violates any exclusive rights of any other tenant in the Shopping Center . . ." Winn-Dixie filed suit, alleging that 99 Cent Stuff sold products that violated its lease provisions.

Based on expert testimony on the definition of "groceries," the trial court found that the term should include "all food, but no non-food items." The trial court rejected Winn-Dixie's argument that "groceries" applied to a "multitude of non-food items, such as detergents and paper towels." The trial court found "no clear, unambiguous meaning extending the words staple and fancy groceries' to all household products."

Florida's Third District Court of Appeal, however, reversed the trial court's finding. It stated that "to find the plain and ordinary meaning of words, one looks to the dictionary," and that the "commonly recognized definition of the term groceries includes more than just food."

Twelve years later, another court considered the definition of "groceries." In 2014, the Eleventh Circuit Court of Appeals stated that Winn-Dixie filed lawsuits that initially identified 136 stores being in violation of restrictive covenants created by exclusivity provisions. It noted that a number of Winn-Dixie's locations used what it called a "standard grocery exclusive in Winn-Dixie's lease" that prevented a landlord from permitting a tenant to sell "any staple or fancy groceries" without written permission of Winn-Dixie. The Eleventh Circuit explained that the lower court entered an order finding that the term "staple or fancy groceries" was ambiguous, and that it narrowly construed "staple or fancy groceries" to mean "only food items, including non-alcoholic beverages."

In response to arguments from Winn-Dixie that "staple or fancy groceries" includes both food and nonfood items, as well as arguments from the defendants that it only includes food, the Eleventh Circuit stated that "the term 'groceries' appears to admit at least two reasonable interpretations." Nonetheless, the Eleventh Circuit found that, at least in this case, the trial court "should have followed the holding in [the Winn-Dixie case mentioned above] by looking to the dictionary definitions, which instruct that 'groceries' includes food and 'many household supplies (as soap, matches, paper napkins).'"

Clarity Is Vital

Understanding an exclusionary provision should not be given short shrift. Landlords should be wary of conflicts with their existing leases and granting unintended rights to tenants. Tenants should remain alert to ensure that they receive the protection they intended. Given the ambiguities described above, this is not a simple task. ■

By **Steven D. Weber**, founding shareholder, Weber Law

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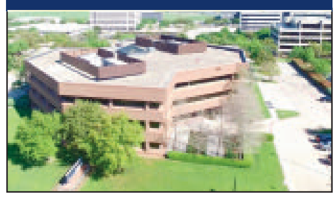
Below is a Sampling of Our Recently Closed Office and Industrial Transactions

CLOSED

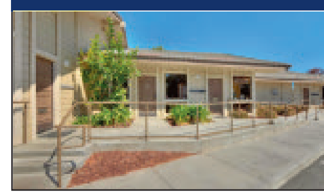
Industrial
Sacramento, CA | 64,654 sf
$4,645,000

CLOSED



Office
Irving, TX | 63,008 sf
Confidential

CLOSED

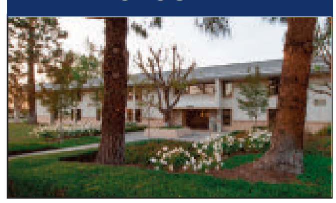


Medical Office
Milipitas, CA | 21,008 sf
$9,350,000

CLOSED

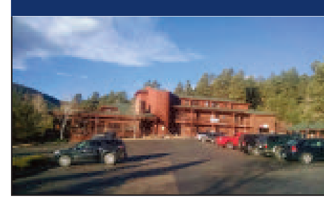
Single-Tenant Industrial
Forest Park, GA | 23,460 sf
$3,000,000

CLOSED



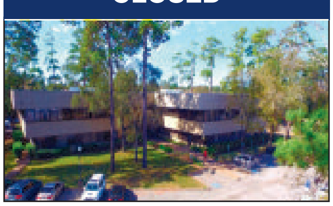
Medical Office
Semi Valley, CA | 24,417 sf
$6,500,000

CLOSED



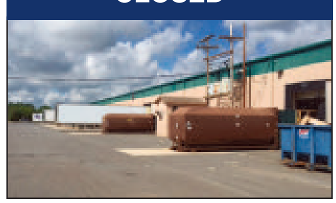
Office
Evergreen, CO | 32,944 sf
$6,250,000

CLOSED



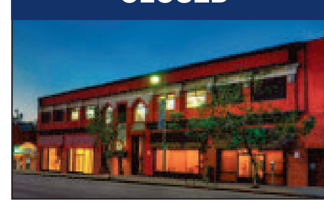
Office
Conroe, TX | 39,735 sf
Confidential

CLOSED



Single-Tenant Industrial
Rockhill, SC | 275,000 sf
$6,675,000

CLOSED



Office
Los Angeles, CA | 31,629 sf
$11,000,000

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Evaluating Cap Rate Investment Strategies

Which cap rate investment strategy generates the best return?

By Mark J. Eppli, Marquette University

IS A HIGH OR a low cap rate property purchase a better investment? As is the case with all such questions, the response is that it depends. It depends on the property's income growth potential, whether the property is being purchased as a value-add opportunity, the level of capital expenditures needed to maintain the income stream, the local market's economic growth potential and other factors.

"Value Investment Strategies for Commercial Real Estate," a paper by **Eli Beracha**, assistant professor, Florida International University; **David Downs**, professor and Alfred L. Blake Chair in Real Estate, Virginia Commonwealth University; and **Greg MacKinnon**, director of research, Pension Real Estate Association, focuses on holding period returns based on property purchase ("going in") cap rates. The authors presented the paper at the Real Estate Research Institute's annual research conference on May 11, 2017.

The analysis uses property-level data that forms the National Council of Real Estate Investment Fiduciaries (NCREIF) National Property Index (NPI). The NPI produces the most widely followed index of commercial real estate performance in the U.S. The NPI data used in the analysis is comprised of 23,981 different properties and 481,052 property-quarter observations that maintain an aggregate property value of $525 billion today. These properties were acquired between 1978 and 2011 and had holding periods that ended between 1983 and 2016.

This research is one of the first analyses using individual property-level NCREIF transaction data, as opposed to aggregated data at the metropolitan or national levels. The researchers were able to examine and compare cap rates for individual properties within and between markets.

NCREIF maintains very limited access to property-level data to keep investment confidentiality and provides property-level data for research purposes only. NCREIF member participants report property income, appreciation and capital expenditures on a quarterly basis. Properties in the NCREIF database used in this study include the four major commercial property types: office, industrial, retail and apartment. (The NCREIF database also includes hotels.) Each property data point also has location identifiers at the MSA and MSA subdivision levels. Overall, NCREIF provides excellent property-level data across all property types over a 35-year investment horizon.

No data set is without some limitations. All NCREIF members are institutional real estate investors; therefore the property investments in the database are of higher average quality — "institutional quality" — and may not be representative of the entire market. Property values are appraisal-based values, not market or sales-transaction values. Extensive research has been completed on appraisal bias in the NCREIF index. While there is a valuation lag effect (appraisal values lag transaction values by a quarter or two) and appraised values may smooth value volatility, there is no evidence that appraisal-based values maintain systematically high or low valuation bias.

Beracha, Downs and MacKinnon's executive summary reveals these findings:

> Our results show that high cap rate (value) properties earn higher returns compared with low cap rate properties, and outperform low cap rate properties on a risk-adjusted basis. The return differential is statistically significant, economically meaningful, and holds across property types and over the real estate cycle. Moreover, the value effect is evident both within and across locations so that, on average, higher cap rate properties within a category of CBSA [core based statistical area] outperform lower cap rate properties from the same CBSAs and higher cap rate CBSAs outperform lower cap rate CBSAs.

In their research, high/mid/low cap rate properties are identified as fol-

Five-year Holding Period Returns

(For properties in NCREIF NPI acquired from 1978-2011)

	High Cap Rate Properties (Highest 30%)	Mid Cap Rate Properties (Middle 40%)	Low Cap Rate Properties (Lowest 30%)
Office	5.48%	5.16%	4.73%
Apartment	11.07%	9.94%	8.95%
Retail	11.09%	10.90%	9.27%
Industrial	9.76%	9.14%	8.20%

Apartment Holding Period Returns Accounting for Local Market Effects

	High Cap Rate MSAs	Mid Cap Rate MSAs	Low Cap Rate MSAs
High Relative Cap Rate Properties	12.01%	11.46%	10.99%
Mid Relative Cap Rate Properties	10.67%	10.22%	9.72%
Low Relative Cap Rate Properties	9.66%	9.06%	9.00%

lows: high cap rates are the highest 30 percent of cap rates, mid-cap rates are the middle 40 percent and low cap rates are the lowest 30 percent. The table titled "Five-year Holding Period Returns" presents these returns for properties acquired between 1978 and 2011. Over the analysis period, office properties underperformed the other property types by about 500 basis points but, more importantly and relevant to the question being addressed, high cap rate property holding period returns uniformly outperformed mid cap rate and low cap rate holding period returns, and usually by a full percent or more. Importantly, these results also hold on a risk-adjusted basis when controlling for holding period standard deviation.

Do these results hold when one takes into account the possibility of value-add properties (i.e., properties with significant capital expenditure needs at the time of purchase)? Here the authors identify capital expenditure levels for high/mid/low cap rate purchases and find that high cap rate office, industrial and retail properties have lower average capital expenditures than low cap rate properties, suggesting that value-add purchases do not explain higher returns for higher cap rate properties.

For apartments, however, higher cap rate properties incurred average capital expenditures of 6.88 percent of property value over the five-year holding period as compared to 4.19 percent for low cap rate properties. While a 2.69 percent higher investment in capital expenditures over a five-year holding period is statistically significant, it is of relatively small magnitude, and too small to suggest that high cap rate apartment properties on average are value-add properties. So overall, the higher cap rate properties are not any more likely to be value-add acquisitions than low cap rate properties. This eliminates the possibility that investments in value-add properties explain the holding period return differences.

Finally, the authors look at high/mid/low cap rate properties in high/mid/low cap rate MSAs. In other words, they address the question: Do high cap rate properties in high cap rate markets outperform low cap rate properties in low cap rate markets? The table titled "Apartment Holding Period Returns Accounting for Local Market Effects" reveals the results for apartment properties; office and retail properties have a similar return pattern. Where high cap rate properties have higher holding period returns than low cap rate properties within high/mid/low cap rate MSAs (look down the columns in this table), high cap rate MSAs also outperform low cap rate MSAs across high/mid/low cap rate properties (look across the rows). For industrial properties, the results are mixed at the MSA level.

In summary, investing in high cap rate properties provides better holding period returns than investing in low cap rate properties, and high cap rate properties provide better returns after adjusting for risk, capital expenditures and local market effects.

However, it is worth noting that NPI five-year holding period returns averaged 8.7 percent at the national level for the period 1978 to 2011 across all properties and markets combined. Fully 7.4 percent of that return was from property income and 1.3 percent was from property appreciation. As U.S. inflation and, similarly, property growth rates have been very modest over the past 25 years — the personal consumption expenditure price index rose just 1.96 percent during that time period — it should not be surprising that property income and, in particular, income from high cap rate properties dominated property appreciation rates, which likely drove the findings in Beracha, Downs and MacKinnon's research. In a future market with unknown inflation and price appreciation rates, especially in desirable gateway cities, outcomes could be different, which should give those investing in low cap rate properties in low cap rate MSAs some comfort. ■

By **Mark J. Eppli**, Bell chair in real estate, Marquette University, and a NAIOP Distinguished Fellow

For more information: "Value Investment Strategies for Commercial Real Estate," reri.org/research/article_pdf/DownsBerachaMacKinnonPaper.pdf.

Negotiating Loan Guarantees and Cost Overruns in Development Joint Venture Agreements

Real estate development joint ventures often require lengthy and complex negotiations regarding construction loan guarantees and cost overruns.

By Eric D. Lemont, Sullivan & Worcester LLP

Eric D. Lemont

REAL ESTATE JOINT ventures (JVs) are long-standing vehicles for joining a developer's local knowledge and operational expertise with an investor's financial wherewithal. In the current climate of capital abundance, real estate JVs with a development and construction component have become more popular as investors seek higher returns.

In addition to having to negotiate all of the traditional JV hot button issues around major decisions, removal, exit rights and distributions, members of a development JV — or a real estate JV with a renovation component — must also wrestle with two additional issues that typically require lengthy negotiation: construction loan guarantees and cost overruns. (Throughout this article, the word "members" is used to refer to the parties to a JV agreement.)

Not surprisingly, the allocation of responsibility for, and treatment of, guarantees and cost overruns in joint venture agreements depend largely on the specifics of the transaction and the relative leverage and sophistication of the members. As a result, hard and fast rules are hard to come by. That being said, negotiations typically resolve themselves within a customary range of outcomes.

Guarantees

With respect to loan guarantees, the developer member or its affiliate is invariably charged with signing the nonrecourse carve out guaranty. This make sense; as the developer is usually the member charged with managing the day-to-day operations of both the JV and the property, it is in a position to commit the willful, grossly negligent or criminal actions that could potentially trigger the guaranty. If an investor member does not explicitly require that the developer member also sign on to the construction loan's payment and completion guarantees, it will usually add language confirming that in no event will it, the investor member, serve as such a guarantor, effectively resulting in the developer signing on to such guarantees.

In exchange for its assumption of the risks associated with serving as the guarantor, some developers will seek a "guaranty fee." This is highly negotiated and party-specific. In the relatively unusual case that it is agreed to by the investor, the fee is often in the range of 0.5 to 1.0 percent of the construction loan amount. More often, developers aim to hedge their guaranty exposure by having the venture reimburse them for any payments they may be required to make under the guarantees.

Investors often will agree to this arrangement as long as the reason for the guaranty being triggered isn't due to the developer's default under the JV agreement. In addition, investors very likely will require language confirming that such reimbursement be repaid solely out of the venture's cash flow and that neither member will be required to contribute additional capital to fund such reimbursement.

Cost Overruns

As the developer is the joint venture member with responsibility for preparing the development budget, selecting the contractor and managing the project's overall development, the investor will similarly look to the developer to fund cost overruns should a project go over budget. While it is unusual for a developer to receive capital contribution credit for its cost overrun payments, it is not uncommon to have such payments treated as a subordinated loan to the venture.

In this case, the developer receives the return of its cost overrun payments somewhere in the JV agreement's distribution waterfall, typically after the investor and developer have received their first return hurdle but before the developer's promote; i.e., its share of the profits above its pro rata capital interest in the venture. In some situations, developers have successfully bargained for the return not only of their cost overrun payments at par but also with agreed-upon interest.

Depending on the specifics of the deal and the applicable JV members, developers can sometimes negotiate to have their obligations to fund overruns capped at a certain fixed amount or percentage of the development budget, following which the investor is charged with funding additional

cost overruns, either on its own or on a shared basis with the developer. If investors agree to this approach, they will, in many instances, cap their own maximum exposure for cost overruns at a certain amount.

Developers may hedge their exposure for overruns in other ways, most notably by arranging for a guaranteed maximum price (GMP) contract, so that the risk of overruns is shifted to the project's contractor. Within the JV agreement itself, developers should seek to limit the definition of a cost overrun so that certain expenses are instead treated as venture expenses shared by the members. Examples include change orders that have been approved by both JV members, tenant improvement costs and leasing commissions incurred in connection with leases approved by both members, as well as costs caused by changes in legal requirements or force majeure events — those that cannot be reasonably anticipated and therefore are outside of the members' control. Savvy developers also make clear in the JV agreement that their obligation to fund cost overruns is subject to their rights within the agreement to first draw down on any contingency line items, and reallocate savings, in the development budget.

A member's failure to fund a cost overrun for which it has responsibility will allow the nondefaulting member to exercise the customary remedies in a JV agreement for failure to contribute additional capital. Such remedies include the nondefaulting member funding the applicable overrun and disproportionately squeezing down the defaulting member's percentage interest in the venture, or making a member loan to the defaulting member. That loan may be secured by the defaulting party's membership interest in the venture. In addition, many investors require that the developer's cost overrun obligations be guaranteed by a creditworthy individual or entity affiliated with the developer.

The above approaches to guarantees and cost overruns are illustrative and by no means exhaustive. But in the context of a negotiation where each side is seeking to minimize its risk exposure at the expense of the other, an understanding of common and counter approaches is useful. At the very least, negotiating a strong position in the joint venture agreement can play a pivotal role in providing the leverage needed to negotiate an "out of agreement" solution should a project go off track. ■

By **Eric D. Lemont**, real estate partner in the Boston office of Sullivan & Worcester LLP

Smart Energy Retrofit in Chicago

Installing wireless pneumatic thermostats controlled by smart buildings software at 311 South Wacker Drive has significantly reduced HVAC energy use and increased tenant comfort.

By Consolato Gattuso, Zeller Realty Group

ZELLER REALTY GROUP'S effort to upgrade the HVAC controls at 311 South Wacker Drive has been nicknamed "the smartest energy retrofit in Chicago." ZRG implemented this project soon after it purchased the building in 2014, to reduce energy consumption and improve the comfort of occupants in this iconic 65-story, 1.4 million-square-foot high-rise in Chicago's West Loop submarket. The project has been a huge success, saving over 30 percent in HVAC energy use and receiving the largest rebate ever granted by Commonwealth Edison Co. (ComEd) for a commercial building, all while improving the comfort of building tenants.

Today, with 20/20 hindsight, the project was a "no-brainer." But it wasn't so obvious at the beginning. ZRG's technical operations team members had to ask themselves quite a few questions: How much will it cost, what are the risks and benefits, and how can we justify the capital expenditure?

ZRG's plan was to reduce operating costs and attract new tenants by upgrading building amenities. At the time of ZRG's purchase, the building had an Energy Star score of 75 out of 100. Clearly, there was much room for improvement. The structure was built in 1990, just as direct digital control technology was beginning to be adopted to control HVAC systems. But this option was probably value engineered out. Instead, the structure was built with pneumatic controls. Over time, 80 percent of the pneumatic thermostats that controlled night setback had been abandoned, destroyed or covered with Sheetrock. This was low-hanging fruit. The ZRG team investigated replacing the pneumatic thermostats, conversion to direct digital controls and wireless pneumatic thermostat technology.

The Solution

As with many things in real estate, decisions quickly headed to the lowest-cost alternative. The wireless pneumatic thermostat technology was expected to be less than half the cost of the other two alternatives. That cost dropped even lower as it became clear that the thermostat conversion was simple and could be accomplished by in-house staff. Once the new thermostats were installed and the ZRG team had data from throughout the building, the team would be able to optimize the operation of all major equipment inside it.

The building equipment now takes commands from the cloud. Two key elements made this solution possible. The first was Cypress Envirosystems' patented wireless pneumatic thermostat technology. The second was JLL's IntelliCommand smart buildings software, which provided cost-effective remote diagnostics and equipment optimization through the cloud. These solutions have already been proven in the marketplace for over eight years, but this deployment was to be the largest in the Midwest.

To convince ZRG to invest the capital, the operations team worked closely with Cypress and JLL to estimate the energy savings potential and applied for utility rebates from ComEd. The

Zeller Realty Group's upgrade of the HVAC controls at 311 South Wacker Drive in Chicago's West Loop submarket has reduced HVAC energy use by 30 percent while improving tenant comfort. The 65-story, 1.4 million-square-foot tower has been dubbed "the smartest energy retrofit in Chicago."

rebate was critical not only to reduce the cost of the project, but also as a validation of the technical approach from an objective third party. ComEd provided a rebate of 50 percent of the project cost, based on projected HVAC energy savings of 26 percent.

The resulting net cost to ZRG was just under $400,000, with an expected payback period of about 22 months. Given these economics, the team did not have much trouble securing the necessary capital approval. The installation work started in December 2014, and 944 thermostats on all 65 floors were retrofitted in about six weeks.

After two years of operation, the retrofit has actually delivered better efficiency than projected, reducing HVAC energy use by 30 percent rather than the originally estimated 26 percent. The payback period was reduced to 19 months. Hot and cold calls from tenants were reduced by 20 percent.

Sharing the News

Given this success, ZRG's operations team is already working to replicate this effort at other buildings within the firm's portfolio. Because of the company's overall commitment to conserving energy and improving the environment, ZRG also made it a priority to share its experience at 311 South Wacker with other real estate professionals. About 70 percent of the office buildings in Chicago still use the same pneumatic thermostats that this building used to have, and they can realize similar benefits in energy savings and tenant comfort.

In February 2017, ZRG invited over 130 asset managers and building managers to 311 South Wacker so they could see firsthand the ease of implementation and the benefits of this solution. ZRG believes that Chicago can soon become the smartest city in the U.S. for energy retrofits of existing buildings. ■

By **Consolato Gattuso**, senior vice president, Zeller Realty Group

The Rise of Commercial Edible Garden Beds

Incorporating agriculture into office and industrial parks can provide multiple benefits for developers, property owners and tenants, including expedited development approvals.

By Lara Hermanson, Farmscape

BY 6:30 ON a warm May morning, farmer **Matt Sandoval** had already picked three varieties of basil on his farm in Northern California. But these crops aren't going to just any farmer's market, and his farm isn't in Napa Valley. It's located in the middle of a business park in Fremont, California, between the Tesla Factory and San Francisco Bay.

The farm originated in 2014 as the brainchild of **Rebecca** and **Rod Fallow,** owners of Swagelok Northern California, an industrial equipment supplier. Their plan was to promote healthy eating while providing the firm's sales and service employees with a stunning garden to combat the company's "all-business" setting. They did so by contracting with the urban farming company Farmscape to remove their company's lawn and add an urban farm.

Farmscape worked with the Swagelok team to develop a space that would be beautiful enough to wow prospective clients yet productive enough to regularly send each employee home with fresh organic produce. Farmscape's design included raised garden beds and a 12-tree orchard featuring mulberries, peaches, pluots, apples and figs. To attract the pollinators necessary for production, Farmscape added a border of purple coneflower, blooming catmint, hot pink salvia and native yellow yarrow. After a few weeks, Swagelok had a healthy population of hummingbirds, ladybugs and butterflies.

After the garden had been installed, Sandoval began planting organic crops suitable for the Bay Area's unique microclimate. These include lettuce, radishes, carrots and broccoli in the winter and tomatoes, peppers and squash in the summer. The tomatoes are the main attraction, and he currently grows 10 varieties. Farmscape harvests all produce and brings it inside for free distribution to the Swagelok staff. Says owner Rod Fallow, "every week, employees receive a harvest of 25 to 50 pounds of fresh, organic fruits and vegetables" to take home and enjoy.

Farmscape replaced a lawn outside Swagelok Northern California's sales and service center with an attractive urban farm that provides employees with organic fruits and vegetables
Farmscape

Farmscape grows edible flowers and other produce at this garden in Mission Bay, California, which also serves as a gathering place for tenants at 499 Illinois Street, a laboratory and office building. The produce is regularly incorporated into the menu at Stem Kitchen & Garden, a restaurant in the building.
Bon Appétit Management Co.

Since the garden's inception, the Fallows have expanded the project twice, and it now wraps around the entire facility, inspiring neighbors to do the same. Across the street, Mentor Graphics, a software business unit of Seimens, added an urban farm in 2015, where it grows fresh food for its cafe.

The Farmscape Movement

In 2008, several colleagues who were dabbling in organic gardening, managing small organic farms or running community-supported agriculture initiatives (CSAs), teamed up to create Farmscape. Since its inception, Farmscape has designed and installed more than 700 projects across California. New projects are now underway in other states. Farmscape's staff has swelled from five to 40 as they manage such disparate projects as the rooftop of Levi's Stadium, lovingly dubbed "Faithful Farm," to the campus of The North Face and Michelin-star chef **Niki Nakayama's** front-yard kitchen garden.

Working alongside construction teams, architects and developers from conceptual design to installation, Farmscape also has an active presence at city council meetings. The company's early involvement helps make residents who might oppose construction aware of the multiple benefits that edible gardens give to the neighborhood and land valuations.

Neighbors are more supportive of a Farmscape development, which helps those developments generate faster city approvals and, ultimately, quicker — and more cost-effective — turnarounds in building and construction. Farmscape CEO **Dan Allen** clarifies, "We work with clients through the full entitlement process, at city council review meetings and question-and-answer sessions with community members."

Once approvals are granted, Farmscape collaborates with the installation teams to build and plant the raised beds. After completion, the company's local farmers maintain the gardens, orchards and vineyards, while also encouraging clients to get their hands dirty during breaks in their workdays.

Return on Investment

Design costs for edible garden beds at an office or industrial park typically range between $5,000 and $25,000, with installation starting at $20,000 and going northward of $500,000 for large corporate campuses. These amounts are akin to traditional costs for landscape projects. However, Farmscape offers plenty of return on investment. As landscape economist **John Harris** told Realty Times, top-quality landscaping can add up to 28 percent to the value of a home, and a similar return can be expected for attractively landscaped commercial properties.

Corporations have confirmed that business is stronger as potential clients request tours of the gardens, which provide a natural setting in which they can conduct business. Additionally, maintenance costs are 25 percent lower, compared to traditional landscaping, as native plants are the focus and maintain longer, natural life cycles. As Rod Fallow states, "water costs for the garden are far less than they were for the grass." Finally, Farmscape can grow 1 to 3 pounds of fresh organic produce per square foot annually, and the company grows thousands of pounds of fresh produce each year at its many small, scattered locations.

A Magnet for Business Growth

Across the Bay at 499 Illinois Street in Mission Bay, another Farmscape garden is in full production. Its produce heads inside to Stem Kitchen & Garden, a farm-to-table restaurant operated by Bon Appétit Management Company, a sustainable corporate dining company. The garden has become a centerpiece of the restaurant, providing tons of food for Stem while functioning as the heart and soul of this approximately 223,000-square-foot building developed by Alexandria Real Estate Equities Inc. A vegetable garden may seem an unusual landscaping choice for a laboratory and office building that houses many leading biotech companies but, as **Jason Beck**, an assistant vice president with Alexandria, points out, "We want to create a healthy and fun environment for our tenants."

Alexandria also has gardens in New York City and San Diego, and Bon Appétit adds gardens to many of its corporate and university cafes around the country. Says Bon Appétit CEO **Fedele Bauccio**, "Having an on-site 'kitchen garden' serves two very important functions: it reminds people where food comes from — the soil, not the grocery store — and it gives our chefs the freshest, most flavorful ingredients possible to spark their creativity." These industry leaders know intuitively that good food makes good places, and Farmscape is happy to bring these projects to fruition. ■

By **Lara Hermanson**, cofounder and principal, Farmscape

For more information, see https://farmscapegardens.com/portfolio

Farm-to-table Dining Goes High Tech at Microsoft

Microsoft's high-tech urban farming project provides employees and guests with thousands of pounds of lettuce and microgreens each year.

By Mark Freeman, Microsoft

THE PEOPLE IN charge of Microsoft's dining services think a lot about food. In particular, they think about how to provide delicious, healthful and sustainable food options to tens of thousands of people every day at dozens of dining venues at the company's Puget Sound campus. Achieving this takes great creativity. Happily, Microsoft is known for thinking outside the box — or, in this case, far beyond the crates of prepackaged food.

Eleven years ago, Microsoft set a goal to serve better food to its employees and guests. Part of this involved what the company called the "culinary revolution," which focused on making food from scratch instead of opening bags of prepared foods, dumping out the contents, then heating and serving them. Such foods are gone forever from Microsoft.

Pyramid hydroponic units provide fresh lettuce for Microsoft employees at cafes on the company's Redmond, Washington, campus.

Photos courtesy of Microsoft

The Ingredient Revolution

This culinary revolution grew into an "ingredient revolution." Employees today are more socially and ecologically conscientious. They want to understand everything about their food: how it's prepared, where it was grown, how the farmers are treated, how the land is taken care of and so on. Microsoft now carefully considers all these issues for every kind of food that comes on-site. The company partners with organic suppliers and farms, prepares and cooks food in front of guests and tries to keep food sources close to home. (Microsoft also has a huge sustainability program for composting and managing dining waste.)

In the early days of Microsoft's ingredient revolution, a few employees suggested installing roof gardens or community gardens, but no viable working model was available. A visit to an annual Seattle flower show introduced the dining services team leaders to hydroponic tower gardens — vertical, water-fed systems that can grow many plants in a small amount of floor space without soil.

From 2013 to 2015, the dining services staff set up towers as part of a pilot program to grow lettuce in the cafes where the greens would be used. The brightly lit grow towers caught everyone's attention. Microsoft employees, visitors and customers were enamored with the plants, asked questions and took selfies in front of the leafy pillars. Chefs pulled lettuce from the grow towers to create salads and other dishes, and employees felt more confident about where their food was coming from. Moreover, Microsoft's software developers soon offered to help automate the care of this on-site food supply.

Romaine lettuce and other greens grow in hydroponic towers maintained and managed with the help of the Microsoft Azure cloud computing platform at one of the company's cafes.

Today, the company uses the Microsoft Azure cloud computing platform to maintain and manage 39 hydroponic towers and 15 pyramid hydroponic units, which together provide about 5,000 growing sites for lettuce for the Puget Sound campus. That adds up to about 15,000 pounds of lettuce and other organic greens a year.

Microsoft also has a large microgreens program that includes 16 hydroponic cultivators inside the cafes. These put fresh, ready-to-pick herbs such as basil, cilantro, arugula and dill within easy reach of chefs. The cultivators grow all microgreens for the cafes (about 1,000 pounds a year) and can go from seed to harvest in just eight days. This extremely short farm-to-table path begins at on-campus nurseries, where all microgreens and lettuces are started from seeds.

High-tech Indoor Agriculture

As a software company, Microsoft applies technology to monitor the urban farms from anywhere on campus. Using data from sensors installed on the hydroponic units, for example, dining services farming staff can measure pH, water flow, humidity and nutrients. The farmers also track light levels and plant growth through video monitoring. A concise, easy-to-use dashboard shows each tower's status, plant ages and overall health. The entire hydroponic system can be managed from a single tablet, smartphone or desktop computer because it's all accessible through the cloud and can be viewed using easily programmed analytics and business intelligence tools.

The Benefits

In addition to providing high-quality produce to chefs and employees year round, the program offers Microsoft several other benefits. Growing produce close to the kitchen compresses the farm-to-table distance from many miles to a few feet. This yields fresher, tastier food and eliminates the environmental impacts of trucking it in. Hydroponic systems also use up to 90 percent less water than in-ground farming, and the little water they use is recycled throughout the hydroponic growing cycle. Kitchen staff also use less water preparing the produce because there is no dirt or pesticide to wash off.

One of the most interesting things about this urban farming project is how readily people at Microsoft got involved. The dining group started small but quickly demonstrated the value of what it was doing, which garnered senior leadership support. Employees continue to provide feedback, and the company's software developers continue to innovate ways that cloud technologies can support growing food on-site. ■

By **Mark Freeman**, senior manager, global dining, Microsoft

The Basics

Who: Microsoft and Mark Freeman, senior manager of Microsoft's Global Dining Services.

What: Organic hydroponic urban farming towers and microgreens trays producing 15,000 pounds of lettuces and 1,000 pounds of microgreens annually.

Where: Microsoft's campus in Redmond, Washington.

When: Ongoing since 2013.

Why: Provides employees with sustainable, responsible, locally sourced and delicious food.

How: Under plasma, LED and fluorescent lights, lettuce and microgreens leaf out in more than 70 hydroponic grow towers, pyramids and urban microgreens cultivators, all managed and maintained remotely through the Microsoft Azure cloud computing platform.

How Many: Started with one urban farmer; seven farmers currently provide greens for a campus with 45,000 employees.

Electric Shuttle Buses Come to Chicago

JLL and Proterra provide the nation's first all-battery-powered electric bus fleet.

By Amanda Tran

IN DECEMBER 2016, the first privately operated zero-emission battery-electric bus fleet began serving the tenants of Aon Center and the dual-tower Prudential Plaza, two of Chicago's largest office properties. Located in the East Loop submarket, the three buildings total approximately 6 million square feet and accommodate 20,000 workers. JLL, the management company for both properties, is leasing 10 battery-powered electric Catalyst buses from Proterra, America's leading manufacturer of battery-electric buses, replacing eight diesel buses it had been leasing.

The new buses cost tenants $2 a ride and make 82 trips each day between the properties and the Ogilvie, Union and LaSalle Street commuter rail stations, which serve 35,000 passengers every month. Proterra estimates that replacing the diesel buses with zero-emission vehicles will prevent the release of 9.8 million pounds of carbon dioxide and 120 million pounds of greenhouse gases over the next five years. They also provide riders with a more upscale experience as they offer leather-wrapped seats, Wi-Fi, USB ports and a mobile app that tracks wait times.

Why Electric?

The owner of Prudential Plaza and Aon Center, The 601W Companies, a private New York-based real estate investor, recently completed an $80 million renovation of Prudential Plaza and is currently renovating Aon Center. **Bryan Oyster**, senior vice president at JLL and general manager of the buildings, says "the old diesel buses that kind of clunked along no longer fit the image of the buildings." He notes that the properties' tenant base has evolved from one that attracted primarily traditional tenants such as law firms and a public utility to one that attracts more modern tenants such as financial, real estate, software and consulting firms. These new tenants and their millennial employees also prioritize sustainability.

JLL leases 10 electric buses like this one from Proterra to provide shuttle bus service for tenants of Aon Center and Prudential Plaza in Chicago's East Loop. Tenants pay $2 for a ride to or from one of three local commuter rail stations. The buses are much less expensive to operate and maintain than diesel vehicles, and emit no carbon dioxide or greenhouse gases.

Matt Horton, chief commercial officer at Proterra, hears the same story from other private property owners. "Beyond the LEED certification, there is a broad recognition that this [battery-electric transit] is a really important way to meet the sustainability objectives of property owners and corporate customers," Horton says. "It is something that their riders or employees are absolutely looking for and expect. And, I think there is growing recognition that an office building's environmental footprint goes far beyond its four walls."

The five-year lease between JLL and Proterra is the first commercial agreement for an all battery-electric commuter bus fleet in the U.S. Incentives from Drive Clean Chicago, a federally funded incentive program aiming to grow the alternative fuel transportation network in the city, played a large role in the deal. Proterra, as owner of the vehicles, will receive incentives worth $1.5 million ($150,000 per bus) from Drive Clean Chicago and will pass those savings on to JLL in the form of lower lease payments for the buses. Horton asserts that the "partnership really made it possible for JLL to go all in on electric and not just electrify part of the fleet [serving these buildings], but to do the whole thing."

Lower Costs

By mitigating the upfront costs of switching to battery-electric buses, JLL has found that the cost of fueling and maintaining the Catalyst buses is lower than that for diesel buses. Oyster says, "We've found that the maintenance is really nothing. We also don't pay any fuel costs, and with the fuel costs eliminated, we're actually saving money. The electric usage is so inexpensive compared to fuel." For total cost of ownership, Proterra estimates replacing a diesel bus with its all-electric model will yield savings of approximately $450,000 ($300,000 in energy and $150,000 in maintenance costs) during the vehicle's lifetime of up to 18 years.

Horton explains how Proterra reduces those costs for its customers. "An electric bus has almost no consumables," he says. "You don't have oil filters and oil changes and all the hydraulic fluids that you would have with a conventional bus. There are about 30 percent fewer moving parts on a battery-electric bus. We replace an incredibly complicated, very finicky diesel engine with a very simple electric drive train that basically only has two moving parts to it."

Although Proterra's primary focus is on the public sector, the company is seeing increased interest from the private sector, particularly office building owners. Horton advises potential commercial clients to fully understand how and where they plan to operate the buses. He explains that Proterra has "a very sophisticated simulation tool that allows us, based on their route profiles, to tell them exactly how the vehicles will perform. We would suggest the customer buy only as much energy storage as they need, so they're not paying for batteries they never use." Between the growing price competitiveness of battery-electric buses and consumer demand for greener transportation, Proterra expects the majority of U.S. bus sales to be electric by 2025. ■

By **Amanda Tran**, a freelance real estate writer and researcher

Ride-hailing Becomes a CRE Amenity

Transportation demand management strategies, which increasingly include ride-hailing services, have evolved from a negotiating tool to an amenity.

By Camille Galdes

IN JUST A FEW years, ride-hailing services have revolutionized how people move around in their daily lives. According to a January 2017 Business Insider article, in more than 500 cities around the world, anyone with a smartphone can now call an Uber car to their location. Similarly, Lyft reaches people in 300 cities across the U.S. These tech-savvy companies allow users to request and pay for rides straight from their phones, enabling users to pick up rides on the go that usually cost less than local cabs. Now that ride-hailing is nearly ubiquitous — and "uber" has become a verb — developers and property managers are increasingly using these services to boost the profile and profitability of their properties.

Using TDM Strategies to Strike a Deal

The tension between a developer's desire to produce a high-density project and a local zoning board's desire to prevent traffic congestion is nothing new. **Justin Schor**, a transportation planner and principal with Wells + Associates, explains that "usually the main reason local jurisdictions have trouble approving higher density development is because of concerns about traffic congestion. In many cases, the solution is implementing a transportation demand management strategy to offset the traffic impact." These strategies come in many different forms. Whether it involves providing shuttle services, subsidized transit passes or ride-hailing services, a TDM strategy helps developers meet the transportation needs of incoming tenants without negatively impacting existing traffic flows or parking.

Camille Galdes

Schor says office developers were among the first to offer TDM strategies, including ride-hailing, to make their sites more accessible. Since suburban office buildings have struggled with high vacancy rates in the wake of the Great Recession, developers have used these strategies to satisfy zoning boards as well as attract the growing number of tenants who want connectivity and access to urban amenities.

In Nashville, the Tri-Star Sports and Entertainment Group sought to expand its office building on Music Row. The company, which manages A-list celebrities, planned an expansion that would leave it 23 parking spaces short of the local parking requirement. The Metro Board of Zoning Appeals approved the project when TriStar proposed using ride-hailing as a TDM strategy. In exchange for eliminating the 23 park-

Parkmerced, a growing suburban residential development in San Francisco, has partnered with Uber and the local transit system to provide a variety of transportation options for residents. Thirty percent of the community's residents do not own a car, and 44 percent use ride-hailing or transit to commute to work.
Rendering courtesy of Parkmerced

ing spots, TriStar agreed to sign a contract with a ride-hailing company like Uber or Lyft to cover the commuting costs for 23 of its employees. The board was satisfied, believing ride-hailing would serve the building's transportation needs and prevent any negative impacts on nearby traffic or parking.

Ride-hailing: The New Amenity in Multifamily Properties

While office buildings have begun to incorporate ride-hailing into their TDM toolkit, Schor says that "people are realizing that the commute starts from home, so multifamily buildings are starting to do TDM as well." Developers of multifamily real estate are finding creative ways to integrate ride-hailing services into their properties.

> **"As more office and multifamily properties position ride-hailing as an amenity, like a gym or conference center, others will feel they need to do so to stay competitive."**
>
> *Camille Galdes*

Parkmerced, a 3,200-unit suburban residential development in San Francisco, is staying competitive by partnering with Uber and the local transit system to support the everyday transportation needs of its 10,000 residents. As part of its plans to triple the number of apartments and residents and add an estimated 400,000 square feet of commercial space over the next 20 years, Maximus Real Estate Partners, the owner-operator of ParkMerced, launched the community's Car-Free Living Program in May 2016.

Stephen Linaweaver, who heads the program from Parkmerced Labs, the innovation arm of Maximus, says the "focus of the program is to meet existing resident demand and attract new residents. We found it's a unique differentiator from other properties." The program provides participants with a $100 monthly transportation credit per apartment to put towards a Clipper card — the local transit card, which can be used for bus and train services — or toward Uber rides. Parkmerced also struck a deal with Uber to cap its UberPool rates for all residents between the community and the three nearest public transit stations at $5.

Over 75 percent of all new residents have enrolled in the program, which is already reducing demand for parking. Linaweaver says that at Parkmerced, where homes are rented separately from parking spaces, "occupancy rates have increased by 9 percent, while demand for parking has remained flat." The program does not require residents to go car-free, and Linaweaver says that it has reduced car usage even for residents who own a car, by curtailing their need for a second car or enabling them to limit personal car use to certain times, like weekends. Based on a recent internal transit survey, 30 percent of Parkmerced households do not own a car, and 44 percent use ride-hailing or public transit to commute to work.

Linaweaver believes the Car-Free Living Program has helped the property attract higher rents, noting that Parkmerced has experienced a 5 percent increase in rental rates since the start of the program, while the broader San Francisco market has seen a slight decline. Parkmerced plans to expand the program in the near future to support longer trips by partnering with a car-sharing service like ZipCar or Car2Go.

For some properties, educating people on existing transportation options is as important as creating new ones. Developments like the mixed-use district known as Mosaic near Washington, D.C., in Northern Virginia have supported connectivity for tenants and patrons by offering TransitScreen, a proprietary dashboard service that displays real-time data for all nearby transportation options. (For more on

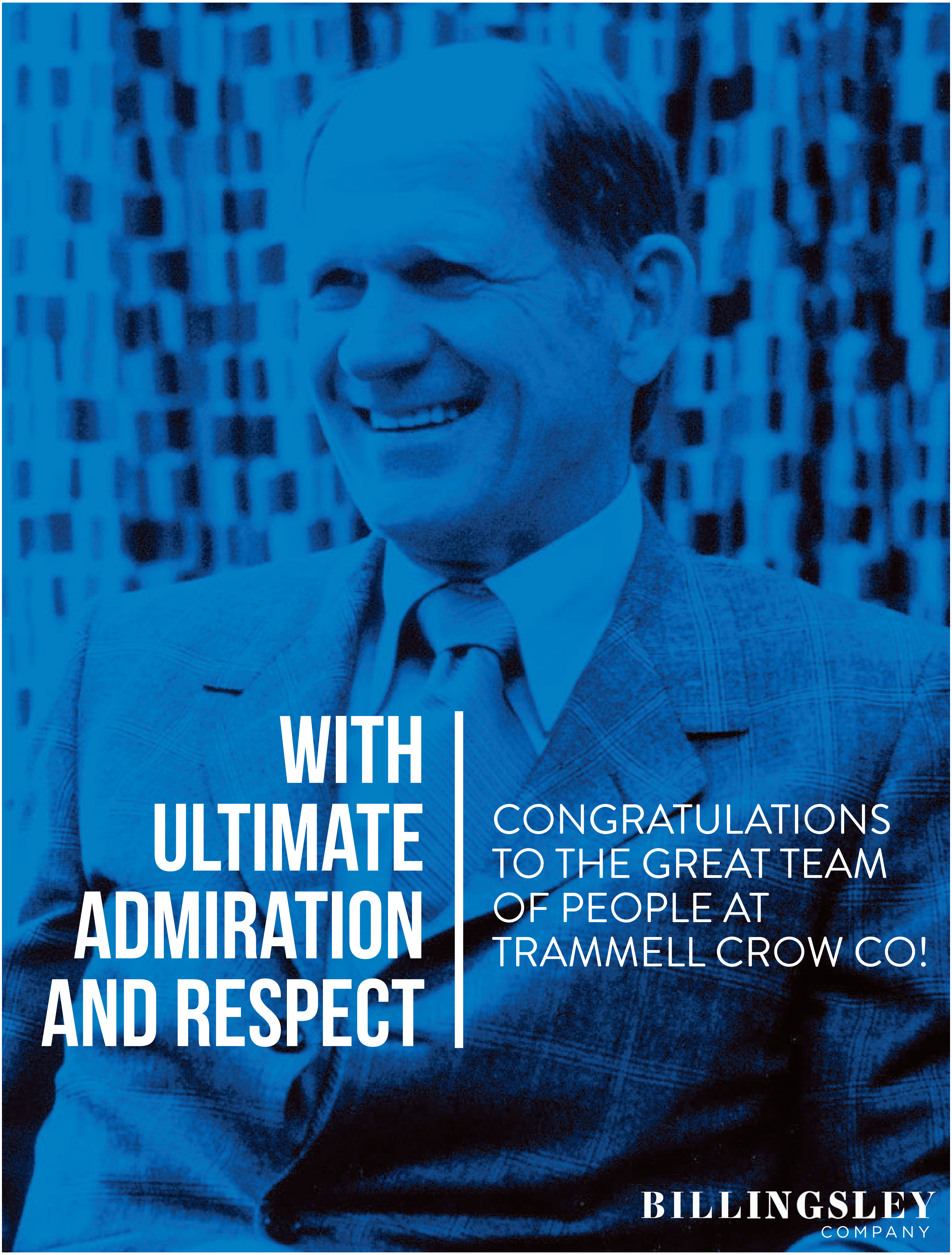
The "Uber waiting room" at The Vintage, an apartment building in Washington, D.C., offers residents a place to wait for their rides.

TransitScreen, see "Displaying Real-time Transit Information: An Update," Development, summer 2017.)

The Vintage, an apartment building in Washington, D.C., completed by Valor Development in May 2017, uses a TransitScreen on its main level to show residents their transportation options. The Vintage has taken this amenity one step further, by positioning the screen in an "Uber waiting room," a comfortable space where residents can wait for their rides. **Joe Bous**, a principal with Valor, says the room was conceived when Valor "considered how people come and go from buildings; they stand behind the glass looking out because they don't want to be cold." At the Vintage, residents can relax on a couch by a fireplace while they wait for their Uber or Lyft car to arrive.

According to Schor, "what started as a response to regulations is now what buildings are offering because the one across the street is offering it." As more office and multifamily properties position ride-hailing as an amenity like a gym or conference center, others will feel they need to do so to stay competitive. TDM strategies, which increasingly include ride-hailing services, have transformed from negotiating tool to amenity. Ride-hailing is simply the latest example of commercial real estate's ability to innovate and respond to people's changing needs and attitudes. ■

By **Camille Galdes**, an urban policy writer and researcher


WITH ULTIMATE ADMIRATION AND RESPECT
CONGRATULATIONS TO THE GREAT TEAM OF PEOPLE AT TRAMMELL CROW CO!
BILLINGSLEY COMPANY

Trammell Crow Company

TCC restored and redeveloped Denver's historic Union Station into a LEED Gold-certified mixed-use multimodal transportation project that has become a bustling 24-hour community gathering place since it was completed in July 2014.
All images courtesy of TCC

Timeless, Innovative, Entrepreneurial

This year's award winner has long been a pioneer in the development of top-quality commercial real estate assets.

By Ron Derven

ICONIC REAL ESTATE developer **Trammell Crow** built his first warehouse nearly 70 years ago in Dallas. From that simple beginning, he established a company and a legend that continue to this day. Crow initially created Trammell Crow Company (TCC) as a series of partnerships in Dallas, then across the country, with other entrepreneurial-minded developers. In 1991, he brought that loose confederation of partnerships together into a private C-corp, a move that transformed TCC into a diversified real estate company. The firm went public in 1997. In 2006, CBRE, the world's largest commercial real estate services firm (based on revenues), purchased TCC for $2.2 billion.

Today, TCC is an independently operated subsidiary of CBRE. It is one of the largest commercial real estate developers in the U.S., with $5.9 billion of projects under construction, $5.9 billion in the pipeline and some 219 employees in 16 field offices overseeing development projects in 30 states.

For its stellar performance, financial consistency and stability, ability to adapt to market conditions and strong support of NAIOP and the local communities it serves, NAIOP has named Trammell Crow Company its 2017 Developer of the Year.

"We are honored to have our work recognized by the leading real estate industry association," says **Matt Khourie**, CEO of TCC. "We would not be here without our development executives, who are carrying on Trammell Crow's legacy by developing the best projects on the best sites in the best markets. We are also grateful to the communities in which we have developed, our investor partners, occupier clients and, most of all, all of our team members."

Khourie has been with TCC for much of his career. Starting as a retail leasing agent in Houston, he later became a shopping center developer and then a developer of all types of TCC assets, which include office, industrial, multifamily, and health care buildings as well as retail space. In 2004, he became TCC's central region president. Three years after CBRE purchased TCC, Khourie was selected to head CBRE Global Investors, CBRE's real estate investment management subsidiary. In 2016, he was named CEO of TCC. "I was very excited by this opportunity, because my first love in the real estate business is development," he says.

Entrepreneurship and Partnership

Although it's been many years since Trammell Crow himself headed the company, Khourie stresses that a spirit of entrepreneurship and partnership continues to thrive at TCC. "It is a culture at the foundation of our company," he explains. "There is a strong bond of partnership among all of our 16 offices. When one office needs expertise from another, our team members are always willing to assist."

The culture of entrepreneurship is also stronger than ever, according to Khourie. Much of this has to do with how the company is structured; it is centered around its business units. This enables local professionals in each of TCC's offices to refine their own strategies, and to uncover and make the most of the best real estate opportunities that their markets offer. TCC now has local business units in Atlanta, Austin, Chicago, Dallas, Denver, Houston, Los Angeles, Newport Beach, Philadelphia, Phoenix, Pittsburgh, Portland, St. Louis/Kansas City, San Francisco, Seattle and Washington, D.C.

Trammell Crow Company's Impacts On Local Communities and NAIOP

Trammell Crow Company makes its biggest impact on the local communities in which it works through its contributions to the built environment. It uses best-in-class practices to create developments that address the economic, environmental and civic needs of the community.

At the same time, TCC's headquarters and all of its offices are involved with their local communities at a granular level. TCC supports many national charities and its employees are actively involved with more than 155 local community and civic organizations. Employees have done everything from selling Christmas trees to raising money to send at-risk youth to summer camps, to participating in a long-distance bike ride that benefitted the Leukemia and Lymphoma Society.

TCC's Dallas-Fort Worth office also transformed a 2,000-square-foot laundromat into classroom space for an overcrowded YMCA preschool. The TCC development team designed and constructed three new classrooms with built-in shelves for storage, added windows to bring in natural light and painted all of the rooms in bright colors. Their work increased the preschool's capacity by 45 percent.

TCC is also a strong supporter of NAIOP, which it views as the nation's leading real estate trade association. It encourages its employees not only to become NAIOP members, but to also take on leadership roles in the association. Sixty-one TCC employees are currently members of NAIOP; four TCC executives are members of NAIOP chapter boards:

Scott Krikorian, senior managing director, is currently president of NAIOP North Texas.

Thomas A. Bak, senior managing director, serves on the board of NAIOP Inland Empire in California and is a former NAIOP SoCal chapter president.

Grady Hamilton, principal, sits on the board of NAIOP Chicago and is a former chapter president.

Campbell Smith, principal, serves on the board of NAIOP DC | MD.

Other former chapter presidents include **Aaron Thielhorn**, managing director (NAIOP Houston), **Denton Walker**, senior managing director (NAIOP North Texas) and **Kirk Olsen**, senior vice president (NAIOP Oregon). ■

From Business Unit to Investment Committee

Khourie describes how the company works with its local units by highlighting a recent project in Austin, Texas. In 2008, the city accepted proposals from developers to redevelop approximately 4.4 acres in downtown, the former home of Austin's Thomas Green Water Treatment Plant. The local TCC office saw the site as an excellent opportunity to revitalize the area and went to work on a plan.

After winning out in the RFP selection process over four other national developers, TCC entered into negotiations with the city. The negotiation process included several presentations to the TCC Investment Committee. It concluded in 2012 with the city's final approval of a conceptual master plan that included four separate towers totaling over 1.8 million

The four-phase master-planned redevelopment of the Green Water Treatment Plant, led by TCC, is bringing new vibrancy to downtown Austin.

square feet, as well as the terms of the development agreement.

TCC's Investment Committee is comprised of TCC's six-member Executive Committee, as well as its risk management, financial management and legal leaders. The committee's review process also includes peer review from a subject matter expert located in a different business unit who is not directly associated with the project being evaluated.

Getting an investment opportunity approved by the Investment Committee is a rigorous process, Khourie explains. The committee examines each proposed project from every possible angle: supply-demand dynamics, construction costs, debt and equity agreements, and more. The local team often appears before the Investment Committee several times to answer questions before a project is approved. "We don't want to miss anything," stresses Khourie. "We aim to protect our stakeholders, including our investor partners and our firm."

Once a development concept is fine-tuned, TCC presents it to its financial partners through its Capital Markets Group, which connects institutional capital to the firm's internal resources and product pipeline. TCC has relationships with 36 lenders and 32 equity partners.

Following the Investment Committee's approval of the master plan and city agreements for the Austin Green Water Treatment Plant project in 2012, the Austin team has returned to the Investment Committee on numerous occasions for approvals related to the individual projects within the larger site.

Northshore, the first phase of this mixed-use project, was completed in 2016. The 38-floor tower, developed in partnership with the Hanover Company, consists of 439 apartments and 50,000 square feet of office and retail space. 500 West 2nd Street, the second phase, was completed in 2017 and is 94 percent leased. The 29-story tower consists of approximately 490,000 square feet of office space and approximately 9,000 square feet of ground-level retail space.

The third phase of the project, known as Austin Proper Hotel & Residences, is a 35-story tower that broke ground in September 2016. Upon completion in the summer of 2018, it will consist of a 244-room boutique hotel and 99 luxury condominiums. The fourth and final phase is currently in design; the current program calls for office and retail space as well as luxury multifamily units.

Each of the two completed towers is owned by TCC, with separate joint venture equity partners and construction lenders. Austin Proper, however, is being developed by TCC but is owned by a separate entity controlled by The Kor Group.

"In the case of 500 West 2nd, we were fortunate to land one of the best technology tenants in the country to occupy the building," explains Khourie. "In fact, this tenant has already taken additional space in the building, and now leases 60.5 percent of the project."

Khourie adds that CBRE has a role in each of TCC's projects. TCC focuses on identifying investors and developing the project. It then relies on CBRE for co-investment capital and to handle other activities, including marketing, leasing, property management, and investment sales.

Conservatively Structured Deals

Although TCC has the backing of CBRE, the development company remains extremely conservative when it comes to the financial structure of its real estate development agreements.

Ontario Innovation Center in Ontario, California, exemplifies TCC's ability to develop highly specialized build-to-suit products as well as best-in-class speculative ones. TCC crafted a sophisticated land acquisition and build-to-suit lease transaction to develop the 909,000-square-foot, two-building industrial development, which was completed in April 2016.

"We believe that a judicious capital stack is the best approach in this cyclical industry," explains Khourie. "We and our investor partners will typically invest anywhere from 35 to 50 percent equity in each of our deals. That is on the high side relative to what others in the industry do, but it allows us to get favorable debt terms with our lenders. The loan terms we are able to achieve allow us to ride through a cycle, should a down cycle hit."

Finding the right partner is critical to structuring a deal properly, notes Khourie. "You need equity partners and debt partners who can sustain a project through a cycle and also have a long-term perspective. We have learned that if your partners have a short-term focus while you have a long-term perspective, conflicts can arise during a market downturn. We make sure that our partners are like minded and have the ability to sustain through a down cycle."

Another critical element in financing projects is CBRE's top-quality research. TCC uses CBRE Research for market intelligence and other insights to help it make informed projections and strategic decisions.

Ability to Adapt

While TCC's skill in adapting to market conditions may begin with a rigorous analysis of project viability and the creation of a conservative financial structure, it does not end there. TCC understands that to effectively adapt to market conditions, a project must also be environmentally sustainable and include the features that today's tenants and investors are demanding.

"We are a member of the U.S. Green Building Council. We have 34 LEED-accredited professionals on staff. We have developed 40 million square feet of projects that are LEED certified, seeking LEED certification or have sustainable elements, so we view ourselves as a leader in sustainability," says Khourie. For example, in Denver, TCC's Riverview at 1700 Platte office building will feature the first rain garden in the metro Denver area.

Rain gardens are environmentally sound solutions to managing urban stormwater runoff by mimicking the natural absorption and pollutant removal abilities of a forest or meadow in an urban setting. The rain garden will help the project meet its stormwater quality requirements while giving the building occupants the benefit of a natural, low-maintenance, landscaped element. In addition, the building will feature a green wall on the north side of the lobby.

This two-story-high, approximately 420-square-foot planted wall will provide a unique architectural feature while also improving air quality, creating an acoustic buffer and beautifying the common area.

TCC also adapts to market conditions by developing buildings that possess cutting-edge technological features combined with timeless design. "We think innovatively, but act practically," says Khourie. Last year, TCC completed construction of a 1.7 million-square-foot mixed-use campus for TechnipFMC (formerly FMC Technologies). As part of this project, TCC managed the implementation of the Construction Operations Building Information Exchange (COBie) standard using a project-specific execution plan.

The process involved capturing and validating extensive design schedule and equipment data for eight facilities and then importing the data into an integrated workplace management system (IWMS) prior to substantial completion. The successful implementation of the COBie standard provided TechnipFMC's facilities team access to secure and reliable as-built floor plans, equipment lists, product data sheets, warranties, spare parts lists, and preventive maintenance schedules — information essential to managing a large campus in a safe, reliable and cost-efficient manner.

Diversity and Inclusion

TCC believes adapting to market conditions also requires strong diversity and inclusion efforts to ensure that the company reflects the changing mix of tenants and communities it serves and to bring the best people in the industry, with diverse thinking and new perspectives, into the company. TCC has initiated four programs in this area:

1) A Diversity and Inclusion Initiative. This initiative emphasizes making the company a better place to work for all employees, a place where everyone feels they have an equal opportunity to be part of the fabric of the company and to play a role in shaping its future.

2) A Professional Women's Network. The Women's Network connects and advocates for professional women throughout TCC. Its goal is to create a sense of community for all female employees, provide opportunities for professional development through mentorship and networking, and recruit and empower women to create an atmosphere in which women can thrive.

3) The Ambassador Program. This program is structured to encourage more participation by TCC team members within affinity groups, those linked by a common interest or purpose, throughout the real estate industry. Ambassadors have participated in LGBTQ organizations and clubs, Commercial Real Estate Women (CREW), veterans and military employee groups, NAIOP's Commercial Real Estate Diversity Roundtable and internal groups, including CBRE's African-American Network Group and Women's Network.

4) Impact Circles. An offshoot of the Professional Women's Network, this program encourages smaller groups of women throughout the company to participate in monthly phone calls during which they discuss various topics, including best practices and career paths.

Trammell Crow, Founder, Trammell Crow Company

"Everything that happens to me in my life is my own responsibility, solely and absolutely my own responsibility. I can ask and get help or assistance, or support. But ultimately and absolutely, it's all up to me. I can stumble or stride — both are up to me. I can succeed or fail … it's all up to me. I can prosper or lose … it's all up to me. Now life doesn't guarantee you everything, no matter how you try, but you'll only get the best that life has for you when you understand and absolutely observe that … It's all up to you."

On the Horizon

Looking ahead, Khourie expects greater advances in both technology and sustainability, which will challenge TCC to keep pace with evolving tenant and investor requirements and industry best practices.

"Another important trend that we need to keep up with is the growing importance of data," he asserts. "Trammell Crow made a lot of his decisions based on 'gut feel' but today we use real data to drive our decisions on where to invest money and what product types to buy or build. Data is the future of the real estate business."

Matt Khourie has spent much of his career with Trammell Crow Company and CBRE. Looking back, he says, "The choice I made 37 years ago to join this company has brought opportunity, growth and personal fulfillment. I could not have picked better partners and better teammates to spend my life with. TCC has a truly special culture that has taken decades to create: It is a culture that respects the company, the individual and the communities in which we work."

Bob Sulentic, chief executive officer of TCC's parent company, CBRE, adds, "Trammell Crow Company's continued success is driven by a talented team, led by exceptional leaders who build great projects for tenants and owner-occupiers while generating outstanding returns for capital partners." ■

Ron Derven is a contributing editor to Development magazine.

Midtown21, a LEED Gold-certified 21-story, 373,000-square-foot office building in Seattle's Denny Triangle neighborhood, was completed in December 2016. It features a large great room that offers a warm, welcoming meeting area with a fireplace, expanded Wi-Fi and concierge service.

Trammell Crow Company Timeline

1948
Trammell Crow establishes Trammell Crow Company (TCC) and develops his first commercial building, a warehouse in the Trinity Industrial District near downtown Dallas.

1950s
Crow introduces speculative development to Dallas and becomes the largest builder in the Trinity Industrial District.

1959
TCC develops the 14-story Hartford Insurance Company building, TCC's first office building, in downtown Dallas.

1968
TCC breaks ground on Embarcadero Center in San Francisco.

1971
Forbes magazine names Trammell Crow the largest private real estate operator in the U.S.

1972
TCC develops the 40-story Bryan Tower, the company's first skyscraper and the first in Dallas built by a single developer.

1984
TCC develops the Trammell Crow Center, the first commercial project in the Dallas Arts District.

1991
The company makes a strategic decision to separate the ownership of real estate assets from its service and development business, making the final shift from a partnership to a corporate structure. The move transforms TCC into a diversified real estate services company.

1997
TCC goes public, raising $93 million in its IPO on November 25.

2001
The firm is reorganized to provide customers with focused and dedicated services through its Global Services Group and Development and Investment Group.

2002
TCC begins developing mixed-use/residential projects under the High Street Residential brand.

2006
CBRE acquires TCC for $2.2 billion as a wholly owned but independently operated subsidiary of CBRE. TCC completes 2000 Avenue of the Stars, a 775,000-square-foot mixed-use office project in the Century City area of Los Angeles.

2007
TCC forms national task force to integrate sustainability and green building practices and processes into its core development business. During the next five years, TCC forms 10 strategic capital programs and funds targeting the development and acquisition of more than $7 billion of industrial, office, retail, residential, student housing and health care related product.

2012
TCC officially launches its Capital Markets Group, connecting external investment goals to internal resources and pipeline.

2016
Commercial Property Executive ranks TCC as the No. 1 development firm in the U.S. for the fourth consecutive year.

2017
NAIOP names TCC its 2017 Developer of the Year. ■

ACCELERATING OPPORTUNITIES

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radius population
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CRE Development Opportunities
In Public-private Infrastructure Partnerships

Plenary Edgemoor Civic Partners, a consortium of Plenary Group and Edgemoor Infrastructure & Real Estate, is developing the new Long Beach Civic Center, a $520 million design-build-finance-operate-maintain project that will replace an old city hall and provide new offices for the Port of Long Beach as well as a new library, a retail marketplace, a revitalized public park and more.

Plenary Edgemoor Civic Partners and SOM Architects

By James M. Mulligan and Andrea Austin, Husch Blackwell, LLP

FROM ITS EARLIEST colonial days to its reign today as the world's largest economy, the U.S. has seen tremendous evolution in how it develops its infrastructure: from the bones of its communities, to connections between its population centers, to the very buildings it constructs to serve public needs. Approaches to financing and delivering the nation's infrastructure are more dynamic now than ever, with renewed focus on how both the public and private sectors can contribute to infrastructure development.

This article explores the nature of public-private infrastructure partnerships and highlights changing opportunities for private commercial developers in providing the infrastructure that U.S. communities depend on for continued economic growth.

Historical Perspective

For much of the nation's history as an agrarian society, when a community needed a bridge or road, private citizens stepped up to supply the need, either as a communitywide endeavor or by a private entity building the infrastructure and then charging tolls to recoup its investment. That approach was no match for the demands of an increasingly industrialized society and nationalized economy. Fast-forward to the 1950s, when the imperative was clear for one of the nation's most significant taxpayer-funded infrastructure investments: President **Dwight D. Eisenhower's** interstate highway system. Symbolically and practically, federal highways reflect an aggressively optimistic, bold vision for the nation's growth and

Public-private partnerships are emerging as a mechanism that marries the funding of public facilities like courthouses, libraries, government offices and more with private commercial development.

a widely shared belief, at one point in time, that government alone could competently deliver the infrastructure its citizens needed. And, in fact, it did.

It's difficult to imagine such a bold vision for infrastructure enjoying broad support in today's political environment. Peoples' belief in government as a force for bettering their communities and competently serving their needs is strikingly low. This skepticism has translated into dwindling support for broad-based taxes to even maintain existing infrastructure, let alone invest in significant new infrastructure.

Recent years have witnessed shrinking budgets at the federal, state and local government levels that have challenged the public sector's ability to finance the necessary upgrades to obsolete infrastructure or to develop the new infrastructure needed by a technologically advanced nation. Partially as a result of this ever-widening gap between infrastructure needs and limited available funding, the public sector has increasingly explored new ways to partner with the private sector to design, build, finance, operate and maintain the nation's infrastructure. (See "Innovative Financing for Roads and Highways," Development, spring 2017.)

The Basics

Public-private partnerships (P3s) are a model for delivering public infrastructure that is currently enjoying a surge of attention, interest and creativity in the U.S. (They are already quite common in Europe, Australia and Canada.) They represent a long-term contractual relationship between the public and private sectors in which a private sector entity typically designs, builds, finances, operates and maintains a facility intended for a public purpose (a road, bridge, utility, port, parking garage, etc.), in exchange for a payment stream during the operating period derived from user charges, guaranteed payments from a public sector source or, often, both.

Some refer to any form of government involvement in private development — including tax increment financing districts (TIFs), special purpose quasi-governmental district financing and economic development incentives — as a P3. While it's true that the private and public sectors must work together in those endeavors, this reflects a limited understanding of what constitutes a P3. The key characteristics of traditional P3s include the following:

> "A key benefit of P3s is **the private sector's ability to raise capital.**"
> *James Mulligan and Andrea Austin*

A Public Facility to Serve a Public Good. The goal of a P3 is to provide a public facility, one that will be used by and for the benefit of the public. It's a facility that traditionally government would likely have funded and operated completely on its own, if it had the necessary funding and other resources. Public ownership of the facility is typically a key component of P3 structures. No matter how long the private sector may operate it, the facility remains under public ownership.

Design, Build, Finance, Operate and Maintain (DBFOM). From start to finish, in a P3 the private sector is typically responsible for every stage of delivery and will address most, if not all, DBFOM components. While many public entities are accustomed to using design-build strategies to help streamline construction projects, and some may privatize certain operations and maintenance (O&M) services, P3s are far more complex because they contemplate all such accountabilities in a single relationship and transaction.

Life Cycle Delivery System. Aligned with their DBFOM accountabilities, private sector entities are typically obligated to operate and maintain the public facility they contract to build over the course of several decades. They can't walk away when the project is substantially complete. Rather, private sector partners have to achieve certain performance standards throughout a facility's operation and, again, at the end of the contractual term when they hand a facility back to the public entity.

Long Term and Large Scale. Most P3 projects endure for 25 to 50 years or longer. This long term is typically necessary to obtain workable financing and to achieve maximum value. Given the complexity of these contractual arrangements, many in the field believe it's difficult to scale a P3 for projects valued at less than $60 million. Nonetheless, some smaller cities and private sector players are working creatively to achieve similar value for deals in the $25 million to $50 million range, which would make P3s a more realistic option for far more regions and facilities, particularly in smaller and/or older cities across the nation.

Risk Transfer. The onus is on the private sector in a P3 to carry virtually the entire risk inherent in designing, building, financing, operating and maintaining a public facility, from design until the project is handed back to the public sector. Estimating errors and construction delays? The private sector owns them. Construction defects? They own those too. Not as many drivers paying tolls, or as many students enrolling in housing, as anticipated? That's on the private sector, except when an availability payment model is involved, as discussed below. Equipment failures before the end of their useful lives? More expensive to maintain than expected? The private sector is on the hook for all of that, except, potentially, in the case of supervening events.

Private Sector Capital. If the public sector had all the funds needed up front to build and maintain the necessary infrastructure, P3s would be less enticing. But since it doesn't, a key benefit of P3s is the private sector's ability to raise capital. Will they demand a return on investment for use of private capital? Of course they will. But arguably, P3s shouldn't go forward unless such a delivery model, over time, provides better value to the public, even when one considers the private sector return on investment.

The private sector recoups its return of and on invested capital through some form of periodic payment over the operating term, either from the revenues produced from the facility (demand-risk payments), usually some form of user fees, or from the public entity in the form of guaranteed payments over the term (availability payments), as long as the facility is available for use by the public entity. Often, the revenues are a combination of these forms of payment.

Public-private partnerships offer several key advantages, including the following:

Life Cycle Maintenance. Maintenance needs get short shrift in nearly every public entity's budget, and public facilities are starved for the kind of investment required to keep them operating in the condition citizens expect but are often unwilling to pay for. Over decades, deferred maintenance can render a building, bridge, school or other public facility obsolete and virtually unusable, well before it should have reached the end of its useful life.

Three P3 Projects

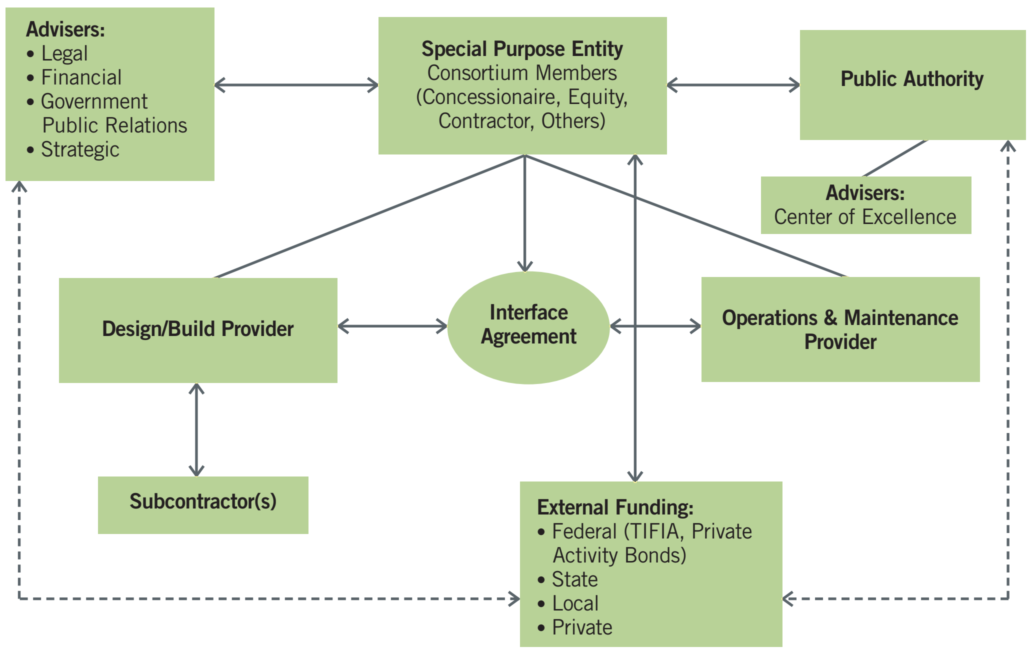
	The University of Kansas Central District Project	Denver International Airport Main Terminal Redevelopment	UC Merced 2020
Location	Lawrence, Kansas	Denver, Colorado	Merced, California
Description	When the University of Kansas sought to expand its growing campus, it utilized a P3 delivery method for the development of a 55-acre campus, referred to as the Central District. The initial phase of the Central District master plan includes developing, financing, building, operating and maintaining a 285,000-square-foot Integrated Science Building, a 26,500-square-foot student union, 1,250 beds for student housing, a dining hall, 2,000 parking spaces, a central utility plant and all necessary infrastructure to support the project.	When the city of Denver sought to update and redevelop its airport's 1.5 million-square-foot main terminal, relocate outdated TSA facilities and increase nonairline revenues by redeveloping the terminal into a thriving retail and entertainment venue, it chose to utilize a P3 delivery method for the extensive redevelopment program. The program also involves substantial work on necessary infrastructure updates to support the project. This project is also referred to as the DEN Great Hall Project.	When the University of California decided to almost double the size of its Merced campus, it chose to use a single private development team for this multiyear, multi-building project. The 1.2 million-square-foot development will include new teaching facilities, research laboratories and faculty offices as well as 1,700 beds for student housing. The private partner will design, build and finance the facilities as well as operate and maintain them for 39 years.
Public Partner(s)	University of Kansas	City and County of Denver Department of Aviation	University of California, Merced
Private Partner(s)	Edgemoor Infrastructure & Real Estate	Great Hall Partners	Plenary Properties Merced
Total Funding/ Project Cost	$350 million	$750 million+ (Public and private parties share in project costs as well as in net revenues during operations.)	$1.4 billion
Timeline	Financial Closing: January 2016 Groundbreaking: Spring 2016 First Phase Delivery: Summer 2017 Completion (Projected): Summer 2018	Commercial and Financial Closing (Projected): Fall 2017 Construction Commences (Projected): Early 2018 Completion (Projected): Summer 2022	Financial Closing: August 2016 First Phase Delivery (Projected): Summer 2018 Second Phase Delivery (Projected): Summer 2019 Substantial Completion (Projected): Summer 2020
Project Website	centraldistrict.ku.edu	flydenver.com/greathall	plenarygroup.com/projects/north-america/uc-merced-2020

Rebuilding is often the only answer in such circumstances, since large-scale renovations can be prohibitively expensive. With P3s, the public sector gets the benefit of having buildings not only maintained to agreed-upon performance standards, but those buildings eventually are handed back in functional, usable shape — often with next-generation technology and systems in place, lowering future O&M costs. And the public sector gets all this for predictable payments, usually at life cycle costs lower than or equal to traditional public sector delivery models.

As noted previously, the private sector takes on the risk for life cycle costs from project inception through hand back. The public sector gets guaranteed performance, while the private sector bears the risk of production, operations and maintenance. Because it has assumed the risk for decades of O&M, the private sector typically must pay more attention to design and construction quality at the front end. Not being able to hand off the burden after substantial completion provides a remarkable incentive to build for the long haul.

Accelerated Schedules. Because the private sector typically fills out much of the capital stack in a P3 delivery model, as well as driving the design and construction processes, development schedules are far more compressed than they are for typical public sector procurements. Speed simply isn't what the public sector does best. Shaving months off procurement and construction schedules lowers costs, while bringing in private capital means projects can get off the ground far faster than traditional public sector projects. These

A Typical P3 Organizational Structure



compressed delivery schedules mean projects can open and begin generating revenue sooner, further enhancing the value of the P3 model.

P3 Structures

A typical P3 structure will involve the following parties; see the chart above for a graphic representation.

A public sector entity typically sponsors the project.

A private sector entity, typically a consortium or concessionaire, is responsible for contracting with all the parties responsible for delivering and operating the project, including:

- A design-build provider to construct the project.
- An O&M provider to operate and maintain the project over the agreed term, pursuant to agreed-upon performance standards.
- Equity and debt providers to fund the project.

Advisers on legal and financial matters, government and community relations, etc. typically help guide all parties through the P3 process. While concessionaires typically retain best-in-class advisers for these complex transactions, P3 projects tend to run better and provide greater value for the public when the public sector sponsor is equally well advised and supported by subject matter experts.

Lack of sophistication on the public sector side regarding complex financing and P3 structures has at times resulted in projects that didn't achieve the benefits the public sector thought it was getting, leading some politicians and members of the public to question the wisdom of the P3 delivery model. Recent trends have seen the formation of "centers of excellence" to provide the public sector expertise needed to level the playing field in this regard.

Historically, most P3s have arisen in the transportation industry to provide so-called "horizontal infrastructure": roads, railways, bridges, etc. Major transportation industry contractors took on these contracts and expanded the scope by adding to their role capital investment and long-term operations/management, a form of turnkey-plus arrangement. In this expanded role, contractors, through their concession arm, would partner with financial investors, operators, designers and other necessary parties to form the project-based concessionaire entity.

By expanding their roles in the P3 context, contractors were able to develop an assured pipeline for their construction business by actually taking on the financial and related operational risks over the long term. Not unlike the movement from the construction industry into the development business in the commercial development world, these larger contractors formed concessions or development arms to expand their businesses in the infrastructure world through P3s.

"Because these kinds of projects are often embedded within urban communities, **private commercial mixed-use development can … underpin the financing** to make the projects financially feasible."

James Mulligan and Andrea Austin

New Frontiers: Beyond Horizontal Infrastructure

Public-private partnerships in transportation are fairly common even in the U.S., where this delivery model hasn't been adopted with the gusto shown by other Western industrialized countries. In some respects, the acceptance of P3s in horizontal infrastructure has derived from the fact that it has been easier to figure out how to monetize these types of projects to generate payment streams to concessionaires. The transportation industry has a lot of experience modeling traffic, making it relatively easy to project revenue streams from bridge and highway tolls, for example.

Moving beyond transportation and horizontal infrastructure generally, P3s have gained traction in other infrastructure projects where modeling demand and monetizing the asset are relatively straightforward. Parking structures and many forms of student housing are examples of this expanded P3 reach. Water and wastewater treatment facilities have predictable revenue streams from permitting and service fees.

Demand, which is often captive in these projects, can be consistently predicted; markets are usually established enough to provide good data on pricing; and the projects themselves tend to be discrete, perhaps even ancillary to the core public sponsor purpose, lowering the perceived risk. Prisons are another example of projects that are more easily monetized, and thus more susceptible to P3 delivery. Captive demand, known costs and predictable volume are common features that can be easily modeled for P3 financing purposes, attracting the private sector to these kinds of projects. Such easily monetized assets are, in essence, the low-hanging fruit of P3s.

Newer frontiers for "social infrastructure" P3s include typical public facilities: courthouses and libraries, government offices and other facilities as well as university classroom and research facilities, even entire university campuses. Because assets like these are harder to monetize, they require a more sophisticated P3 model to make the financing work. And because these kinds of projects are often embedded within urban communities, private commercial mixed-use development can be a handmaiden to the central objective of the social infrastructure development project. In fact, it can underpin the financing to make the project financially feasible.

One Example

The Long Beach Civic Center project in California is a good example of this kind of creative development, which incorporates private development in a P3 project. The city of Long Beach and the Port of Long Beach needed new office space, in addition to a new city hall and library, as well as new parking facilities and a new central utility plant. Finding purely public funds to build these facilities all at once in a master-planned project would have taken years, perhaps decades, with no guarantee that anything built would be maintained according to desired standards. And, in and of themselves, these kinds of facilities, other than the parking, can be hard to monetize to provide an easy path to P3 development.

To overcome these challenges, the city procured a private concessionaire, Plenary Edgemoor Civic Partners, to work with it in a P3 structure that looked beyond the four corners of the core government facilities to envision a reimagined civic center, energized with vibrant mixed uses to create a new sense of place. As part of the P3 structure, the city agreed to sell the concessionaire approximately 7 acres of public land adjacent to the planned public facility for private development to complement the public facilities.

Plans for this private development include hotels, retail space and residential uses. These are seen as key components of the overall project; they will animate the area by drawing people into it. The cash the city received for the land is, in turn, being used in the capital stack for the P3, combined with equity contributions from the concessionaire — a consortium of a private developer and investor — and a cash contribution from the city.

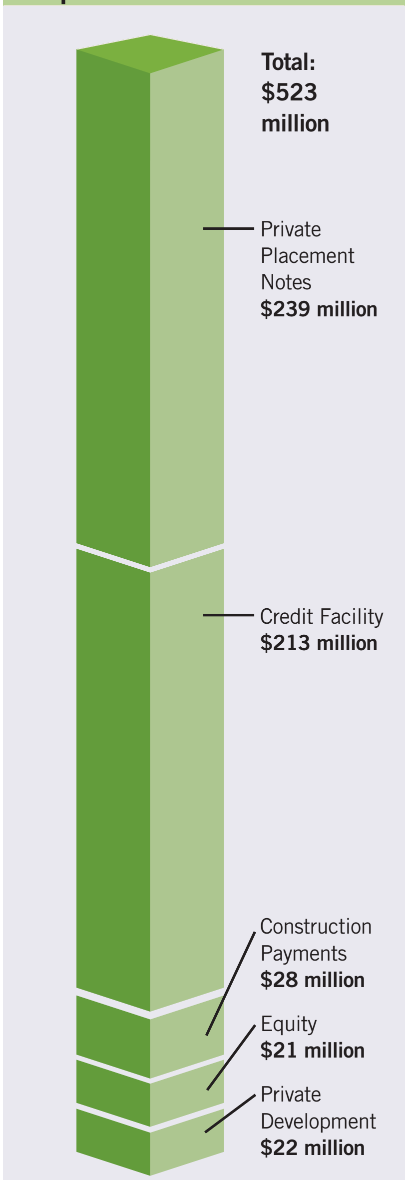
The concessionaire is also arranging the financing, which entails $452 million in private placement notes/credit facility. The concessionaire's payment stream from the city over the 40-year term of the P3 is no

Long Beach Civic Center

Timeline

City Council Request for Qualifications Issued	February 2012
RFQ Short List Selected	October 2013
Preferred Bidder Selected	December 2014
Financial Closing	April 2016
Conveyance of First Land Parcel	April 2016
Groundbreaking	June 2016
Construction	2016-2020
Conveyance of Second Land Parcel (Projected)	Fall 2019
Public Facilities (City Hall, Port Headquarters, Library and Park) Completed (Projected)	November 2020

Capital Stack



greater than the city would have spent in O&M costs to operate the facilities itself.

This project will provide the city with a vibrant urban core and public facilities maintained to a far higher standard than public funding typically permits. The concessionaire anticipates a substantial return on its investment through its payment arrangement with the city. And private commercial developers will have significant opportunities to benefit from new commercial uses the project has enabled.

Future Prospects

P3s are in the spotlight as never before, as one approach to addressing serious funding shortfalls for building and maintaining public infrastructure, from roads to water treatment systems to university and other public facilities. Right now, those efforts are being undertaken largely at the state and local levels. But new opportunities may also arise in the federal arena, which has had its own success with P3s, such as the Military Housing Privatization Initiative. The U.S. Department of the Interior and the General Services Administration also are advancing pilot P3 programs. Whether the political climate allows for significant new P3 initiatives at the federal level remains to be seen, however.

For now, look for more projects like the Long Beach Civic Center to come online in the future, as public sector budgets remain constrained and the political will to support necessary infrastructure investment remains weak — although cautiously hopeful, given the current administration's stated priorities. Creative cash-generating approaches, such as off-site private mixed-use development, are going to become increasingly common as both public and private sector players look to new revenue sources to incentivize the private sector to take end-to-end responsibility for public facilities.

Today's P3 social infrastructure projects reflect many historical traditions for public-private intersections. If both the public and private sectors can leverage project delivery models like P3s to build and maintain U.S. infrastructure most efficiently, all parties have an interest in making sure such transactions are structured for the public's long-term benefit while letting loose the private sector's creativity and drive. P3s, applied to the right project for the right reasons, can both catalyze development and facilitate economic growth. They may also bridge political divides and philosophies, to foster an environment more conducive to investing nationally in the infrastructure the U.S. needs to remain the world's No. 1 economy.

As this P3 delivery model evolves, private commercial development opportunities will emerge as a more important factor in the development of our public infrastructure. Now is the time to take a look! ■

James M. Mulligan is a partner and **Andrea Austin** is an associate in the Denver office of Husch Blackwell LLP.

From Obsolete Property to Modern Distribution Facility

A great location plus smart design result in fast lease-up of a last-mile distribution facility on Chicago's South Side.

By Matt Goode, Venture One Real Estate

E-COMMERCE AND urban infill are buzzwords that have quickly become the focus of industrial real estate investors and developers throughout North America. In an environment that is rapidly evolving, how can developers target properties that will become attractive for this new and growing type of tenant, which is increasingly demanding facilities in metropolitan areas?

By definition, these projects are located within major cities, in densely populated, land-constrained areas, making it difficult to find appropriately priced sites with the correct amenities and the proper zoning. As such, no two urban infill projects will look alike.

Tenants seeking these infill locations will likely need to sacrifice some of the functionality that a modern, greenfield development can provide. However, successful urban infill development or redevelopment projects will share many of the following qualities:

- Quick access to a major population center.
- Extra land for van, car and truck parking.
- Access to labor and public transportation.
- A modern (enough) warehouse able to accommodate product storage and distribution.

Located in the city of Chicago, 2801 S. Western Ave. is one example of an urban redevelopment project that has resulted in a fully leased modern distribution facility that meets the needs of today's e-commerce retailers and food distributors.

A Promising Property

In 2012, Venture One Real Estate, along with its capital partner, DRA Advisors LLC, identified an infill industrial redevelopment opportunity on the Near South Side of Chicago. The 312,000-square-foot structure on a 13.2-acre parcel at 2801 S. Western Ave. was just over three miles southwest of Chicago's central business district, less than one-half mile from a four-way interchange at Interstate 55 and Damen Avenue.

At first glance, the property appeared to be a typical older, obsolete inner-city industrial building with interior loading, run-down metal siding and a lack of modern amenities. The building's offices were wood paneled and enclosed; the warehouse was dimly lit, without ESFR sprinklers; and its 90-foot interior loading court was not designed to accommodate today's 53-foot trailers.

Yet Venture One identified several qualities that made this property an ideal candidate for redevelopment as an urban infill, last-mile industrial facility. The warehouse had a 28- to 30-foot clear height ceiling, 50-by-60-foot bay spacing and 5 acres of extra land that could be used for car or truck parking. The building contained food storage and

Venture One Real Estate and its capital partner DRA Advisors LLC redeveloped this industrial building, located on a 13.2-acre site just over three miles southwest of Chicago's central business district, into a modern urban infill last-mile facility.

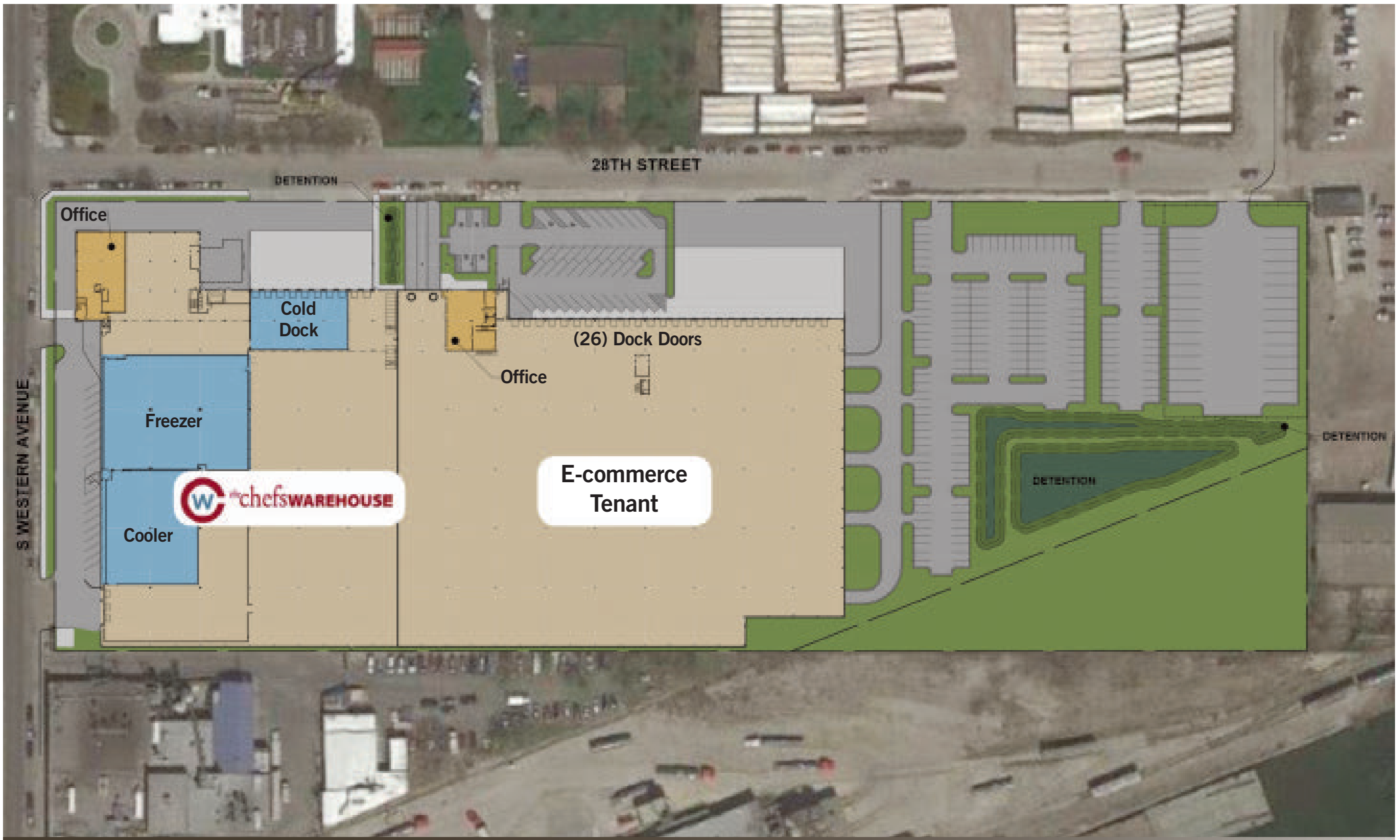
distribution infrastructure, including a 15,000-square-foot high-bay cooler, a 10,000-square-foot high-bay freezer, three dedicated cold docks and floor drains. Most importantly, the West 28th Street and Western Avenue property was located in Chicago's up-and-coming Pilsen neighborhood, which has excellent access to a deep labor pool, highways, public transportation and immediate access to Chicago's central business district.

Venture One closed on the property in 2013 with a plan to immediately undertake significant speculative improvements to modernize the facility. The developer worked closely with the city of Chicago's Department of Planning and Development and the property tax firm Liston & Tsantilis to secure a class 6(b) tax incentive, which is designed to encourage developers to invest capital into older buildings and provides a 60 percent property tax reduction for 12 years.

Redevelopment

Demolition began in 2013.The 90-foot interior truck court was demolished to create 28 exterior docks with new dock equipment. The original dock wall was underpinned for structural support and reused in place for the new loading docks. The cavernous, wood paneled offices were cleared out to create an open, loft office plan with views of the Chicago skyline.

Venture One installed an ESFR sprinkler system to allow tenants to take advantage of the clear height. It also installed energy-efficient, high bay T5 lighting. Exterior aesthetic improvements include a new parking lot, upgraded facade, landscaping enhancements, new lighting and upgraded signage on Western Avenue.



The redeveloped building at 2801 S. Western Avenue is now fully occupied by two tenants, The Chef's Warehouse and an international e-commerce retailer. In addition to expanding and upgrading the building's existing food storage infrastructure, Venture One converted part of an existing truck court into additional car and van parking.

In addition, a new HVAC system and a new roof were installed.

After demolition and redevelopment, the building was reintroduced to the market in 2014 as a modern 277,000-square-foot urban industrial building. It was the only building of its kind available within the city of Chicago at that time.

Almost immediately, Venture One secured a 127,000-square-foot long-term lease with The Chef's Warehouse, a national food production and distribution company that distributes high-end food products directly to local restaurants. Venture One upgraded and expanded the building's existing food storage infrastructure for this tenant. The loft offices were completed and converted into the company's local headquarters and sales offices. Ten new cold docks were added, as well as an additional 18,000-square-foot freezer and 10,000 square feet of air-conditioned storage. A portion of the 5-acre land parcel was paved to store the firm's food trucks, which are used for local deliveries to Chicago-area restaurants.

Shortly thereafter, Venture One secured a 150,000-square-foot lease with a well-known international e-commerce tenant for a last-mile distribution facility. This tenant took advantage of the remainder of the additional land for car and van parking. It chose to use the exterior docks for delivery of product via semitruck. The remainder of the truck court was converted for extra car and van parking, accommodating roughly 225 vehicles.

Access to the metropolitan area was critical to the operations of both tenants. Modern loading courts and docks were necessary to facilitate the delivery of product to the facility. Because most product leaves the facility to be distributed within the city limits, the extra land was necessary to store vans and city delivery trucks on site.

Venture One demolished a 90-foot interior truck court to create 28 exterior dock doors. The original dock wall was underpinned for structural support and reused in place for the new loading docks.

2801 S. Western Ave. Project Summary

Location	2801 S. Western Ave., Chicago
Type of Site	Urban
Development Type	Infill/Redevelopment, Building Renovation
Transportation Modes	Car, Truck
Mix of Uses	
Distribution/Fulfillment Center	260,000 sq. ft.
Loft Offices	9,500 sq. ft.
Surface Parking	
Cars and Vans	225
Trucks	30-40
Tenants	
E-commerce Tenant	150,000 sq. ft.
The Chef's Warehouse	127,000 sq. ft.
Site and Building Dimensions	
Total Acreage	13.2 acres
Total Square Footage	277,000 sq. ft.
Development Team	
Developer	Venture One Real Estate
Master Planner/Landscape Architect/Architect	Ware Malcomb
General Contractor	Keeley Construction/Arco Murray
Leasing Broker	Cushman & Wakefield
Financial Partners	
Joint Venture Partner	DRA Advisors
Tax Incentives	A 12-year, 60% reduction in real estate taxes
Construction Loan	Wells Fargo
Equity	Venture One Real Estate and DRA Advisors
Short-term Debt	Wells Fargo
Timeline	
Land Acquisition	Q1 2013
Planning Started	Q1 2013
Demolition Started	2013
Construction Started	Q2 2013
Construction Complete	Q4 2015
Total Project Costs	$19 million

In November 2016, NAIOP Chicago named 2801 S. Western Ave. its 2016 Industrial Redevelopment of the Year.

Looking Ahead

As consumer demand for fast and inexpensive home delivery of e-commerce purchases continues to grow by double digits annually, retailers and distribution companies are continuing to expand their urban infill warehouse footprints. Currently, e-commerce makes up only 8 percent of total retail sales, which means that there is still a lot of room for growth. This growth will result in opportunities for creative industrial developers to target infill locations like this one for urban infill warehouses and last-mile distribution facilities. ■

Matt Goode is a principal with Venture One Real Estate.

The Summit at Fritz Farm

Varied facades, wide sidewalks, repurposed barn wood and stylish streetlights reflect The Summit at Fritz Farm's "farm chic" design.

Engaging regional "brand ambassadors" results in authentic placemaking for a mixed-use retail destination in Lexington, Kentucky.

By Lindsay Bayer Shipp
and Molly Mackenzie, Bayer Properties

WHILE PLACEMAKING IS a hot trend in mixed-use development these days, there's no simple way to do it. There is no quick-and-easy template that can be followed over and over, nor is there a 10-step process that can be managed from a headquarters building in another city.

Placemaking works best if a developer goes deep into the community to build authentic connections by spending time, energy and resources. In Lexington, Kentucky, Bayer Properties recently opened a new mixed-use destination called The Summit at Fritz Farm. During the development phase, Bayer became heavily invested in relationships with key ambassadors in the city to ensure that the developer incorporated local needs into the destination.

Landscaped green spaces and outdoor seating epitomize the Lexington lifestyle.

These relationships were not one-dimensional; Bayer called on ambassadors for opinions, connections and community insights. They asked them for local and historical context. And they invited the community to help tell the story of Lexington through The Summit at Fritz Farm.

One example is the relationship that Bayer has with world-renowned garden designer and Kentucky native **Jon Carloftis**. While his naturalized designs have fundamentally shaped the look and feel of the project, the development team has also leveraged his help in a much broader way. He hosted breakfasts at his home for potential tenants and shared his nuanced insights into the community.

Bayer is committed to true placemaking, to creating a development that is authentic and meaningful for Lexington. That does not happen without relationships. The world of retail has changed, and developing an ambassador program with Carloftis and others has been paramount to the success of The Summit at Fritz Farm's transformation from historical farm land to shopping mecca.

Distinctly Lexington

The Summit at Fritz Farm is designed to reflect Lexington's culture of thoroughbred horse breeding

The Summit at Fritz Farm site plan illustrates the project's mix of retail and dining offerings. Other uses include apartments (The Henry, at top) and offices (located above some of the retail and restaurant space).

and its rich farming history, as well as the rolling Kentucky bluegrass landscapes. The property celebrated its "First Look" on April 27, 2017, with the opening of several best-in-class retailers and chef-driven restaurant concepts. Throughout the summer, the development held a rolling opening in which it opened additional stores and restaurants nearly weekly.

As of early September, more than 50 retail and restaurant tenants are fully operational. The office space, located above ground-floor retail space, is complete and hotel construction is underway, with an expected delivery date in the fourth quarter of 2018. The Henry at Fritz Farm apartments opened to the public in December 2016 and are demanding the highest rental rates in the market.

Upon completion of Phase I by the end of September 2017, the project will feature the following:

- 300,000 square feet of retail and chef-driven restaurant concepts, including the region's first food hall, dubbed The Barn, which will serve as a tribute to local Kentucky cuisine.
- 306 luxury apartments.
- 44,000 square feet of modern office space.

Located on 44 acres with additional surrounding land available for future growth, the $156 million mixed-use experiential development is authentic and faithful to the rich heritage of the property, which was historically operated as a farm, and the beauty of the region.

Fritz Farm dates back to the Revolutionary War, and the property features many beautiful artifacts. Bayer is committed to honoring the heritage of the property and telling its story to a new generation of visitors and residents. In fact, several innovative retailers, including Bonobos, Ariat, Warby Parker and Shake Shack, selected to open new locations at The Summit at Fritz Farm because of Bayer's commitment to offering a localized experience that aligns with their brands.

To ensure authenticity in landscape design and create a sense of place, Bayer engaged Carloftis, an award-winning garden designer, author and lecturer.

The Ambassadors

Three years ago, as Bayer prepared to begin developing this project, members of the development team began to spend an increasing amount of time on the ground in Lexington. Before the company begins any new development, the team cultivates relationships with local influencers and ambassadors to ensure that the mix of tenants will satisfy the needs of the community.

For this development, the company relied heavily on those key influencers to help gain an understanding of the types of development and retail tenants the market needed and how The Summit at Fritz Farm could differentiate itself. Later, Bayer engaged the ambassadors to help them tell the Lexington story to potential tenants as the leasing process began, and to act as a sounding board to ensure the leasing team was targeting the right tenants for the project.

These ambassadors include the Bell family, owners of famed Mill Ridge Farm; **George Gatewood**, a craftsman and owner of Longwood Antique Woods; **Seth DeBolt**, a wine, brewing and distillation scientist at the University of Kentucky; and other local stakeholders and influencers.

Chef **Ouita Michel,** a six-time James Beard award nominee who recently opened her largest restaurant to date, Honeywood at The Summit at Fritz Farm, was an instrumental partner for the project. Throughout the tenant recruitment period, she catered lunches for prospective tenants and helped the development team establish the property as a true foodie destination. Michel will also open a stall in the food hall called Smithtown Express.

The Bell family also contributed significantly by helping Bayer highlight the economic importance of Lexington's horse farms and racing to the city. **Price Bell Jr.** is the bloodstock agent for the historic Mill Ridge Farm, a board member of the Kentucky Thoroughbred Association and a sixth-generation thoroughbred estate owner. His tours of Mill Ridge Farm helped showcase for prospective retail tenants the importance of this industry, which brings hundreds of thousands of visitors to the city annually.

In nearly every conversation the Bayer team had with local ambassadors, Carloftis' name emerged as someone who would be a good partner for The Summit at Fritz Farm. His more than 25-year career in gardening began in New York City, where he established himself as one of America's pioneers in rooftop and small-space gardening.

The Henry at Fritz Farm apartments overlook a roughly 4,500-square-foot landscaped, farm-themed playground.

Returning home to Lexington in 2012, Carloftis and his partner **Dale Fisher** purchased a historic 1851 home that had fallen into disrepair. Within a year, they received the Blue Grass Trust Historic Preservation Award and the Landscape Preservation Award, the highest honors in the state for the preservation, design, stewardship, restoration or enhancement of an historic cultural landscape.

The Bayer team recognized that it would be a natural fit to engage Carloftis for The Summit at Fritz Farm, not only as the official garden designer, but also as an ambassador. They learned that if Carloftis is behind something, it's likely that Lexington will be too.

Farm Chic

Carloftis has been a significant asset for The Summit at Fritz Farm, thanks to his knowledge of the local market. Bayer recruited his expertise to create an authentic environment that is distinctly Lexington — sophisticated yet familiar. The development team continues to engage Carloftis as a sounding board, and his local point of view has had a major impact on the project's design.

"Farm chic" is the term used to describe the project's design style, which Carloftis crafted along with a landscape architecture team from Nimrod Long & Associates. To create this contemporary yet sophisticated interpretation of farm life, Bayer repurposed period farm implements that were found on and near the property.

Carloftis engaged a local Kentucky prison to help bring these vibrant vintage farm pieces back to life. Prisoners worked with Carloftis to revive the art, equipment and cars. As they did so, they learned skills that should help them gain employment after they exit the prison system.

Carloftis also introduced the Bayer Properties team to Old World Timber, a Lexington barn wood preservationist, which has outfitted all of the furniture and equipment for the interior of The Barn. The company reused much of the property's seasoned barn wood on interiors and for accent areas. And it created engravings of the barn wood, which were used to manufacture custom planters and other accent pieces around the property to evoke the reclaimed wood commonly found at Kentucky's equestrian barns and bourbon distilleries.

The lush landscaping is engaging and whimsical, providing surprises to entertain and delight visitors while also incorporating as many native plants and trees as possible. A sustainable arbor of trees provides drainage for a parking area as well as shade for visitors to enjoy. In the near future, an organic, raised garden bed will encourage chefs and residents to grow fresh herbs and vegetables.

Bayer also enlisted **Cynthia Gentry**, founder of Play Atlanta, to design a one-of-a-kind, farm-themed playground on the property. The playground incorporates key farm features like a play barn, farm animal climbers, wooden farm vehicles and more.

Throughout the property, pocket parks and other areas offer spaces where people can gather, dine or simply enjoy a quiet moment.

The Lexington Connection

Carloftis has been instrumental in helping Bayer build connections in Lexington beyond the company's ambassadors. He was able to collect local vintage farm equipment from the 1950s, including tractors, tobacco setters, plows, rakes and mowers that were transformed into art that is now displayed throughout the property. These pieces, which form a large design component of the center, attract many visitors taking photographs to post on social media.

The Summit at Fritz Farm will also feature rotating art displays from local artists. Carloftis is helping Bayer identify and create relationships with artists who will showcase Lexington's outstanding craftsmanship and rich history.

The Summit at Fritz Farm Project Summary

Project Location	Lexington, Kentucky
Type of Site	Suburban
Development Type	Mixed Use, Ground Up/New Development
Transportation Modes	Car, Pedestrian
Mix of Uses	
Office	44,000 sq. ft.
Retail/Restaurant	307,000 sq. ft.
Residential	306 luxury apartments
Hotel	120 rooms
Parking	
Structured	652 spaces
Surface	1,794 spaces
Total Acreage	50 acres
Key Retail Tenants	
Warby Parker	1,406 sq. ft.
Lululemon	2,600 sq. ft.
Bonobos	1,217 sq. ft.
Frye	2,624 sq. ft.
Development Team	
Developer	Bayer Properties
Project Architect	Shook Kelley
General Contractor	Brassfield & Gorrie
Leasing Agents	Mary Beyer Lell, Lindsay Bayer Shipp
Financial Partners	
Co-owner	Sarofim Realty Advisors
Timeline	
Land Acquisition	2015
Construction Started	2015
Project Opened	April 2017
Phase I Completed	September 2017
Total Project Costs (Includes Land)	$156 Million

While hiring a renowned garden designer for The Summit at Fritz Farm was a significant investment, Bayer feels that the value he brings to the property is well worth it. Potential tenants are attracted to the concept and want to hear the story of how and why the team brought him in. He has helped to ensure that the property will offer the right experience and assisted significantly with the leasing team's efforts. The company views its partnership with Carloftis and all of its ambassadors as something that is much deeper than the typical business relationship; instead they consider these lifelong friendships. ■

Lindsay Bayer Shipp is retail brand strategist and **Molly Mackenzie** is chief investment officer for Bayer Properties.

DEVELOPERS OF THE YEAR: *Honoring NAIOP's Award Winners*

Presented since 1979, the Developer of the Year Award is NAIOP's highest honor. The award is given annually to one developer based on leadership, a strong portfolio and innovation in commercial real estate.

NAIOP is proud to recognize Trammell Crow Company, 2017 Developer of the Year, which will be honored during NAIOP's 50th anniversary celebration. Trammell Crow Company is the first repeat winner of the award, first receiving it in 1988.

Trammell Crow Company

Join NAIOP and commercial real estate to honor our 2017 Developer of the Year at CRE.Converge, October 10-12, in Chicago. **Register at creconverge.org.**

Majestic Realty Co., 2015

Brandywine Realty Trust, 2014

CenterPoint Properties, 2011

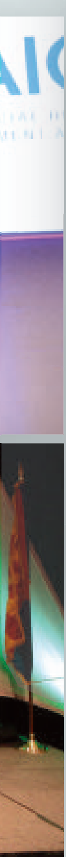
NAIOP
COMMERCIAL REAL ESTATE DEVELOPMENT ASSOCIATION

DEVELOPER OF THE YEAR

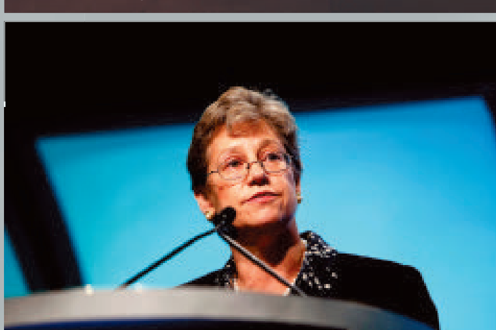
TRAMMELL CROW COMPANY

2017

Touchstone, 2016



The JBG Companies, 2012



Vulcan Real Estate, 2013

Congratulations to this esteemed list of past Developers of the Year!

2016: Touchstone, Seattle, Washington
2015: Majestic Realty Co., Los Angeles, California
2014: Brandywine Realty Trust, Radnor, Pennsylvania
2013: Vulcan Real Estate, Seattle, Washington
2012: The JBG Companies, Chevy Chase, Maryland
2011: CenterPoint Properties, Oak Brook, Illinois
2010: The Alter Group, Chicago, Illinois
2009: Highwoods Properties, Raleigh, North Carolina
2008: Liberty Property Trust, Malvern, Pennsylvania
2007: Ryan Companies US Inc., Minneapolis, Minnesota
2006: Bentall Capital, Vancouver, British Columbia
2005: Prologis, Denver, Colorado
2004: United Properties, Bloomington, Minnesota
2003: Colonial Properties Trust, Birmingham, Alabama
2002: Lowe Enterprises, Los Angeles, California
2001: Duke Realty Corporation, Indianapolis, Indiana
2000: Stiles Corporation, Ft. Lauderdale, Florida
1999: Matrix Development Group, Cranbury, New Jersey
1998: The Estate of James Campbell, Kapolei, Hawaii
1997: Cousins Properties Inc., Atlanta, Georgia
1996: Beacon Properties Corporation, Boston, Massachusetts
1995: The Irvine Company, Irvine, California
1994: Miller-Valentine Group, Dayton, Ohio
1993: Charles E. Smith Companies, Arlington, Virginia
1992: Opus Corporation, Minnetonka, Minnesota
1991: CARTER, Atlanta, Georgia
1990: The Sudler Companies, Roseland, New Jersey
1989: Birtcher, Laguna Niguel, California
1988: Trammell Crow Company, Dallas, Texas
1987: Rouse & Associates, Malvern, Pennsylvania
1986: Taylor & Mathis Inc., Atlanta, Georgia
1985: Olympia & York, Toronto, Ontario, Canada
1984: Vantage Companies, Dallas, Texas
1983: The Koll Company, Newport Beach, California
1982: Cabot, Cabot & Forbes, Boston, Massachusetts
1981: Gerald D. Hines Interests, Houston, Texas
1980: Southern Pacific Company, San Francisco, California
1979: Bennet & Kahnweiler, Chicago, Illinois

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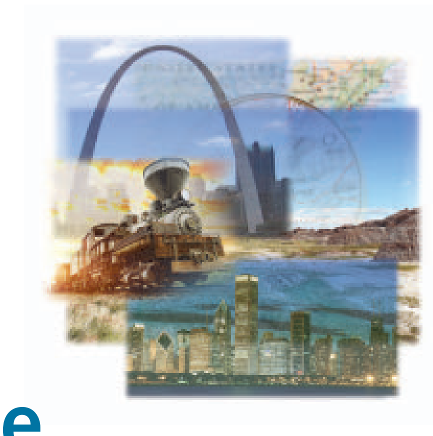

NAIOP Guide to the Midwest

Are you planning a project in the Midwestern U.S.? Whether you seek an investment partner, an interior designer, a contractor or a great location, you'll find a contact here.

Accountants

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CPAs & Advisors

BKD, LLP

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thege@bkd.com
www.bkd.com
910 E Saint Louis St., Suite 400
Springfield, MO 65801
(417) 831-7283

BKD works with real estate investors, developers, brokers, agencies and owner associations. Whether your company owns a single piece of rental property, operates an agency or has vast commercial holdings in several states, our team has the expertise and experience to help accomplish your goals.

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www.wipfli.com
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www.eua.com
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Asset Manager

Clarion Partners

Stacey Magee
Stacey.magee@clarionpartners.com
www.clarionpartners.com
1717 McKinney Avenue, Suite 1900
Dallas, TX 75202

A leader among U.S. industrial portfolio operators, the Clarion Partners Industrial Group is focused exclusively on the logistics sector, with particular emphasis on bulk warehouse/distribution facilities. The Group manages a 644-property portfolio (consisting of more than 126 million square feet and currently valued at more than $10.4 billion), located in 43 markets across the United States and Brazil. Besides closely monitoring the performance of existing assets with more than 1,300 diverse tenants, the Group has the expertise to develop new warehouse space on well-located land parcels held in its portfolio.

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www.colliers.com
200 S. Wacker Drive, Suite 700
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(312) 648-9150

Colliers International is a global leader in commercial real estate services, with more than 16,300 professionals operating out of 502 offices in 67 countries. Colliers delivers a full range of services to real estate occupiers, owners and investors worldwide, including global corporate solutions, brokerage, property and asset management, hotel investment sales and consulting, valuation, consulting and appraisal services, mortgage banking and insightful research.

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www.lee-associates.com
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Lee & Associates is the largest broker-owned commercial real estate firm in North America. We combine superior tools, resources and outstanding market intelligence to meet the specialized needs of our diverse client group inclusive of industrial, office, retail investment and appraisal.

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jeff.slivka@newdayunderwriting.com
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New Day Underwriting Managers, LLC is a specialty intermediary serving retail insurance brokers and their clients by delivering optimal risk management solutions in the areas of environmental liability and construction-related professional liability for all industry types.

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brian.paul@pdbgroup.com
www.pdbgroup.com
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Developers

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www.centerpoint.com
1808 Swift Drive
Oak Brook, IL 60523

CenterPoint is focused on the development, redevelopment, acquisition and management of industrial property and transportation infrastructure that enhances business and government supply chain efficiency. The company invests in major coastal and inland port logistics markets anchoring North America's principal freight lanes.

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Sven Tustin
stustin@conorcommercial.com
www.conorcommercial.com
6720 N. Scottsdale Road, Suite 270
Scottsdale, AZ 85253
(602) 845-5200

Conor Commercial Real Estate, a member of The McShane Companies, is headquartered in Chicago with regional offices in Phoenix, Irvine and Houston. The firm is active on a national basis in the development of master-planned industrial and office parks, medical office developments, multi-family properties and build-to-suit projects for lease or purchase.

Clarius Partners
Kevin Matzke
info@clariuspartners.com
www.clariuspartners.com
200 W. Madison Street, Suite 3410
Chicago, IL 60606
(312) 386-7150

Clarius Partners, LLC is a commercial real estate investment and development management company headquartered in Chicago with over $950 million and approximately 8 million square feet of land, office, and industrial development projects completed or under management in Illinois, Pennsylvania, Arizona, California and South Carolina.

CRG
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St. Louis, MO 63114

CRG is a leading North American real estate developer headquartered in St. Louis, Missouri with offices in Chicago, Sacramento, Atlanta, Pittsburgh and Northern New Jersey. The CRG team has developed more than 5,000 acres of land and delivered over 160 million square feet of commercial, industrial, multi-family and institutional assets exceeding $9 billion in value. For more information visit www.realcrg.com. CRG is the real estate service subsidiary of Clayco.

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www.moltoproperties.com
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Suite 750
Oakbrook Terrace, IL 60181

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Prologis

www.prologis.com
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Rosemont, IL 60018
(847) 292-3900

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Tratt Companies

Jonathan Tratt
JT@trattproperties.com
www.trattproperties.com
4715 N. 32nd Street, Suite 102
Phoenix, AZ 85018
(602) 468-3100

Tratt Properties, LLC, headquartered in Phoenix, Arizona, is a dedicated and experienced real estate and financial team engaged in the acquisition and development of institutional grade logistics properties in key markets throughout the United States. We are focused on delivering flexible and scalable global supply chain real estate solutions that go beyond basic transportation, warehousing and distribution.

USAA Real Estate Company

www.usrealco.com
San Antonio, TX 78230

USAA Real Estate Company, with approximately $12 billion in assets under management, provides development acquisition, and co-investment services for corporate and institutional investors. The USAA portfolio consists of office, industrial, multi-family, retail and hotel properties as well as investments in real estate operating companies. USAA Real Estate Company is a subsidiary of USAA, a leading financial services company, serving military families since 1922. For more information, visit www.usrealco.com.

Venture One Real Estate

Ryan Stoller
ryans@ventureonere.com
www.ventureonere.com
9500 Bryn Mawr, Suite 340
Rosemont, IL 60018
(847) 243-4300

Venture One is a real estate private equity fund manager, developer and operating company specializing in the industrial property sector. Venture One owns over 5.3 million square feet and controls over 1,100 acres of land in the greater Chicagoland area.

Wangard Partners, Inc.

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Envoy Net Lease Partners provides equity and high-leverage financing to developers of build-to-suit or redeveloped single tenant, net lease properties nationwide through four financing programs: Ground Lease A&D Loans, Construction Loans, Bridge Loans, JV Equity. Download program flyers at envoynnn.com.

Economic Development Agencies

Allegheny County Airport Authority

David Storer
development@flypittsburgh.com
www.flypittsburgh.com/development
Pittsburgh International Airport
Pittsburgh, PA 15231-0370
(412) 472-3880

The Allegheny County Airport Authority's role as an economic generator is two-fold: to provide high quality, competitive air service in and out of southwestern PA and to develop key properties which attract new industry and jobs.

Arizona Commerce Authority

Kevin Sullivan
kevins@azcommerce.com
www.azcommerce.com
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The Arizona Commerce Authority is the leading economic development organization with a streamlined mission to grow and strengthen Arizona's economy. The ACA uses a three-pronged approach to advance the overall economy: recruit, grow, and create.

Greater Des Moines Partnership

Mike Swesey
mswesey@desmoinesmetro.com
www.desmoinesmetro.com
700 Locust Street, Suite 100
Des Moines, IA 50309
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The Greater Des Moines Partnership is the economic and community development organization serving Central Iowa. Together with 21 Affiliate Chambers of Commerce and 5,700 business members, The Partnership drives economic growth and careers through innovation, strategic planning and global collaboration.

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Michael Keller
mkeller@lehighvalley.org
www.lehighvalley.org
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Lehigh Valley is the 68th largest metropolitan region in the United States, with a $34.3 billion GDP that is larger than that of 104 nations, and is located 60 minutes north of Philadelphia and 90 minutes west of New York City.

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Mary Cierebiej
mcierebiej@teamneo.org
www.teamneo.org
1111 Superior Avenue E.,
Suite 1600
Cleveland, OH 44114
(216) 363-5411

Team Northeast Ohio (NEO) is an economic development organization focused on creating jobs and helping businesses thrive. We serve as the JobsOhio affiliate working with Northeast Ohio's economic development partners.

Wisconsin Economic Development Corporation
dobusiness@inwisconsin.com
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Jeff Slivka
Jeff.slivka@newsayunderwriting.com
www.newdayunderwriting.com
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Hamilton Township, NJ 08690

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Financial Intermediary

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Jeffrey Weidell, President
jweidell@northmarq.com
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P: (952) 356-0100
F: (952) 356-0099
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www.ae7.com
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(412) 932-2044

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Investor

Envoy Net Lease Partners
Ralph Cram
rcram@envoynnn.com
www.envoynnn.com
1363 Shermer Road, Suite 309
Northbrook, IL 60062
(847) 239-7250

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Cary Goldman
cgoldman@sitexgroup.com
www.sitexgroup.com
9525 W. Bryn Mawr Avenue,
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Talos Capital
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Owner

Clarion Partners
Stacey Magee
Stacey.magee@clarionpartners.com
www.clarionpartners.com
1717 McKinney Avenue, Suite 1900
Dallas, TX 75202

A leader among U.S. industrial portfolio operators, the Clarion Partners Industrial Group is focused exclusively on the logistics sector, with particular emphasis on bulk warehouse/distribution facilities. The Group manages a 644-property portfolio (consisting of more than 126 million square feet and currently valued at more than $10.4 billion), located in 43 markets across the United States and Brazil. Besides closely monitoring the performance of existing assets with more than 1,300 diverse tenants, the Group has the expertise to develop new warehouse space on well-located land parcels held in its portfolio.

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fernando.calvo@altusgroup.com
www.altusgroup.com
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Investor Management Services

Lisa Henshaw
lhenshaw@imscre.com
www.imscre.com
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Six Students Receive NAIOP Diversity CRE Scholarships

NAIOP has awarded its second Diversity CRE Scholarships to graduate and undergraduate students in commercial real estate from backgrounds that have traditionally been underrepresented in the industry.

By Hannah Buckles

NAIOP IS PLEASED to announce the recipients of the 2017 NAIOP Diversity CRE Scholarships. The program was established in 2016 to support graduate and undergraduate students pursuing a degree at a NAIOP university member school that will lead to a career in the commercial real estate industry. Preference was given to students from backgrounds that have traditionally been underrepresented in the industry. In addition to a $5,000 scholarship for graduate students and a $2,500 scholarship for undergraduate students, beneficiaries also received complimentary registration to NAIOP's CRE. Converge 2017 conference in Chicago.

A panel of industry experts reviewed more than 60 applications and identified the top candidates. All of the winners are active in commercial real estate, whether through NAIOP Real Estate challenges, club membership, mentoring relationships or actual work experience.

Sydney Bowman
Kelsey Padgham
Katherine Williams
Lonna Sedam
Dillon Weisner
Linda Hucko

Graduate Students

Sydney Bowman, a graduate student at Portland State University, expects to receive her Master in Real Estate Development in 2018. A former Peace Corps volunteer, she hopes to become a broker and work with multifamily properties. Bowman's father and grandfather both worked in CRE, but her desire to pursue it as a career was cemented by a mentoring relationship with a female broker. Bowman hopes to repay the favor and inspire other women to find their own places in the field. She is currently an associate with CBRE.

Kelsey Padgham is a student in Cornell University's Master of Professional Studies in Real Estate program. She has a passion for retail construction and planning in land-constrained markets. By combining her project management experience with a dual degree in real estate and regional planning, Padgham aims to become a leader in retail development. She is president of Cornell Real Estate Women and has participated in multiple student design and real estate competitions.

Dillon Weisner is pursuing a Master of Science in Real Estate at the University of San Diego. He is interested in sustainable development, real estate economics and affordable housing and is a certified LEED Green Associate. Weisner plans to join KPMG, where he will continue to develop his skills and pursue his aspirations. Ultimately, he would like to work as a developer with his stepfather's construction business in his hometown of Redlands, California.

Katherine Williams is an architect and a student in American University's Master of Science in Real Estate program. After working at architecture firms for several years, she decided to pursue a higher education in CRE so she could participate in project initiation and community integration as well as design. Williams is LEED AP-certified and an active member of the

American Institute of Architects and the National Organization of Minority Architects.

Undergraduates

Linda Hucko attends Marquette University, where she is majoring in CRE and accounting. She hopes to use her financial skills to mitigate risk and make ethical investments. Ultimately, she would like to take on a leadership role in CRE development. Mentoring relationships, including a relationship she formed through NAIOP Wisconsin's inaugural mentorship program, have played a pivotal role in Hucko's career path.

Lonna Sedam is majoring in CRE with a minor in finance at the University of Cincinnati. After entering college to pursue interior design, she was drawn to commercial real estate and its impacts on the local community. She has a passion for historic properties and hopes to develop and revitalize older communities. Sedam took some time during her college years to earn her real estate license and spent a year working in residential real estate.

NAIOP champions diversity through a strategic initiative that also provides resources and case studies on incorporating professionals from traditionally underrepresented groups — including young people, women, African-Americans, Asians and Hispanics — throughout the industry. ■

By **Hannah Buckles**, member services associate, NAIOP

Construction Defects Litigation Reform in Colorado

Five years, a coalition of more than 55 organizations and 41 mayors, nearly $900,000 spent on social media and communications, and countless hours at the negotiating table finally resulted in victory around the issue of "construction defects litigation reform" in Colorado.

By Kathie Barstnar, NAIOP Colorado

OVER THE PAST 10 years, Colorado experienced a dramatic growth in population along with the relocation of many company headquarters to the state. It now sits atop or near the top of many "Best of" lists. One list that the state did not want to sit atop was the list of "the most expensive places to live, not located on a coast." Yet median housing prices in the metro Denver area have exceeded $488,000, and median housing prices in Boulder have topped $1 million.

The Problem

Why is housing so expensive in Colorado? A major part of the problem is that because of the litigation prospects for multifamily, for-sale housing — that is, condominiums — this important entry-level housing product just isn't being developed in Colorado. Anyone who develops a condo project is inevitably sued. While the percent of new housing permits issued for condos and townhouses in the Denver metro area was similar until 2008/2009, when 26 percent of the permits issued were for condos and 24 were for townhouses, by the second quarter of 2016 only 3 percent were for condos, compared to 22 percent for townhouses, according to Metrostudy. And the condos that are being built are all in the luxury category. Colorado has essentially eliminated an entire product type.

This lack of entry-level housing caused a downstream problem — overdevelopment of apartment units — because people who would have migrated to homeownership at the first opportunity are being forced into apartments. This, in turn, forces apartment lease rates to skyrocket out of the reach of many millennials and the general workforce.

How did this happen? It became very profitable for plaintiffs' firms to approach homeowner association boards to suggest that any "construction defect" shouldn't be dealt with by the builder or developer, but rather should become grounds for a lawsuit. The homeowner association boards, which generally consist of three to seven members, could vote on their own to take a development into a lawsuit, often without even notifying individual homeowners. Many homeowners discovered their properties were encumbered because of a lawsuit, but only after they tried to refinance or sell their home and were told they couldn't.

In addition, although many development documents contain a requirement for arbitration, the homeowner association board could solicit a vote to remove that requirement, so that the case could be taken to a jury trial. These jury trials often ended with significant awards against the development parties and their insurance companies. The frequency of these claims, combined with the size of the awards, caused many insurance companies to exit the market and left others with no choice but to increase rates significantly.

For the past five years, NAIOP Colorado has been a member of the Homeownership Opportunity Alliance (HOA), a coalition of 55 organizations that includes developers as well as housing advocates such as Housing Colorado, Habitat for Humanity and Hope Communities. It also includes the Metro Mayors Caucus, a voluntary collaboration of metropolitan Denver's 41 mayors.

The HOA has actively pursued a legislative fix to this litigation conundrum. It quickly became clear, however, that the divided legislature that Colorado has enjoyed for the past four years would present a high bar for success. After three years of failed attempts to get a bill passed, 2016 proved to be the low point, as the HOA failed to even get a bill introduced.

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> **"Although the final bill didn't include the arbitration section, it did include the requirement for a meeting of all homeowners where both sides can present their arguments and then vote on whether to proceed."**
>
> *Kathie Barstnar*

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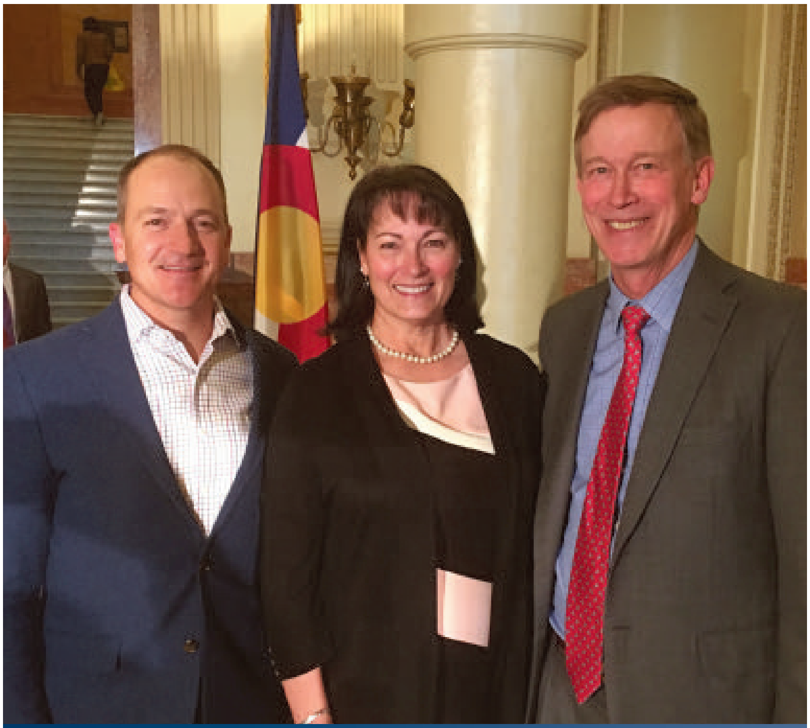
The Solution

I became cochair of the HOA in 2017, along with former State Sen. **Mike Kopp**, the CEO of Colorado Concern, an alliance of executives that seeks to enhance and protect the state's business climate. Together, we worked with HOA members and Republican State Sen. **Owen Hill** to draft a bill that included a requirement to consider arbitration along with an informed consent requirement. Hill introduced Senate Bill 17-156, and it passed the Republican-held Senate with strong bipartisan support. It then was sent to the Democratic-held House, where its fate was sealed owing to the lack of Democratic support for the arbitration section. It looked as if 2017 would be another year of frustration and inaction.

A variety of other bills had been introduced on this issue because it was a major priority for both the speaker of the House and the president of the Senate. These included House Bill 17-1279. Democratic State Rep. **Alec Garnett** and Republican State Rep. **Lori Saine** had introduced the bill with just the informed consent requirement. Garnett and Saine, along with Republican State Rep. **Cole Wist**, encouraged the opposing sides to work on this bill, and they participated heavily in shuttle diplomacy. Kopp and I pushed the coalition to find a way to say "yes." As late as the afternoon of the final negotiations, Garnett was having difficulty getting his side back to the table. But he was diligent, and the final meeting lasted well into the early morning. According to Kopp, "I would say if there was a singular act of legislative merit, it was the statecraft of Alec Garnett."

Although the final bill didn't include the arbitration section, it did include the requirement for a meeting of all homeowners where both sides can present their arguments and then vote on whether to proceed. "I'd say this bill is a standing triple, and that's pretty good work," says Kopp. "Sometimes the most important part of persuasion is listening. And we stopped listening about this issue for years. We started listening again this year," says Wist.



From left, former Colorado State Sen. Mike Kopp, NAIOP Colorado Executive Director Kathie Barstnar and Governor John Hickenlooper, following the governor's signing HB 17-1279 into law on May 23, 2017.

The governor signed HB 17-1279 into law on May 23. On June 5, the Colorado Supreme Court gave us the home run we were hoping for by upholding the Colorado Court of Appeals 2015 ruling in a case that gave the developer declarant the ability to require its consent to amend the declarations. In other words, the declarations cannot be changed by a simple vote of the board or the homeowners without the consent of the developer. The court also held that Colorado Consumer Protection Act claims are subject to arbitration.

Business leaders caution that it will likely take time for the housing stock to rebalance, but they agree that this ruling is a significant step forward. Although at the HB 17-1279 bill signing the governor made it sound as if people were just going to rush down and get backhoes in the ground tomorrow, there's a process to go through. That process could take a couple of years. But without HB 17-1279 and the Supreme Court ruling, we knew the problem would only get worse.

"You have now what the developers and the industry have spent five years asking for," Garnett says, "so I think it's on the development community to start meeting pent-up demand. It will take some time, but the pieces are now in place for development to happen." ■

By **Kathie Barstnar**, executive director, NAIOP Colorado

For more information, go to http://www.naiop-colorado.org.

NAIOP represents commercial real estate developers, owners and investors of office, industrial, retail and mixed-use properties. It provides strong advocacy, education and business opportunities, and connects its members through a powerful North American network. **For more information, visit naiop.org.**

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NAIOP chapters provide local and regional education, networking and legislative affairs.

naiop.org
NAIOP's central resource for industry and association news, programs, advocacy efforts and connections.

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Special-interest groups that comprise senior-level NAIOP members in a non-competitive environment for exclusive networking and experience exchange.

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Development Magazine
Current and past issues are available online. Readers can also access an interactive digital version and download a mobile app for Development magazine on-the-go.

NAIOP Research Foundation
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Mobile Apps
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* *This is a listing of NAIOP members who are mentioned in this issue, as well as paid advertisers, which appear in bold.*

2017 Industry Partners

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The New Rate of Progress

"THE 21ST century will be equivalent to 20,000 years of progress at today's rate of progress; organizations have to be able to redefine themselves at a faster and faster pace," wrote author and futurist **Ray Kurzweil** in an essay, "Understanding the Accelerating Rate of Change." I was fortunate to meet Kurzweil a few years ago, and if you have any interest in artificial intelligence, I encourage you to watch the 2014 science fiction movie "Transcendence," which includes many of his predictions.

Jonathan Tratt

We see this progress all around us. Technology is rapidly revolutionizing business, politics and even fashion. Our work habits and offices are built around connectivity instead of a fixed location. We consume news 24/7 and rarely sit down to watch a live evening television broadcast. Even our wristwatches are mini-computers, alerting us to new text messages, tracking our steps and reminding us when to stand up and stretch. Our behaviors and experiences are constantly being transformed.

So too is our industry. The buildings we develop are being constructed with innovative materials; spaces are designed and wired for collaboration; employees expect to be hyper-connected and able to access everything from everywhere, anytime. "Smart buildings" have become the norm as building automation drives efficiencies and cost savings for everything from HVAC to lighting to IT networks. In April, I had the opportunity to attend the NAIOP Washington State strategic planning session, which was held at the cutting-edge Microsoft campus. We toured their innovation center and discussed how the Internet of Things (IoT) will have a profound impact on our lives in the next five years. (Microsoft is even using this technology to grow fresh produce for its employees and guests; to learn more, see "Farm-to-table Dining Goes High Tech at Microsoft" on page 56.)

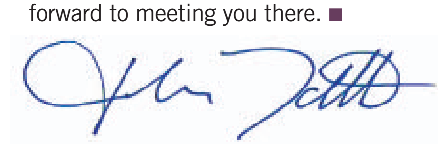
Likely no other parts of our industry have felt the swiftly changing times more than the industrial and retail sectors. Although these were once two separate worlds, the lines between online and brick-and-mortar retailers have been forever blurred. The protracted impact on retailers has been brutal, with retailers like Macy's, Radio Shack, Payless and many others experiencing huge declines in revenue and closing stores throughout North America. Obviously the winner here is the industrial sector, which is benefitting from surges in demand for strategically placed distribution centers to satisfy our demand for same-day or next-day delivery of goods.

Online shopping accounts for just 9 percent of all retail sales, but its impact on the job market is vast. While new jobs in e-commerce have doubled since 2012, this growth hasn't absorbed the job losses at traditional retailers. This reduction in actual employment may be attributed to e-commerce fulfillment being a less labor-intensive industry, thanks to robotics and automation. E-commerce positions are largely located in big cities and tech hubs, not in the rural areas where retailers are reducing workforces or closing doors.

The hotel and resort industry is also being disrupted. In less than a decade, Airbnb has emerged as one of the most valuable private companies in the world. Estimates show that nights booked through Airbnb could hit $18 billion in 2017; that's $2.5 billion in revenue for a company that is expected to go public soon.

In the commercial real estate industry, we must keep pace as yesterday's solutions no longer work in our quickly changing world. This is where your NAIOP membership is of paramount value. You have the opportunity — through your chapter, the National Forums, our educational programs, in advocacy efforts, and through NAIOP publications and research — to stay ahead of the trends driving change and take advantage of the opportunities that abound.

I invite you to join me and 1,500 of CRE's top developers, owners and investors at NAIOP's fall conference, CRE.Converge 2017, October 10-12, in Chicago. You'll be able to talk with the problem solvers, the innovators, the seasoned leaders whose expertise and guidance will help you navigate the curves ahead. I urge you to make this a priority. Don't miss it! I look forward to meeting you there. ■



By **Jonathan Tratt,** principal, Tratt Properties, LLC, and 2017 NAIOP Chairman