Downtown Fort Lauderdale Parking

Presented to:

Fort Lauderdale Downtown Development Authority



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1. Executive Summary

Growth will continue with both in-migration and organically with births over deaths. The continued infill development in Florida's rapidly urbanizing cities will need to coincide with the reduced reliance on single passenger automobiles. In order for the market (users, developers, and the capital markets) to demand fewer parking spaces, existing parking must be utilized more intensively, and investment in transit has to happen to provide reliable alternatives.

Commercial developers are generally comfortable with the current parking situation in downtown Fort Lauderdale. Even with workspace design becoming more dense and residential units becoming smaller, they understand that more and more of the occupants are either living downtown, or taking alternative transportation at least some of the time.

Traffic volumes will continue to grow, but at a progressively slower pace as the new multi modal transportation options mature and more people choose to live in an urban walkable environment. The code should adapt to the pending reality of downtown becoming a transit hub where residents and visitors can enter and exit the city without the use of a vehicle.

Cities across the country and locally have had to creatively manage parking supply. They are reducing parking while providing for a better overall experience through way finding and smart technology.

While accommodating future emerging technologies should be considered, plans need to be flexible, as much remains uncertain. Instead of relying on untested and unregulated technologies, there are reforms which can be implemented today.



The summary recommendations are:

- Comprehensive Parking Study including the implications of loading and delivery
- 2. Establish TOD regulations / parking districts plan for a multimodal city
- 3. Parking Investment Fund maintain facilities and parking related infrastructure
- 4. Reduce Parking Requirements let the market decide



2. Interviews

The group sought input from local stakeholders on the current state of parking for downtown Fort Lauderdale. Viewpoints varied based on industry. Those in the restaurant and retail industries view parking from the business development and logistical perspective. Market demands from the capital and consumer sides drive parking in the construction industry making the construction of new spots a necessary business model. Those stakeholders with an overall view of downtown see the abundant parking and the opportunities for progressive new policies to encourage efficiency.

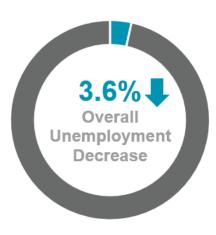




3. Fort Lauderdale Growth

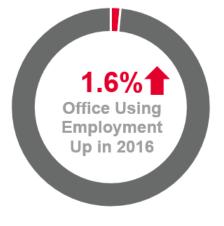


Taking a quick look back before we look forward. Broward County posted positive economic growth through 2017 despite the post-election pause and the brief interruption of hurricane Irma. Overall unemployment decreased to 3.6%, a 100 basis point year-over-year decline. Of note, 4,200 construction related jobs were added in 2017, an almost 10% increase from 2016. Office using employment was up 1.6% over 2016 as downtown businesses continued to expand and new businesses entered the market.



4,200
CONSTRUCTION
RELATED JOBS
were added in 2017
10% INCREASE

From 2016



Relocations from Suburbs to CBD since 2011. The CBD is HOT!!!

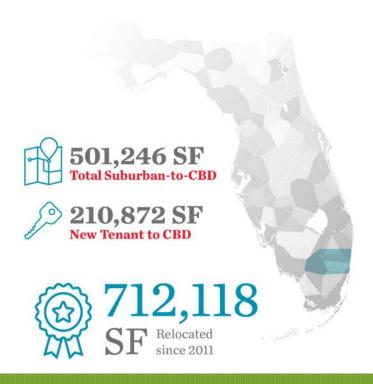
TENANT	SF	RELOCATED FROM
KEMET Corporation	64,095	South Carolina - New to Market
Uniform Advantage	52,683	Plantation
Greenspoon Marder	48,333	Cypress Creek
Becker & Poliakoff	46,349	Hollywood
Prolexic	32,937	Hollywood
Fox Sports	25,000	Sawgrass
Pernod Ricard	21,599	New to Market
Yum! Brands	21,000	Deerfield Beach
Premier Beverage	20,256	SW Broward
Alms Health	19,996	SW Broward
McGlinchey Stafford	19,549	New to Market
Bressler, Amery & Ross	16,158	SW Broward
iCare.com	16,000	Sunrise
Stone, McGhee & Silver	15,298	Cypress Creek
Fanantics	15,295	Plantation
Goldstein, Schechter & Koch	14,922	Consolidation: Hollywood/Commercial
Ameriprise	14,203	Plantation
Sato Global Solutions	14,000	New to Market
Convey Health	11,209	Sawgrass
Pipeline Workspaces	11,207	New to Market
Kaufman Rossin & Co.	11,205	Commercial Blvd.
Northwestern Mutual	11,021	Commercial Blvd.
Tutor Perini	10,625	Commercial Blvd.
Lyoness America	10,150	Brickell
Burr Forman	9,508	New to Market
Blank Rome	8,789	Boca Raton
Axis Communications	8,641	New to Market
GlobeNet	8,332	Boca Raton
Nyrstar	7,169	New to Market
Cole, Scott & Kissane	6,556	Plantation
Results Companies	6,249	Dania Beach
Dickinson Wright	6,241	New to Market
Direct Insite	5,806	Sawgrass
US Anesthesia Partners	5,805	New to Market
Endless Jewelry	5,320	New to Market
Eppy Financial	5,183	Cypress Creek
Vontobel	4,666	Plantation
Unum Life Insurance Co.	4,504	Plantation
BBVA Compass	4,149	New to Market
Allied Steel	4,140	Cypress Creek
Young Berman	3,753	Weston
GQG Partners	3,705	New to Market
Kolter	3,500	New to Market
	0,000	to manter



Madison Marquette	3.365	Boca Raton

Relocations from Suburbs to CBD since 2011

TENANT	SF	RELOCATED FROM
Cole Scott Kissane	3,332	South Carolina - New to Market
QIC	3,276	New to Market
Mad Studios	3,257	Sawgrass
Hensel Phelps	3,247	New to Market
CoStar	3,209	New to Market
ProLogis	3,176	Port Everglades
Smith, Rolfes & Skavdahl	3,162	New to Market
JDSU	2,791	California - New to Market
US Debt Ventures	2,681	West Broward
Gresham, Smith & Partners	2,597	New to Market
Puma North America	2,576	Miami Beach
Erisa Pension Systems	2,500	North Miami
Findly Talent	2,470	Boca Raton
David DiPietro Law	2,430	New to Market
Amherst Pierpont Securities	2,215	Boca Raton
Langan Engineering	2,096	New to Market
Brilliant Engineering	2,030	New to Market
SGM Engineering	1,693	Deerfield Beach
MSH International, Inc.	1,693	Sawgrass
Glass Ratner	1,670	Brickell
Partner Engineering	1,546	California - New to Market





2018 Outlook by the Numbers

Fort Lauderdale looks poised to see a transformative Wave (streetcar pun intended) in the final stages of this development cycle. ULI's own 2018 Market Outlook survey placed Fort Lauderdale as the number SIX market in the U.S. for opportunity in investment and development. As the cycle matures, investors and developers tend to look to smaller, secondary markets for more yield, margins, and upside. This is the first time ever that Fort Lauderdale has been in the top ten of the study. Investors are looking to replicate the success they have had in the larger Miami market to the south.







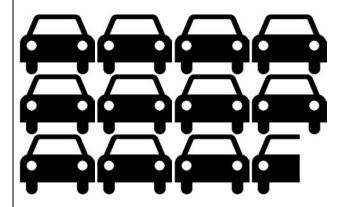
Based on the current MARKET parking DEMAND the projects <u>under construction</u> will require the following number of new parking spaces for each use category: Residential 2,039 spaces; Hotel 340 spaces; Office 236 spaces; Retail 202 spaces

TOTAL: 2,817 spaces



BASED ON THE CURRENT MARKET PARKING DEMAND the projects that are <u>approved but not yet</u> <u>under construction</u> will require the following number of new parking spaces for each use category: Residential 9,031 spaces; Hotel 166 spaces; Office 596 spaces; Retail 930 spaces

Total: 10,723 spaces



Our Thougths on the Future

We concur with the optimistic view of Fort Lauderdale. On a macro basis there is \$154,000,000,000 in "dry powder" development funds looking to be deployed in 2018. Fort Lauderdale should expect its share of that activity, especially with the number SIX ranking in the ULI 2018 Outlook. While the real estate industry expects capital to become more expensive over the next few years, with the tax cuts and low unemployment forcing the Federal Reserve to move the Federal Funds rate higher, we believe there is still a relatively long runway for what is historically "cheap" money. On a more micro level we feel the demand for housing units (except workforce housing) and hotel room nights will be met with the pipeline of approved projects and projects that are already under construction. The office market could use more supply to keep prices in check, although the growth in co-working (workspace as a service) and the fact that many technology companies are maturing into more premium office space, might result in office absorption rates for any new product that pleasantly surprise us all.

The focus on the increased transit options, the implementation of Complete Streets, and the enhancement of the street experience in the entire downtown RAC should remain priorities. Parking will continue to play an important role in this planning process as the changes in mobility, behavior, and technology happen in an evolutionary manner, despite what the media will have us believe. Positioning the Downtown RAC to accommodate the parking needs of the current development, while planning for the longer term changes in the density and functionality of the City, and guiding changes in the use of the automobile, create a delicate three legged stool. We hope our guidance in this presentation can help with engineering a balance and inspiring the thought leadership necessary for a new Fort Lauderdale.

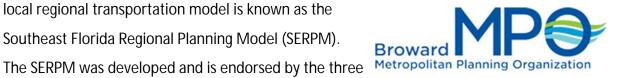




4. Impact of Vehicles with Growth

In order to determine the vehicular impact on Downtown growth as a result of the expected overall growth in the area, a review of the area's regional transportation model was conducted to compare the growth in traffic volumes within the general area of the City's Regional Activity Center (RAC) – City Center (CC) District against the growth in overall socioeconomic data. The

local regional transportation model is known as the Southeast Florida Regional Planning Model (SERPM).



(3) counties in which in encompasses- Palm Beach, Broward, and Miami-Dade County. The model is maintained and developed by the Florida Department of Transportation (FDOT) and the

County MPOs. Areas within the SERPM model are subdivided into Traffic Analysis Zones (TAZs) which identify the expected growth in various sectors represented by socioeconomic data. Using this data, along with the calibrated and verified transportation network, generates traffic volumes on the roadway network.

The SERPM includes both a Year 2010 model which attempts to replicate/calibrate existing socioeconomic



data by TAZ and the associate base year traffic volumes. A year 2040 model is also developed to

predicted both the expected socioeconomic growth and the resulting traffic volume growth within the tri-county area. Using this information, a relative comparison

Population/Households 3.3% 0.8%

Annual Growth Rates

between socioeconomic growth within the RAC-CC and the associated growth in traffic volumes from both year 2010 and 2040 was conducted to determine if both indicators an expected to grow at a similar pace. The data indicated that, within the RAC-CC area, socioeconomic



(population/households) growth I expected to grow at an annual rate of 3.33 percent while traffic growth is expected to grow at a significantly lesser pace at 0.8 annually.

The difference in growth rates could be explained in several ways. Traffic volume growth is constrained as transportation network capacity is expected to remain general constant in the future with no major planned roadway or transit capacity projects. Therefore, volume growth is slowed by capacity/congestion constraints. Also, shifts in modes from automobile to alternatives such as transit may have an impact. Finally, the general urbanization of the area where the population in the area no longer needs to travel by automobile for work, essential services, entertainment, etc., reducing the rate of traffic volume increases in the Downtown. The result is likely a combination of all of these factors.



5. Requirements Needed for Growth

Existing RAC Parking Requirements

The following key items were identified as part of a review of the existing RAC parking requirements within the City/DDA boundaries:

- DDA boundaries encompasses nearly all of the Downtown Regional Activity Center
- Downtown RAC divided into seven (7) Districts that define parking requirements
- Residential Uses Exempt up to 2 spaces per unit depending on District
- Commercial Uses Exempt to full City Code depending on District/Location
- Reduced parking requirement based location in RAC, not proximity to other modes
- No gradual parking code requirement transition between RAC-CC, some other RAC Districts, and properties outside the RAC
- Current parking code allows for uses to park beyond code requirements

Example Approaches

Several local and national approaches to urbanized parking requirements were identified as part of this project. Three (3) approaches for differing communities are highlighted below. Note that more detailed review of the City of Hialeah Transit Oriented Development (TOD) parking regulations can be found in a later section of this report

- City of Miami/Miami 21
 - Residential: 1.5 per Unit (no parking req. in specific zones in CBD)
 - o Commercial/Retail: 3 per 1,000 s.f.
 - 30%-50% reduction within Transit Oriented Development (TOD)
 - Off-site parking within 1000' permitted; additional parking reductions permitted near transit stations
- City of Hialeah Transit Oriented Development
 - Parking in-lieu permitted within payment into Parking Improvement Trust Fund
 - Residential: 1 bedroom: 1 per unit on-site or off-site within a parking structure or payment — in-lieu of one into the Parking Improvement Trust Fund. 2+ bedrooms: 1.5 per unit on-site or off-site; or provide one space per unit on-site or off-site and provide payment-inlieu of remaining one-half space into the parking improvement trust fund.
- Commercial/Retail: 3 parking spaces for each 1,000 s.f. Can be reduced to 2 spaces per 1,000 s.f. with payment in-lieu of remaining required one space into the parking improvement trust fund
- Off-site parking within 1000' permitted





- City of Minneapolis Downtown Districts
 - Maximum parking rates only for each use (Code of Ordinances Table 541-1):
 - o Residential –1.5-1.6 spaces per unit
 - o Food and Beverage 1 per 200 s.f.
 - o Office 1 per 1,000 s.f.
 - o Off-site parking within 500 feet permitted in Downtown District



Recommendations

Unfortunately, there is no "one size fits all" solutions to parking regulations. Parking trends across the nation fluctuate significantly depending on geographical location and the overall infrastructure of a city. However, in larger, denser urban areas the trend indicates that parking needs are slowly decreasing, this is in part due to the disruption of car sharing services like Uber and Lyft.

The rules and regulations of a City, or any government, are a direct reflection of their priorities. For decades' urban plans and zoning regulations have been dominated by vehicles which has resulted in car centric urban landscapes. As Fred Kant said: "If you plan cities for cars and traffic, you get cars and traffic. If you plan for people and places, you get people and places." Cities with significant populations, like Fort Lauderdale should promote density in their downtown cores and invest in their public transit to transit trends by incorporating Transit Oriented Development (TODD) standards into their urban design guidelines. Any changes in regulations should not stifle any new development but rather allow the market to dictate the need for parking. Modifying the parking regulations of a city is will have severe impact in the future development of a city which is why careful and extensive analysis is recommend.

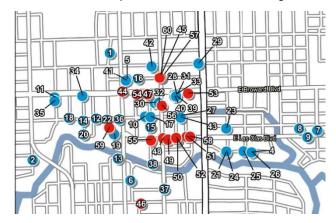
Our initial recommendations are;

- Comprehensive Parking Study
- New Regulating Map
- TOD Regulations
- Parking Districts
- Parking Investment Fund
- Reduce Parking Requirements
- Parking Structure Adaptive Re-Use



A. Parking Study

The first step of our recommendations is to do a comprehensive parking study of Downtown Fort Lauderdale. It's imperative to understand the current parking landscape of the city to identify opportunities and trends in under-served and over-served areas. Understanding the current parking supply of Public and Private facilities is crucial to find opportunities and synergies between existing infrastructure. This will also allow the City to address the specific needs of each neighborhood.



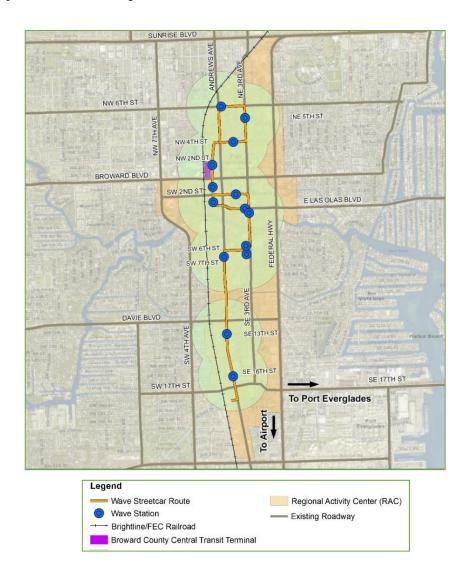
Public- Parking Garages in Fort Lauderdale



Future Developments in Fort Lauderdale

B. New Regulation Map

The following step recommended is to re-envision Fort Lauderdale zoning map based on current and future transit routes. As seen below, the map should include transit stations and transit corridors as the main hubs. From these hubs, we can then redraw the map based on proximity to these locations, making transit the core of that area. The standard walking shed from these hubs should be a quarter mile radius which represents a 5-minute walk. As seen in the map below, the vast majority of the Fort Lauderdale's RAC is already within the walking shed of the main transit lines.



C. TOD Regulations

With a re-envisioned map, Transit Oriented Development (TOD) standards can be incorporated into the existing zoning code. This represents a change in philosophy. It's a change in priorities, shifting away from vehicles dominant designs to people and transit centric environments. Transit Oriented Development can improve public health, create more sustainable communities, and strengthen local economies,

Given the number of overlays already existing within the Downtown Fort Lauderdale, this represents an opportunity to re-conceptualize the zoning code by creating a master plan for the downtown area.

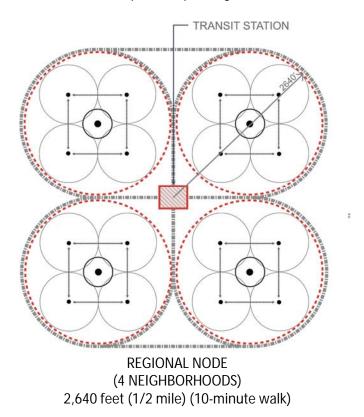




Hialeah TOD. Image from PlusUrbia

D. Parking Districts

As part of the TOD regulations and in combination with the initial Comprehensive Parking Study, the study area can further be subdivided into Parking Districts. The fundamental idea is to create an environment where the parking is consolidated and individuals can park and walk to several locations without having to use the car for each destination. Instead of having people drive to each of their destinations, this promotes pedestrian traffic and alleviates the burden to provide parking on site.



E. Parking Investment Fund

The creation of a Parking Investment Trust should be considered to help finance and improve the quality of parking and transit infrastructure in the area. Once the fund is created, the city can establish a Fee-per-Space price so developers can make a Payment-in-Lieu instead of building on-site parking. How the funds may be disbursed must be clearly identified during the creation of the fund. For example, funds can be used to improve, maintain, and repurpose parking structure. The funds can also help facilitate Public-Private-Partnerships and speed-up the regulatory process.



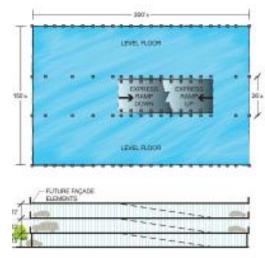
F. Reduce Parking Requirements

In adopting new TOD guidelines, it also important to readjust the off-street parking regulations. This can be done by replacing minimum parking requirements with parking maximums. Parking minimums don't allow the parking supply to readjust to the fluctuations of parking demand. By eliminating minimums, it opens up the possibility for development projects with no on-site parking for all uses. When combined with centralized parking and reliable transportation options this can help promote walkability and reduce the need for more automobile use.

The influence of the capital markets over parking requirements should not be underestimated, since development projects will not qualify for financing if they don't reach the bank's parking benchmarks. Reducing the amount of on-site parking will also help make buildings more affordable and help smaller scale buildings feasible for development.

G. Parking Structure Adaptive Re-Use

As our transit habits change, our design guidelines for parking structure should adapt as well. Designing parking structures that can be repurposed for other uses during their lifetime is more expensive, but can help extend the 50-75 life span of these structures. By creating a series of incentives, or even a point system, developers can be encouraged to build upgradeable parking facilities.





For example, the standard floor-to-floor of a garage today is 10-11 Feet, but 12 feet is recommended for adaptive re-use. Sloped floors slabs are efficient for parking uses however they are not suitable for other uses. The structure should be designed in a way to allow for additional vertical circulations to be easily implemented later.



6. Other Mass Transit Opportunities

In order to determine the impacts of future transit opportunities, it is important to understand the proposed operations of each of the systems and their impact on the RAC-CC. The following sections summarize both transit opportunities and other alternative mode options for the Downtown:

Brightline

Brightline offers/will offer intercity rail service with 32 trains per day – 16 northbound/16 southbound with stations in Downtown Miami, Fort Lauderdale, West Palm Beach, and Orlando International Airport. First mile/last mile amenities including rideshare/taxi station, bus connections, and car rental will be provided at each station.



The Wave

The Wave, if constructed, will provide a Modern streetcar line connecting Sistrunk Blvd. to Broward General Hospital. It will include approximately 7 stations within the RAC with 10 to 12-minute headways during peak periods



Coastal Link

Coastal link, while in the planning stages, will eventually offer Future commuter rail service along FEC corridor providing service to both major cities and suburbs throughout South Florida. The exact station locations and the expected service rate has not been defined at this time.



Bus Service

Numerous bus routes currently serve Downtown through the existing Central Terminal adjacent to the Brightline station. Currently seventeen (17) bus route serve the area.



B- Cycle Bicycle Sharing Program

Three (3) B-Cycle stations within Downtown area providing additional options for first- and last-mile travel local mobility.



The Brightline and Wave services have the potential to transform mobility within the Downtown area which may result in a significant shift away from automobile traffic by eliminated the need for an automobile travel in the area. This shift would cause a reduction in parking demand within the Downtown especially within areas that are reasonable waling distances from these options.



An ¼ mile walking buffer analysis was conducted for these alignments/stations within the RAC to determine how much of the study area may potentially be impacted by these new transportation mobility options. As indicated, nearly entire RAC-CC area and DDA boundary would fall into the subject buffer. This analysis may be a useful approach to more aggressive parking standards that limit the number of parking spaces constructed/required/allowed within these zones.



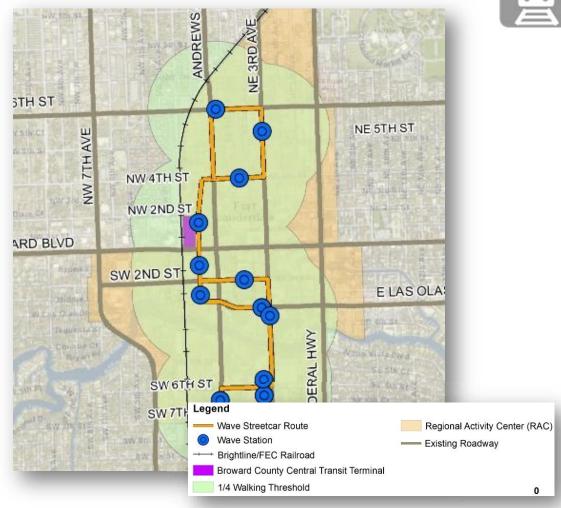
A. New Map

- Transit as the guiding principle
- Walking radii based on transit stations and transit corridors
- Use Wave stations and Brightline Terminal as hubs
- Create higher density around transit to encourage use of public transit
- Rethink zoning parameters and parking requirements with in these areas





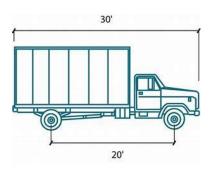




7. Loading & Deliveries

Existing Loading/Delivery Requirements

The current City code requirements for loading/deliveries vary from None, Type 1, and Type 2. Uses that require no delivery/loading space generally assumed that the use can be serves from the street or within the on-street parking area. Uses that require at Type 1 space area assumed to be served by a single-unit truck in which the vehicle would park with the off-street parking lot aisle or within the site's off-street parking spaces that are in excess of the parking requirement.



Typical Single Unit Truck

Type 2 loading space requirements are required for uses that may need to be served by a larger WB-40 (wheelbase of 40') truck within a designated 12' X 45' space with no backing into the right-of-way.

Within the RAC, residential uses are not required to provide any loading area. Therefore, any residential movers would be permitted to load within the street if the multi-family development did not provide any off-street loading provisions. Commercial uses would be required to provide loading consistent with City code. Generally, the number and type of loading spaces are determined by the general use type and the associated square footage or density. It should be noted that some uses such as schools, colleges, hotels, and residential developments are not required to provide any designated loading areas.

Example Approaches

The current approach within the City does not foster the use of a centralized, common, designated, on-street loading network consistent with other urban cities in the nation.

Several cities with these programs were identified as part of our research:



- City of Miami Beach, FL
 - Little/no off-street loading opportunities in compact urban areas, especially in Historic



District

- Designated on-street loading areas, permitting processes, and enforcement policies/staff
- Washington, DC
 - Creation of Downtown Curb-space Management Plan
 - Has designated larger loading spaces to improve usage and compliance
 - o Goal of 1 loading space per 100,000 square feet for commercial space
- Boston, MA
 - Bands certain deliveries to and from certain areas during busy times
- New York City, NY
 - Charges for loading bay usage with an accelerating rate schedule to increase the turnover. In the past NYC, reserved a number of parking spaces in midtown Manhattan for deliveries between 7 AM and 6 PM. However, this protocol added to the existing congestion of NYC. In response to this, New York City's Commercial Vehicle Parking Plan, added loading bays and implemented a graduated rate structure. NYCDOT's evaluation found that curb occupancy dropped from 140% to 95%.

Findings & Recommendations

Based on the analysis research performed, the following was concluded:

- The current loading zone requirements in City Code is limited/outdated.
- As density increases, Downtown will experience increase in congestion from on-street loading
- City should proactively address current code requirements for each use for loading location (onor off-street), bay size, & number of bays
- City should consider Implementation of a more stringent review of loading bay design/operations for new developments



Investigate the need/requirements for a consolidated on-street loading program including number of zones, locations, design, feasibility, enforcement, operations, etc.

8. Autonomous Vehicles

Today, the average car is parked 95% of the time, with only 5% on-the-road time. Worldwide, urban drivers spend an average of 20 minutes per trip looking for parking, as driverless technology continues to improve, so does parking. In the next future, parking will be completely redefined just as cars will be. Without the need for drivers, cars can be managed by robots or can use the self-park technology. Parking garages will not require customer stairs, elevators, reducing the separation between the parked cars and will not require wide alleyways to allow access to individual cars, will also be able to offer refueling (or recharging), maintenance, and other services.

As driverless cars become the norm, many parking's will be designed so as to only allow access to autonomous vehicles, which will include a number of delivery and commercial driving units.

Ultimately, self-driving cars will change driving patterns, which is going to change city traffic and ultimately city planning.

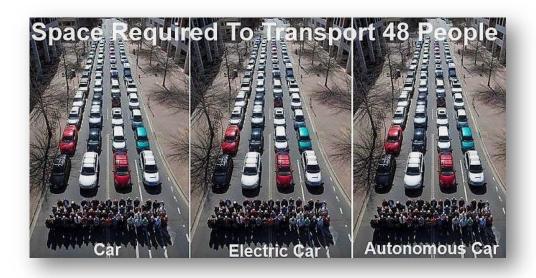
<u>Positive Outcome</u>	<u>Issues</u>	<u>Negative Outcome</u>
Automated car sharing will be promoted from the start.	Sharing	AVs will be promoted as private luxury goods for affluent elites.
AV use will be available to most people due to policies aimed at maximizing social inclusion. Measures will be considered to maximize AVs affordability and accessibility.	Social exclusion	AVs will only benefit people with the ability and willingness to pay for a privileged transport mode, or vulnerable groups will be encouraged to live in and use AVs, and travel under constant scrutiny.
AV development and implementation will be regulated taking into account strong environmental concerns.	Environmental sustainability	AVs will be developed and implemented with little consideration of sustainability or environmental concerns.
AV operating systems will be programmed based on	Operated cooperation	AV operating systems will be programmed using



cooperative, altruistic and ethical principles.		competitive, aggressive and defensive principles.
National and local policies will continue to support public transport services	Public transport	National and local policies focus too much on AVs and fail to support public transport, resulting in reduced transit services in many places.
AV policies and programming respect human life. They minimize crash risks and protect vulnerable road users (e.g., through lower speeds).	Intermodal traffic regulations	Public policies and planning practices will favor AV occupants over other road users, and so will favor affluent over more vulnerable groups.
to make more sustainable and efficient decisions regarding route choice and parking at a fleet level	Network information systems	There will be little to no developments of public information systems that facilitate overall efficiency and sustainability. Information is available based on users' ability to pay.
Personal data will be carefully managed or not recorded, and collected based on general public interest.	Sensitive data management	Data is stored and used for commercial or societal control purposes. AVs are used to collect more and increasingly sensitive private information.
Policies facilitate the conversion of parking facilities into recreational, green, and building areas, or into active transport infrastructure.	Parking	Parking policies remain as they are, so parking continues to consume valuable land that could be used for more sustainable or social purposes.

Positive Outcome	<u>Issues</u>	<u>Negative Outcome</u>
The built environment becomes a more attractive place to live. Transport policies promote quality of life.	Land use policies	The built environment is reshaped to accommodate the ever-increasing needs of AVs, to the detriment of other groups.
Transport networks are designed to be safe for all. Urban transport planning favors sustainable transport modes.	Transport network design	Transport networks are restructured to accommodate AVs' needs. Other modes see no comparable protection or investment.

Impact	Time Period	Now	2020	2030	2040	2050	2060	2070	2080
Become legal	2018-25								
Increase traffic density by vehicle coordination	2020-40s								
Independent mobility for non- drivers	2020-30s								
Automated car-sharing/taxi	2030-40s								
Independent mobility for lower- income	2040-50s								
Reduced parking demand	<mark>2040-50s</mark>								
Reduced traffic congestion	2050-60s								
Increased safety	2040-60s								
Energy conservation and emission reductions	2040-60s								
Improved vehicle control	2050-70s								
Need to plan for mixed traffic	2040-60s								
Mandated autonomous vehicles	2060-80s								



9. Model Cities

Other cities across the country have overcome similar challenges to parking policy as Fort Lauderdale. Cities such as Austin, Seattle, and Columbus have conducted comprehensive and progressive parking reform. The implementation strategies range from encouraging sharing, to creating smart technologies to share information.

A. Seattle, WA

Recently passed comprehensive parking reform:

- Building owners could rent out excess parking, in both commercial and residential buildings, to people who do not live or work in the building
- Apartment buildings would be required to "unbundle" the costs of renting a
 parking space from the cost of renting an apartment
- More areas of the city would be classified as being near "frequent transit service," meaning developers can build housing there without providing offstreet parking.



B. Austin, TX

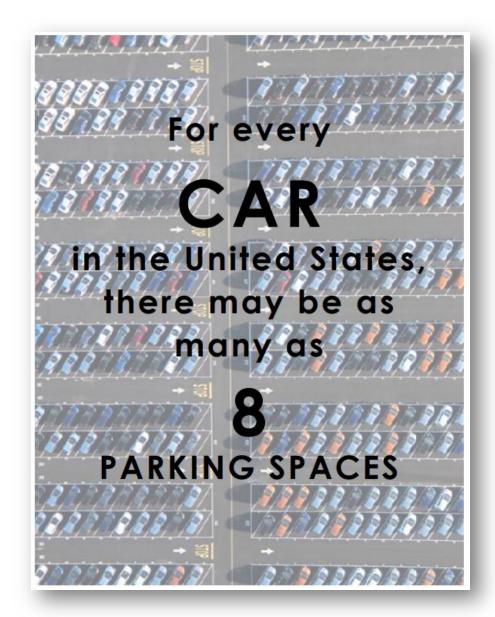
- The pilot program offers evening/night employee parking for \$35 per month. Passes can be shared among employees, further increasing the program's affordability.
- Revise the zoning code to better support walkable, mixed-use development within the downtown.
- Fully invest and implement comprehensive parking signage and wayfinding system.



C. Columbus, OH

- Utilizing SMART technology to collect data and develop an app to indicates delivery zone availability
- Create a Connected Visitors app, which include travel time information, route guidance, and parking availability. particularly as they relate to local events.





10. <u>Bio's</u>



John McWilliams, P.E. Vice President Kimley-Horn and Associates

John McWilliams has nineteen years of traffic engineering, transportation planning, and access management experience, 17 of which have been in South Florida. His practice includes traffic impact studies, corridor studies, operational analyses, and signalization design for both private- and public-sector clients. John has been especially successful in developing creative operational roadway improvements in constrained areas by combining his transportation planning knowledge with his design expertise. John has served as the lead transportation consultant for major developments such as Miami Worldcenter in Miami and The Diplomat Golf & Tennis Club redevelopment in Hallandale Beach. He has also led ral major transportation studies for the Florida Department of

several major transportation studies for the Florida Department of Transportation and the Miami Downtown Development Authority.

Additionally, John was an integral part of the project team for the US 441 Prospect Road "Breeze" Bus Queue Jumper signal design, a pilot program for FDOT District Four that demonstrated technological advances in public transit. John is currently the deputy project manager for the Interstate 95 Corridor Study for FDOT District Six, which consists of identifying the critical long-term needs of this corridor. John earned his Bachelor of Science in Civil Engineering from Ohio Northern University in 2000 and is a licensed Professional Engineer in Florida. He is member of the Institute of Transportation Engineers (ITE), and he and his wife are active volunteers for Good Karma Pet Rescue, a 501(c)3 organization based in Broward County.



Leonardo CollFounder Alco
International Group

Leonardo Coll was born in Venezuela in 1960. He graduated in 1981 as a civil engineer with a Master in Structural Engineering. Married have three sons, he started his construction and real estate company in 1996 developing more than 15.000 houses, condos, commercial etc. Becoming one of the top 5 in the country, now he is expanding to the United States and Panama.

As President of the Construction Chamber in Aragua, Venezuela for many years he participated on many community activities on the health area creating better conditions for the most needed people.



Mark Pateman Managing Principal Cushman & Wakefield

Mr. Pateman began his legal career at Cadwalader, Wickersham & Taft in New York providing transactional legal advice to banks, life companies, and other financial institutions. Upon moving to Florida full time in 1998, he joined Shutts & Bowen, LLP where he expanded his real estate practice to include acquisitions and dispositions, title insurance, leasing, development, and related corporate matters, representing a wide range of clients from entrepreneurs to large institutions. He has extensive experience closing complex transactions such as Section 1031 exchanges and build-to-suit ground leases. After leaving the full-time practice of faw in 2002, Mr. Pateman opened Empire Resources, LLC a brokerage and consulting firm. His expert lease negotiation skills, wide array of

marketing expertise, and broad business network make him a valuable asset to the Cushman & Wakefield team. Mark currently manages the West Palm Beach and Boca Raton office with 25 brokers, 4.5M SF of Agency leasing portfolio, an average of 400,000 SF of occupier representation per year, and an average of \$400M of investment sales in any given year.

Mr. Pateman has been involved as an attorney and broker in many significant projects in south Florida including: Phillips Point; Esperante; Sanctuary Center; Yamato Office Center; Centrepark; Centurion Tower; Northpoint Business Park; Bank of America Tower; Royal Palm Center; 1700 Palm Beach Lakes; 3399 PGA Boulevard; the Catalfumo portfolio; 3300 PGA Boulevard; 303 Banyan; 3801 PGA; 2255 Glades Road; Plaza Center; Gardens Plaza; Sabre Centre; 750@Park; 324 Royal Palm Way; 400 Royal Palm Way; 125 Worth Avenue; and Clearlake Plaza. Mr. Pateman is a graduate of the University of Miami Juris Doctor, cum laude (Florida and New York) and Skidmore College in Saratoga Springs, NY, Bachelor of Arts in Government, cum laude.



Paul Calvaresi Local Governmental Services Manager Broward MPO

Paul Calvaresi is the Local Governmental Services Manager. Mr. Calvaresi has over 10 years of experience in public service. He holds an undergraduate degree in Business Administration from the University of Florida and a Master's Degree in Urban and Regional Planning from Florida Atlantic University. During his time at the Broward MPO, Paul has worked on a variety of projects ranging from financing, public engagement, local community transit, and mobility hubs. Paul is also an active member of the local community, siting on boards for the Urban Land Institute and the Greater Fort Lauderdale Alliance.





Robin Jones Project Manager Plaza Construction

As Project Manager for Plaza, Robin Jones oversees all phases of preconstruction and construction. She prepares project plans, cost estimates, project schedules, and coordinates subcontractor activities and field logistics plans. She will also be involved with activities related to site safety, quality, and project administration, along with subcontractor and owner negotiations. Robin has over 12 years of construction experience working on a variety of significant residential, retail and transportation/infrastructure projects. This experience, coupled with her established subcontractor relationships, will ensure an on time, in budget completion of your project.

EDUCATION AND REGISTRATIONS

- New York University, MS in Construction Management, 2014
- SUNY Purchase College, Bachelor of Arts in Liberal Studies: Legal, 2011
- OSHA 10 & 30 Hour Certified



Santiago Eliaschev Principal RED Group

Santiago Eliaschev is Principal of RED Group, a boutique real estate brokerage and design firm based in Miami, FL. Santiago has over twelve years of experience working in architectural and urban design projects all around the world, including North and South America, Asia, and the Middle East. This has given him the opportunity to work in projects of all scales, ranging from urban interventions to single family homes. Additionally, Santiago is a licensed real estate broker and has over five years of experience in residential and commercial real estate. By combining his expertise in zoning, architecture and real estate, he has a unique perspective of the market and a keen ability to gauge value beyond what is readily visible. Santiago is also a team member at PlusUrbia, an award winning urban design firm recently commemorated for

leading the Wynwood Neighborhood Revitalization District (NRD). Santiago currently serves as a Member of the Transit, Connectivity and Mobility Committee at the Miami Downtown Development Authority (Miami DDA). He holds a Bachelors in Political Science from Brandeis University and a Masters in Architecture from the University of Pennsylvania.