



2017

Downtown Parking Management Plan



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Downtown Parking Management Plan

Downtown Parking Management Plan

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1.0 Study Background & Purpose

The primary goal of San Leandro's parking study is to understand and analyze various policy opportunities and their impacts on different user groups in the downtown. Based on parking inventory, utilization, and turnover data collected previously, this study analyzes how and where different user groups are parking, and how various policies can be used to improve the efficiency of the parking system for all users.

Parkers in Downtown San Leandro can be divided into partial-day and all-day users, and include BART riders, employees of Downtown businesses and offices, shoppers, and residents of adjacent neighborhoods. Parkers with longer-term parking needs, such as BART riders and employees of Downtown businesses, impact the parking system in specific ways. The 2013 Downtown San Leandro Parking Study Strategies and Recommendations Memorandum showed that adjacent residential neighborhoods experience spillover parking from the San Leandro BART station. In addition, many Downtown employees use time-restricted parking spaces for long-term use, moving their cars to other time-restricted spaces once they reach the parking time limit or taking other measures to evade enforcement. Employee utilization of time-restricted parking spaces reduces the number spaces adjacent to retail and commercial businesses that are intended to be available for Downtown visitors which may potentially negatively influence the sustainability of Downtown customer oriented businesses.

The purpose of this study was to perform more in depth analysis on parking behaviors, to estimate future parking demand and to understand stakeholder needs through a series of community engagement activities. The information collected and analyzed in this process has been used to help shape and develop a new parking management strategy for the downtown.

1.1 Stakeholder Outreach

Stakeholder outreach for the project included workshops with business and resident groups as well as weekday and weekend intercept surveys to capture visitor sentiment. Stakeholder feedback reinforced that there is a perceived challenge regarding the availability of parking in Downtown San Leandro and that identifying potential and appropriate remedies is worthy of the City's resources. As demonstrated in the survey results (*detailed in Appendix A – Stakeholder Outreach Summary*), there are currently a wide range of perspectives regarding pricing and parking time-limits. According to visitors surveyed, parking supply is mostly sufficient if you are a visitor and do not require more than 2 hours of parking. Support for a residential preferential parking (RPP) system by respondents received a forty-one percent approval, with an additional twenty-three percent neutral/no opinion of its effects. Such results, with nearly one in four respondents indicating that they are neutral/no opinion of potential effects of a new parking strategy, indicate that there is a significant opportunity for education. People are unsure how the parking system in the City truly works and could greatly benefit from educational oriented outreach material that bring residents up to speed on existing and future parking issues. The strongest consensus among the stakeholder outreach existed in the following areas:

- Strong support to make changes in time-restricted parking requirements and enforcement;
- Widespread recognition that the City's current parking facilities are underutilized and need improved wayfinding; and
- Observation that current parking management results in difficulty in finding convenient parking during peak weekday noon, weekday evening, and weekend afternoon times.

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1.2 Existing Conditions

The existing conditions for this study are based on the data collected and analyzed for the 2013 Downtown San Leandro Parking Data Analysis. Data was collected by the City of San Leandro using vehicle-mounted mobile License Plate Recognition (LPR) devices and garage-mounted LPRs. Data was collected hourly from 9 AM to 6 PM over two days, including one weekday (Tuesday, September 10, 2013) and one weekend day (Saturday, September 7, 2013). The full 2013 report is provided in Appendix B.

Weekday Overall Occupancy Trends

Weekday occupancy levels experience a gradual increase in the morning hours between 9 AM and 11 AM and then remain relatively constant throughout the day until 4 PM, when occupancy begins to decrease. Among the various parking areas, the periphery on-street spaces experience the highest occupancies throughout the day, peaking at approximately 64 percent, while the core peaks at 52 percent midday.

Weekday Peak Occupancy

The overall weekday peak occupancies are between 1 PM and 2 PM when overall occupancy reaches 55 percent (See **Figure 1** Below). The parking facilities and blockfaces west of East 14th Street experience a high amount of parking demand when compared with those east of East 14th Street, as the majority of blockfaces west of East 14th exceed practical capacity during the peak hour. In addition, the Washington Plaza and Pelton Center facilities on the west side of East 14th Street are the only two off-street facilities to exceed 70 percent. This higher amount of occupancy is because these facilities serve the downtown retail core and the neighborhoods immediately east of the San Leandro BART station are impacted by spillover from BART parkers.

Weekend Overall Occupancy Trends

Weekend occupancy levels experience two different trends for on-street and off-street parking. On-street occupancy levels experience a slight shift in parking demand between the core and periphery, as the periphery observes the higher demand in the morning followed by the core in the afternoon and followed again by the periphery in the late afternoon; overall, occupancy levels remain consistent between the core and periphery at approximately 48 percent throughout the day. Off-street occupancy levels exhibits a single occupancy peak in the afternoon between 1 PM and 2 PM at approximately 47 percent. Overall weekend occupancies do not exceed 50 percent during any time period analyzed.

Weekend Peak Occupancy

The overall weekend peak occupancies are between 1 PM and 2 PM when overall occupancy reaches 48 percent. Although, the Washington Plaza Lot (South) and Pelton Center Lot continue to exhibit the highest occupancies among the off-street facilities during the weekend; generally, the weekend peak exhibits fewer on-street blockfaces exceeding practical capacity west of East 14th Street as compared to the weekday. This validates the earlier observation that the high weekday on-street occupancy west of East 14th Street is likely due to its close proximity to the San Leandro BART station, as commuters may be attracted to free on-street parking near the station. This is not an issue on the weekend when BART does not charge for parking and the demand is low at the station parking. In addition, the blockfaces with parking meters surrounding the Washington Plaza Lot and the Pelton Center Lot do not experience high occupancy, suggesting that users attracted to the area for retail purposes are not spilling over to

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the on-street metered parking or to the neighboring blockfaces. This is likely because the ease of evading parking restrictions and the sufficient supply in the core lots make parking there very convenient for most users.

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DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS

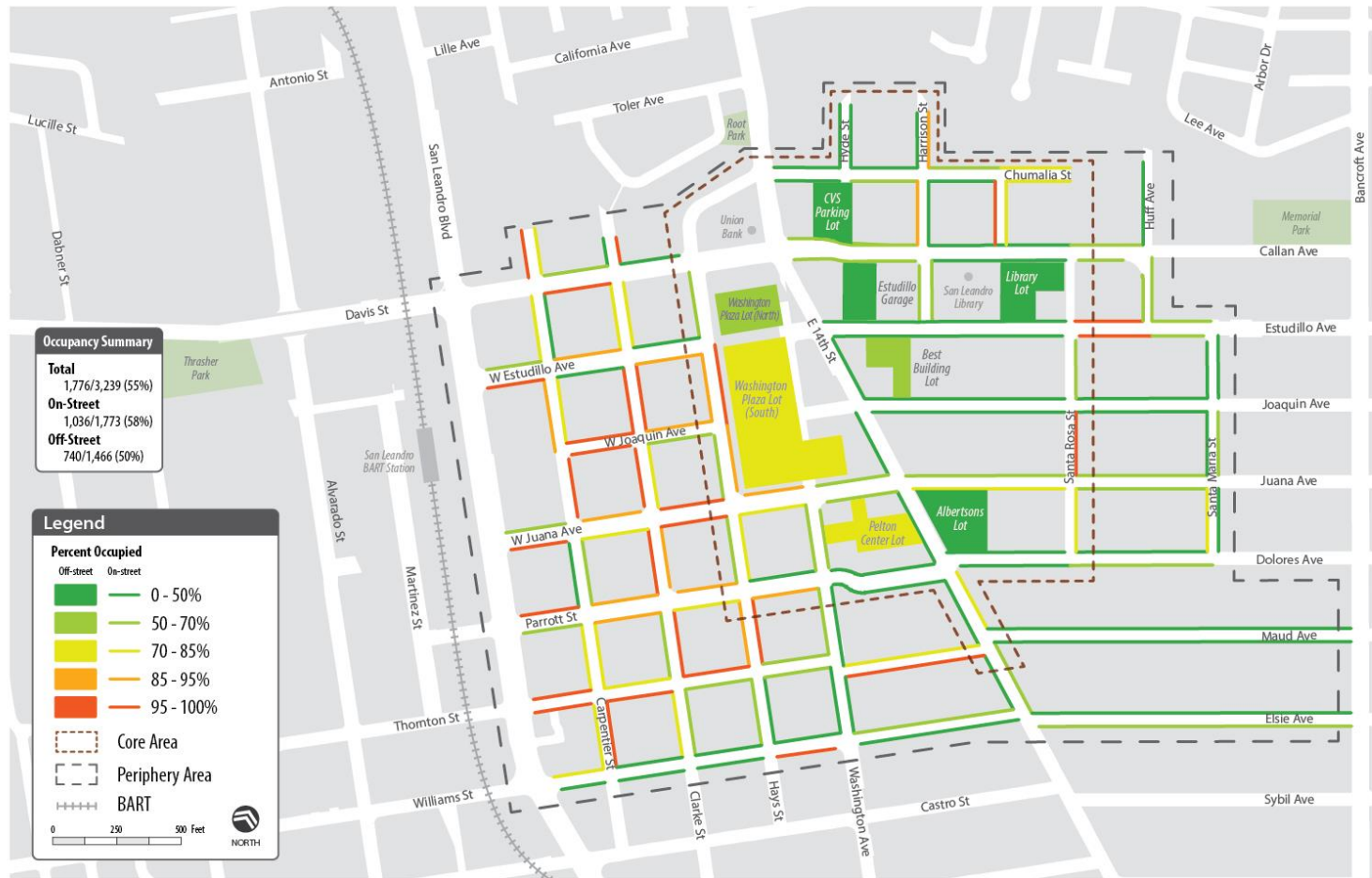


Figure 1
Weekday Peak Hour Occupancy 1:00PM - 2:00PM

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Duration Analysis

The parking duration analysis is presented in terms of observed distribution of “parking events” by length of stay. A parking event is defined as when a vehicle is observed to occupy a single space during one observed time-period during data collection.

Table 1 presents the length of stay by space type for the study area between 9 AM and 6 PM for the weekday. The average user parking on-street in the periphery stays for about an hour longer than a user parking in the core area. This is likely due to the higher amount of unregulated parking in the periphery area. Only 50 percent of on-street parkers stay for an hour or less, likely indicating that some on-street parkers are nearby residents or commuters who park in free unrestricted parking areas. Slightly more than three quarters of parkers use off-street parking for an hour or less, indicating that many visitors park in the off-street lots for short visits to nearby retail and restaurants.

Table 1 – Weekday Durations by Parking Type

Space Type/Facility	Total Spaces	Parking Duration (Hours)										Average Stay (Hours)
		1	2	3	4	5	6	7	8	9		
On-Street												
Core	608	60%	12%	7%	5%	4%	2%	2%	4%	5%	2.44	
Periphery	1,165	46%	13%	6%	6%	4%	5%	4%	6%	9%	3.30	
Total	1,773	50%	13%	6%	5%	4%	4%	4%	6%	8%	3.00	
Off-Street												
Washington Plaza Lot (North)	128	87%	5%	3%	2%	1%	1%	0%	0%	0%	1.35	
Washington Plaza Lot (South)	356	86%	6%	2%	1%	1%	1%	1%	1%	0%	1.37	
Pelton Center Lot	75	79%	9%	4%	1%	2%	2%	2%	1%	0%	1.56	
CVS Parking Lot	111	82%	4%	2%	1%	2%	4%	1%	3%	2%	1.79	
Main Library Parking Lot	153	67%	21%	6%	2%	2%	1%	1%	0%	1%	1.65	
Best Building Parking Lot	57	69%	7%	2%	6%	2%	7%	1%	3%	3%	2.27	
Albertson Temp Parking Lot	202	57%	17%	7%	2%	5%	5%	5%	2%	1%	2.28	
Estudillo Parking Garage	384	46%	6%	5%	3%	3%	2%	5%	11%	19%	4.05	
Total	1,466	78%	8%	3%	2%	1%	2%	1%	2%	2%	1.76	
Overall												
Total	3,239	65%	10%	5%	4%	3%	3%	3%	4%	5%	2.36	

1.3 Demand Analysis

A parking demand analysis was developed for the purpose of understanding the impact of future development plans on existing parking capacity and infrastructure. The consulting team developed a customized shared parking model based on the Urban Land Institute’s (ULI) Shared Parking Manual.

Overall, at the time of data collection, the existing downtown parking inventory within the study area comprised a total of 3,239 publicly available parking spaces. This includes all types of spaces, including short-term and handicap spaces, but excludes parking spaces assigned exclusively with a particular land use. **Table 2** provides existing parking inventory within the study area, as well as parking occupancies during the midday peak (around 12 PM) and evening hour (5 PM) parking periods.

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Table 2 Existing On-Street and Off-Street Parking Inventory and Occupancy

Space Type	Day of Week	Inventory	Midday Peak Hour (12 PM) Occupancy	Evening Hour (5 PM) Occupancy
On-Street	Midweek	1,773	997 (56%)	923 (52%)
	Weekend		835 (47%)	836 (47%)
Off-Street	Midweek	1,466	740 (50%)	636 (43%)
	Weekend		684 (47%)	525 (36%)
Total	Midweek	3,239	1,737 (54%)	1,559 (48%)
	Weekend		1,519 (47%)	1,361 (42%)

The total combined on-street and off-street occupancies at the midday peak hour and evening hour remain relatively consistent. Midweek occupancies were at its highest during the midday peak hour at 54 percent; weekend occupancies also reach its highest peak during the midday peak hour at 47 percent.

Future Scenarios

A short term and long term future scenario were developed to analyze parking demand. The short term scenario included the Marea Alta Apartments, the San Leandro Tech Campus, the former CVS Opportunity Site and the Galvan Housing Project. The long term scenario was based on an annual growth rate of 2.1 percent over 10 years. **Table 3** below summarizes the results from the demand-based parking model that was developed for the City of San Leandro’s downtown area based on existing land uses and parking occupancy counts. The Parking Model indicates that for the Short-Term and 10-Year scenarios that at no time of day would parking demand exceed 85% of the available supply. For a full discussion of the demand analysis refer to Appendix C.

Table 3 Parking Model Results

Time of Day	Existing September Counts	Modeled Scenario		
		Existing ¹	Short-Term ²	10-Year
Available Public Parking Supply³				
Midweek – Midday Peak	3,239	3,239	3642	3642
Weekend – Midday Peak	3,239	3,239	3642	3642
Peak Parking Demand Scenarios				
Midweek Midday	1,737 (54%)	1,778 (55%)	1,912 (52%)	2,283 (63%)
Midweek Evening	1,559 (48%)	1,598 (49%)	1,732 (48%)	2,050 (56%)
Weekend Midday	1,519 (47%)	1,541 (48%)	1,675 (46%)	1,975 (54%)
Weekend Evening	1,361 (42%)	1,387 (43%)	1,521 (42%)	1,780 (49%)
Additional Peak Parking Supply Required to Achieve 85% Occupancy⁴				
Midweek Midday/Evening	-	-	0	0
Weekend Midday/Evening	-	-	0	0

*Note:

- Existing scenario parking demand results are derived from the parking demand model; these values differ slightly from the actual occupancies counted since the model outputs do not exactly match actual counts.
- The 127 additional parking demand for the Marea Alta Apartments is included in the short-term pipeline scenario.
- The additional supply for short-term and 10-year future scenarios is a result of the construction of the San Leandro Tech Campus’s new parking structure which provides an estimated 1,100 new publically available parking spaces less a demand of 601 and loss of Martinez Street parking of 96 providing a net 403 spaces.
- Parking supply shown in these scenarios indicates that at no time of day would peak parking demand exceeds 85% of the total available parking supply.

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2.0 Downtown Parking Management Plan

2.1 Program Goals and Guiding Principles

Parking management system program goals and Guiding Principles developed through a community-based consensus building process contribute to a vibrant and growing downtown. Guiding Principles are based on the premise that development of the downtown will require an integrated and comprehensive package of parking strategies to stimulate economic development and redevelopment. The ensuing parking management plan becomes but one critical element of a larger coordinated package for economic growth.

As the result of discussions with City of San Leandro staff and review of input derived from recent public forums, the consultant team summarized the many comments, ideas and themes that emerged from these meetings into a draft set of Guiding Principles. The Guiding Principles are designed to steer and inform future decision-making on issues related to access and parking management. Strategically, the principles encourage the use of the City’s parking resources to support economic development goals and effectively serve the diversity of people who visit, live near, work, and shop in the downtown. The intent of the plan is to implement parking related strategies, programs and infrastructure development in a manner that serves downtown as a multi-purpose destination and mitigates any impacts on the adjacent neighborhoods.

The Guiding Principles are outlined below. It is recommended that the City adopt a formal set of Guiding Principles for its Parking Management Plan and incorporate those as policy for the operation and management of the San Leandro public parking system. [NOTE: The Guiding Principles are not listed in any specific priority order.]

- **Downtown San Leandro is a valuable community asset**
Downtown San Leandro is an asset valued by all members of the community, regardless of where they live or work within the City. The entire community will benefit from having a thriving downtown. As such, the City should manage the downtown parking system in a way to support this asset optimally. This includes understanding that while numerous users need parking in downtown, the priority user of the public supply in commercial areas is the customer/visitor who goes downtown to conduct business, shop, dine, and recreate. This type of parker represents a key component of the downtown’s existing vitality and future growth and must be accommodated.

As policy guidance, this principle was formulated to ensure that “the full sign should never go up” when it comes to providing access to customers/visitors in the downtown; those who come repeatedly to shop, dine, recreate, and be entertained. Both the on-street and off-street supply in public ownership should be managed to always maintain available parking for customers/visitors. The general profile of this patron supports short-term stays that result in a high turnover of parking in the district. In the future, it is hoped that the typical customer will stay longer, be willing to walk more, as well as patronize multiple destinations in the downtown. It should be noted that while customers are the priority, employees also play an important role in a successful downtown and need places to park and/or access to transportation alternatives.

- **Simplify Parking Operations**
 - i. **Make Downtown parking user-friendly, easy to access, and easy to understand**

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This principle will require investment in marketing, branding, informational systems, payment systems and other strategies to increase awareness of parking options in Downtown San Leandro and how to use them. There is a need to create greater awareness of public parking opportunities, develop signage and wayfinding systems to reduce searching (“cruising”) for parking and make it easier and quicker for customers/visitors to find a parking space and enjoy the experience of recreating, shopping, and dining in Downtown San Leandro.

ii. Provide a “parking product” in the Downtown that is of the highest quality and safety, creates a positive customer experience, and offers a practical solution for employees.

On-street parking should be uniformly managed and enforced to assure parking is user-friendly and “easy to access and easy to understand.” Off-street facilities (surface and structured) should be of uniform quality and identity to create a clear sense of safety, convenience, understandability, and coordination with the surrounding pedestrian environment.

iii. Simplify internal management of the parking system

The parking system should not only be user-friendly, but just as importantly be easy to manage and understand for City staff and its private sector partners (property owners, property managers, business owners, business managers). Internal management is based on a clear understanding of the guiding principles and the use of demand, location, time, price, and supply strategies as a package or menu of tools to manage on-street and off-street parking in Downtown San Leandro.

▪ **Make downtown accessible to all users through multiple modes**

Increasing downtown trips via transit, bicycling, walking, and ridesharing (as feasible and appropriate) can create significant benefits for the public parking system. Downtown San Leandro is located in an opportune area with convenient access to BART and bus service. Improving multimodal transportation use is especially beneficial for employee trips and relatively easy to accomplish due to their predictability and regularity. An employee parking a vehicle all day in the public parking supply turns over the space only once in an eight to ten hour period. If that employee were conveniently transitioned to an alternative commute mode, the stall could then potentially turn over up to 5 times with customers/visitors whose average stay is less than three hours. A balanced and multi-modal system of transportation access increases overall “person carrying capacity” to the downtown and supports efficient visitor-prioritized parking systems.

▪ **Parking system should support downtown businesses**

Healthy businesses are the cornerstone of a thriving downtown. Parking management must prioritize and value short-term visitor and customer access to allow Downtown businesses to be successful. The consideration of the role of alternative transportation modes, public/private partnership and shared parking usage must become part of the toolbox to help grow existing businesses and to support development opportunities given the high cost of parking.

▪ **Prioritize residential parking for residents**

The residential neighborhoods between the San Leandro BART station and East 14th Street are highly impacted by commuter parking and daily employee parking. A residential parking permit (RPP) program with appropriate time limits may help reduce the impact of spillover parking by commuters in these areas and allow local residents and their visitors access to on-street parking near where they live. The

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sale of permits at a higher cost to non-residents could be considered if there is sufficient capacity. This may include businesses, employees or even BART riders.

- **Manage the integrity of the parking system with an understanding of systemic and fiscal impacts.**

The public parking system should be managed efficiently and cost effectively. Ideally, the parking system (on and off-street) is managed to cover its own direct debt and operating costs; however, decisions about pricing in the short term will have to balance parking supporting the downtown or covering its cost.

2.2 Program Challenges

The adoption and implementation of a parking management plan is rarely a smooth process. Over time it will require a variety of adjustments and upgrades to program components. It should be expected that there will be a period of adjustment for various stakeholders and users as they acclimate to the program. This includes necessary changes to old patterns of behavior that made the system function sub-optimally. This is why it is important to keep the focus on the guiding principles as the program moves ahead. As strategies are adopted, there are a variety of challenges that will need to be considered and addressed. These include:

Systemic non-compliance – Despite the best efforts of parking enforcement, field observations confirmed that many employees are parking in short-term parking areas and moving their cars every two hours to avoid citations (two-hour shuffle). Some employees have developed their own warning systems to alert others of parking enforcement activities or even go so far as to wipe off chalk or devise other means to avoid parking citations in direct violation of city parking regulations. This behavior occurs regularly in the Washington Plaza where it is regulated as part of Section 504 of the *Maintenance, Operation and Reciprocal Easement Agreement*¹ (MOREA).² In some cases, this type of activity is condoned by business owners and managers who often engage in the same practice.² There is a perception that others are moving their cars in front of “my business” and taking “my customer” parking, while they also move their car in front of other stores. For best success, the business owners and managers need to become partners in implementation.

Safety – Another challenge is personal safety and the perception of a safe environment in the downtown. This issue is acute during early evening hours and late evening when limited pedestrian activity, low light and nearly empty parking facilities can impact feelings of security. This concern is amplified if someone is new or unfamiliar to the area, leading to a sense of isolation when walking by closed businesses and along empty sidewalks with limited to no pedestrian scale lighting. Poor pedestrian wayfinding and information systems for parking facilities also exacerbate this issue.

Technology Challenges – Advances in technology have had an overall positive effect on parking management and the development of better parking systems in recent years. However, these new innovations can create unanticipated problems as they can add layers of complexity to administration, management and operations, if both the technology and vendor/service provider are not carefully selected. In some cases, the technology may not work in a manner that best serves the customer. The City’s mobile LPR and garage LPR units have had some technical difficulties in the past year, resulting in extra labor and the need for hand-chalking and ticketing by the parking enforcement officers. This in turn has made it easier for violations to escalate.

¹ *Maintenance, Operation and Reciprocal Easement Agreement* between San Leandro Plaza Associates and Plaza Partners and City of San Leandro, December 1981.

² Confirmed by in-field interview by consulting team on July 24, 2015.

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Troubleshooting these problems and making the technology work as intended will be essential for future program success.

Need for simple administrative and payment processes – The project team recognizes that there are limited staff and financial resources available and that there is no one “official” City staff person dedicated to parking. Therefore, as much as possible, it is recommended that solution sets should be developed that make it simple to perform administrative tasks and handle payment processes. This simplicity theme is important not only for the City staff, but also must be easy for stakeholders who rely on parking resources in the project area.

2.3 Recommendations

A. Adopt Goals and Guiding Principles

The City should adopt clear program goals and guiding principles through consensus because they are necessary to guide decision-making for the operation and management of the City’s parking program. Furthermore, they will support creation of a parking system that facilitates and contributes to a vital and growing downtown.

Implementation Guidance

- **Immediate:** Conditions exist to move forward immediately
- No special actions required to move forward other than adoption of the parking management plan

B. Refine Organizational Structure

Industry best practices for administration and management of a parking “system” recommends a centralized program of management (on and off-street) under the purview of a professional Parking Manager. The City of San Leandro currently has divided the program administration responsibilities among four departments. While a centralized role like a Parking Manager is typically necessary to manage a growing parking program, the City may consider outsourcing this role to a third party parking management firm with an internal point person to manage the contract. The parking administration duties should be transferred to the Parking Manager and the role expanded to act as the interdepartmental liaison of a formalized City parking operations working group.

The City should also consider the establishment of a Parking Technical Advisory Group or Committee, comprised of a diverse and representative group of downtown stakeholders who routinely review parking issues in the downtown and engage the public to gather input on key parking decisions, to ensure the community is included as a partner in program implementation. Alternatively, the City may consider leveraging an existing organization for feedback such as San Leandro Improvement Association (SLIA).

Implementation Guidance

- **Short-Term:** Conditions exist to move forward immediately (0-12 months):
 - City Staff need to determine responsible department/ staff resource to develop RFQ/RFP for outsourcing program and to serve as contact.
 - It is recommended the City develop and issue a request for qualifications (RFQ) for third party parking management vendors to develop a qualified pool of candidates to interview.

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- Establish a Parking Technical Advisory Committee comprised of a diverse and representative group of downtown stakeholders to gather input on parking decisions and to ensure the community is included as a partner in program implementation.
- **Medium-Term Actions** (12-24 months):
 - Other issues that need to be determined include the total parking-related services that should be outsourced such as maintenance and enforcement.
 - Additional outsourcing services may be added to the primary vendor’s management contract as an extension or subcontract to additional vendors under their management.
 - Selected vendor representative will at a minimum send monthly reports to City staff point person. City staff point person will meet regularly with downtown stakeholders/ Parking Technical Advisory Committee for input on downtown parking issues.

C. Simplify Parking Time Stays

On-Street: The majority of users in the downtown park less than three hours, per **Table 4** below. The City should standardize all on-street stalls (core and periphery) to 3 hours (See **Figure 2** on the following page). This will simplify the system for the customer and assure a convenient and appropriate time stay. 15/24-minute parking restricted spaces should be allowed only by exception for businesses with a demonstrated need for short, quick visit access (e.g., dry cleaners, ticketing outlets, post office, etc.).

Our experience shows that very short-term parking cannot be enforced effectively and is often abused and misused as a result. For example, sensor data from Downtown San Mateo showed that downtown parking spaces turn over more frequently than manual data could track, and that average parking stays in their 24 minute spaces were on average abused. So, it is best for parking to be left open for flexible use for up to 3 hours. If short term spaces are still needed, the parking meters should be considered for these spaces to improve turnover and reduce abuse.

Data from the City of San Mateo indicated that the average parking session had a duration of 45 minutes and that was due to 30 percent of patrons overstaying the time limit. San Mateo enforcement staff indicated that the short-term spaces were difficult to enforce at such a high rate of turnover, leading to such a pronounced rate of overstays. The observed duration was even higher outside of the downtown core at slightly one hour.

Table 4. Weekday Durations by Parking Type

Space Type/Facility	Total Spaces	Parking Duration (Hours)									Average Stay (Hours)
		1	2	3	4	5	6	7	8	9	
On-Street											
Core	608	60%	12%	7%	5%	4%	2%	2%	4%	5%	2.44
Periphery	1,165	46%	13%	6%	6%	4%	5%	4%	6%	9%	3.30
Total	1,773	50%	13%	6%	5%	4%	4%	4%	6%	8%	3.00
Off-Street											
Washington Plaza Lot (North)	128	87%	5%	3%	2%	1%	1%	0%	0%	0%	1.35
Washington Plaza Lot (South)	356	86%	6%	2%	1%	1%	1%	1%	1%	0%	1.37
Pelton Center Lot	75	79%	9%	4%	1%	2%	2%	2%	1%	0%	1.56
CVS Parking Lot	111	82%	4%	2%	1%	2%	4%	1%	3%	2%	1.79
Main Library Parking Lot	153	67%	21%	6%	2%	2%	1%	1%	0%	1%	1.65
Best Building Parking Lot	57	69%	7%	2%	6%	2%	7%	1%	3%	3%	2.27

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Albertson Temp Parking Lot	202	57%	17%	7%	2%	5%	5%	5%	2%	1%	2.28
Estudillo Parking Garage	384	46%	6%	5%	3%	3%	2%	5%	11%	19%	4.05
Total	1,466	78%	8%	3%	2%	1%	2%	1%	2%	2%	1.76
Overall											
Total	3,239	65%	10%	5%	4%	3%	3%	3%	4%	5%	2.36

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SAN LEANDRO DOWNTOWN PARKING MANAGEMENT PLAN

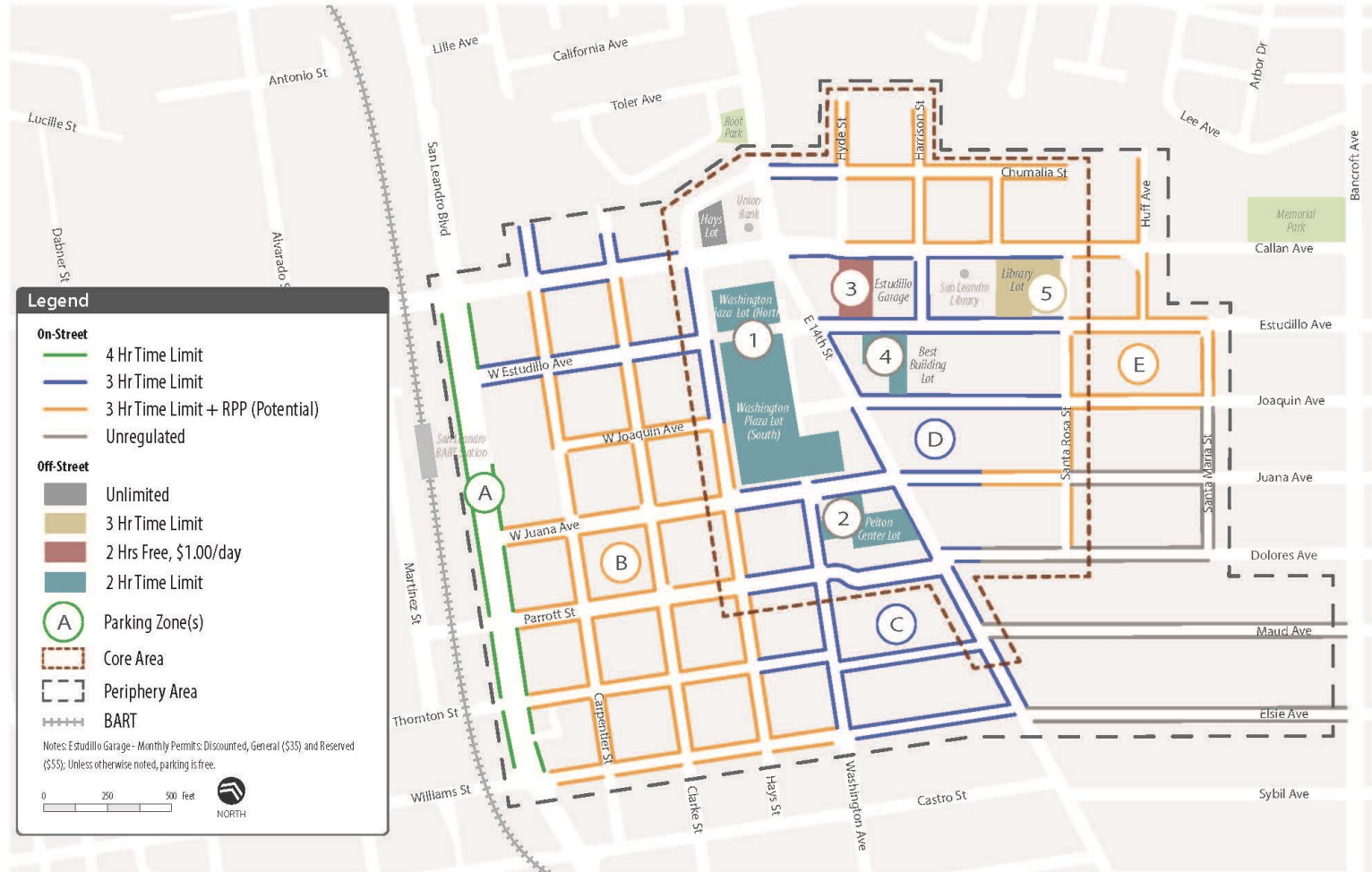


Figure 2
Recommended Short Term Parking Regulations

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Off-Street Parking

Time limits are not recommended to change for any off-street facilities at this time and strategies for off-street facilities are detailed further in the following section.

Implementation Guidance

- **Short-Term Actions:** Conditions exist to move forward immediately (0-12 months)
- **Immediate Steps:**
 - *Establish parking zones* - City staff will need to establish enforcement zones like those delineated on the Figure 2 program maps
 - Off-street: each lot and garage as a different zone:
 1. Washington Plaza (N&S)
 2. Pelton Center
 3. Estudillo Parking Garage
 4. Best Building
 5. Library Lot
 - On-street parking will be separated into the following zones
 - A. 4 hour parking on San Leandro Blvd
 - B. 3 hour RPP West of E. 14th
 - C. 3 hour parking on West side of E. 14th
 - D. 3 hour parking on East side of E. 14th
 - E. 3 hour RPP East of E. 14th
 - Install signs indicating parking zone areas (See Recommendation G)
 - Develop a ***no re-parking ordinance*** for all time-limited parking zones in the Downtown. The ordinance will include citation policy. Using the naming convention the City settles upon (Similar to Figure 2) it will be necessary to make it clear that the downtown parking is based on a zone system. Parkers will be allowed to move and park in other zones during the day– but unable to re-park in the same zone during that enforcement period. The goal is to motivate parkers to park in the Estudillo garage if they need longer than 2-3 hours to park.

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D. Update Rate Policy and Pricing

A survey of parking rates in other Bay Area cities is shown in **Table 5**. Although San Leandro’s rates are below the average, it is worth noting that several other cities have elected to not charge for parking at all. Although free parking results in a loss of revenues, it can also encourage increased visits to the area, by eliminating both the cost of parking and the need to navigate a parking payment system.

Table 5 - On-street Hourly Rates – California Cities (Sample)

City	Rate per Hour		
	1 – 2 Hours (short term - primary visitor)	3 – 6 Hours (mid-range stay)	6+ Hours (Long term stay)
Berkeley, CA	\$1.25-\$2.25	N/A	N/A
Burlingame, CA	\$0.50-\$2.00	\$0.50- \$1.00	\$0.10-\$0.30
Fremont, CA	none	none	none
Hayward, CA	none	none	none
Livermore, CA	none	none	none
Mountain View, CA	none	none	none
Oakland, CA	\$2.00	\$2.00	\$2.00
Pleasanton, CA	None	none	none
Redwood City, CA	\$0.50-\$1.00	\$0.50-\$1.00	\$0.50-\$1.00
Sacramento, CA	\$1.50	\$1.50	\$1.50
Santa Cruz, CA	\$0.75	\$1.25	\$2.00
San Francisco, CA	\$2.00 - \$3.50	\$1.75 - \$3.25	N/A
San Jose, CA	\$1.00	N/A	N/A
San Leandro, CA	\$0.60-\$0.75	N/A	\$0 - \$0.25
San Mateo, CA	\$0.50	\$1.00	\$0.25
Union City, CA	\$0.50	\$0.50	\$0.50
National Average - Per Colliers International	\$1.67		

Parking Meters: It is recommended that the City should develop a policy reflected in code that includes an 85 percent parking occupancy standard, a minimum schedule for updating inventory/occupancy and a routine rate reviews based on operation costs and demand. Based on the parking data shown in **Figure 3** on the following page, occupancies between 9 AM and 6 PM (normal hours of enforcement) do not exceed 85 percent *during enforcement hours*. This trend is consistent by day, time of day and in the on and off-street supplies. Therefore, rate increases would not be warranted, if the 85% Rule policy is in effect for the areas labeled “core zone,” “periphery” and “off-street.” As a long-term solution, it is recommended that the City consider an expansion of city parking meter installations on-street in the “core zone” to cover the locations as shown in **Figure 4** based on an 85 percent occupancy standard as discussed above. When implemented, it is recommended that the City consider the use of the “smart” meters or pay stations and mobile payment that provide an option for credit card payments and real-time data/information for users, administrators and enforcement personnel.

In the near-term, however, it is recommended that the City should not expand on-street, time-restricted parking until the 85 percent occupancy threshold is reached or only if there is a desire to improve turnover in

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short-term parking spaces. As noted above, current occupancies are well below this threshold. On-street occupancy is low, in part, because the most convenient parking spaces for shoppers in Downtown San Leandro are the free, off-street lots. Due to a long-term contractual agreement with Regency Centers and Safeway, it is not possible to charge for parking at Washington Plaza. As long as the most desirable spots are free and occupancy rates are manageable, it is unlikely that a significant number of parkers will opt for paid spaces, no matter how low the rates are set. As an alternative the implementation of free on-street parking would allow the City to defer the process of purchasing and installing smart meter technology; however, a strategic use of the parking meter revenue could be used to replace the equipment and also allow proper turnover in short-term parking spaces.

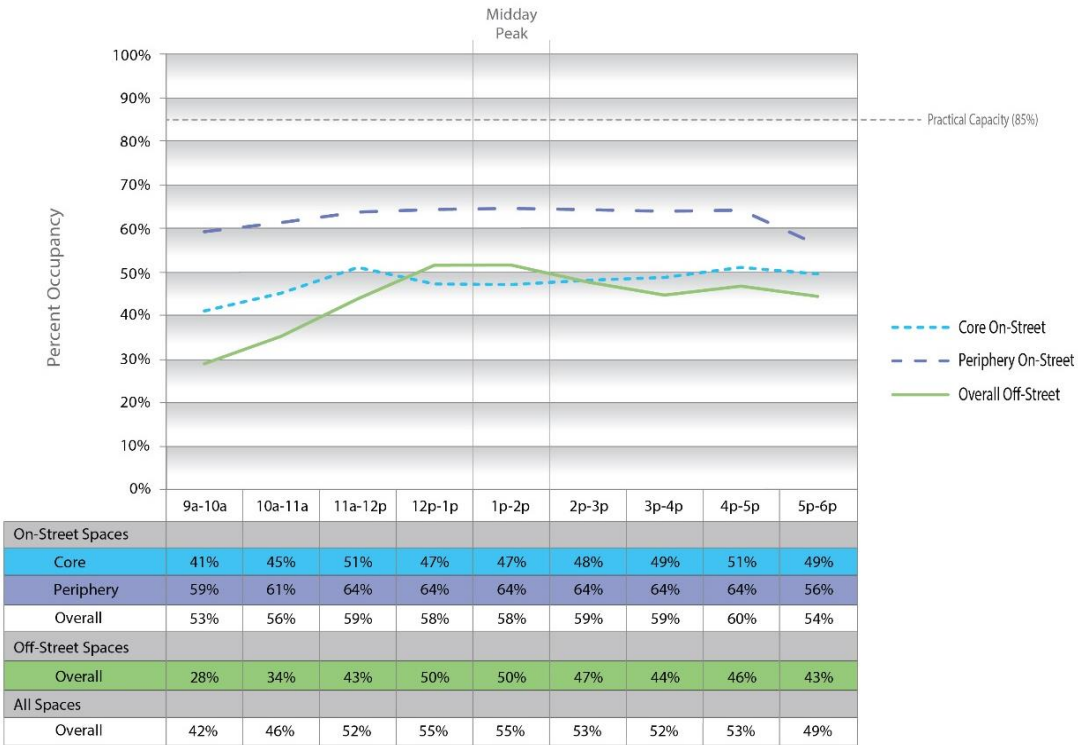
Although most on-street parking is recommended to be free in the near term, the City can reasonably charge for all-day parking in the Estudillo Garage. Secure, all-day parking in the garage offers value for regular parkers that do not have alternative options for all-day parking elsewhere in the Downtown area. To encouraged increased usage of the garage, however, it is recommended that the City reduce rates for garage parking. The area presently suffers from the systemic noncompliance of retail employees that park for extended periods in time-restricted off-street lots. Offering reduced garage parking, coupled with enhanced enforcement of the time restrictions in surface lots, will encourage more employees to use the garage and make the most desirable spots available to shoppers and short-term visitors.

All-Day Parking (top deck): Initially set at \$1 per day (reduced from \$2.50), with routine rate reviews based on operation costs and demand. This low rate for parking on the top floor of the garage will encourage more retail employees to use the garage. In addition to earning relatively low wages, retail employees are less likely to be able to use monthly permits because they may not work a fixed 40-hour work week or maintain a consistent work schedule. The top deck of the garage currently receives very little usage at the present rates.

Parking Permits: Reduced to \$35/month for general access to \$55/month for reserved access (from \$45 and \$70, respectively.) This reduction is recommended to increase garage usage and maintain the value of monthly permits in comparison to the proposed daily rate of \$1 on the top deck. An additional option for free or discounted permits is detailed in Section F. *Employee Parking Solutions.*

Figure 3. Weekday Overall Occupancy

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Off-Street Parking

The recommended time limits and fees for off-street facilities are summarized in **Table 6** below:

Table 6. Recommended Time Stays and Rates – Off-Street

Facility	Time Limit		Fee	Target
Estudillo Parking Garage	All Day		Monthly Permit (\$0/\$35/\$55) Daily (\$1.00)	Permit/day use parking is underused. Low priced hourly parking and free permits for part-time/low income employees provided to attract part-time employees.
	1 st 2 hours		2 hours free, \$0.25/hour thereafter, extend w/mobile payment	
Hays Lot (Temporary)	All Day		Free	Employees
Library Lot	3 hours		Free	Library patrons, event parking
Washington Plaza Lots, Pelton Center Lot & Best Building Lot	Option 1	2 hours	Free	Time limit strongly enforced at 2 hours to free up parking for customers and encourage employees to select other long term parking options
	Option 2	1 st 2 hours	1 st 2 hours free, \$1/hour thereafter – requires pay by plate & pay by phone to extend time beyond free period. Enforcement alerted to LP overstays.	Allows short-term free parking for all, unlimited parking for paying customers.

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Figure 4
Recommended Long Term Parking Regulations

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Implementation Guidance

Long-Term: It is recommended that the City retain this recommendation for a long-term roll-out when the conditions are better suited. Increasing and/or expanding on-street pricing is not advised as an immediate/short-term solution at this time as it would require significant capital investment, and it would not solve the parking demand problem created by shift employees parking in Washington Plaza and commuters parking all day in unregulated residential on-street areas. Additionally, the City is restricted by the MOREA agreement from pricing parking at the Plaza, which would also limit the effectiveness of on-street pricing.

Short-Term Actions: Conditions exist to move forward immediately (0-12 months):

- Relocate single space meters to short term parking spaces. Consider keeping poles in place at relocated spaces until long-term equipment solution is selected.
- Adopt 85% Occupancy Standard for Core zone and off-street facilities in the downtown
- *Develop and Implement Monitoring Plan*
- The City should continue to monitor parking occupancies in the lots, garage, downtown core on-street subsequent to the opening of the BART garage and the Tech Campus. A suggested data monitoring plan is as follows:
 - Weekday and weekend occupancy sampling should be conducted twice per year at the peak hour in the entire downtown study area.
 - Annual data collection including duration analysis should be developed for the entire core area. Consider the following results for implementation of on-street pricing.
 - If durations for Washington Plaza and the on-street commercial areas are meeting existing time limits and core occupancy is under 75%, revisit pricing implementation at next data collection check point.
 - If durations for Washington Plaza or the on-street commercial areas meet or exceed established time limit and occupancy for one or more of these areas is at practical capacity (85%), then downtown is ready to implement expansion of on-street pricing

E. Residential Permit Parking

The residential areas bordering the downtown commercial district and also immediately adjacent to the San Leandro BART Station are highly impacted by daily parking activity, most often by commuters who opt to park on-street to avoid BART parking fees or who spill over due to parking constraints at the station. It is recommended that the City develop a residential permit parking (RPP) zones delineated by orientation to downtown. Based on parking occupancy data, two zones should be considered: Downtown West and Downtown East, with East 14th Avenue serving as the border between the two zones. Please refer to Figure 2 for the recommended RPP block faces. Per discussion in the prior section, it is recommended that the time limit for non-permitted parkers in this area to be three hours. Residents would be issued permits to park in the assigned zone without time limit.

Implementation of the RPP should be timed to take place only after the BART parking facilities at Marea Alta the San Leandro Tech Campus have opened to ensure that adequate space is available for BART commuters.

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Typical RPP Programs allow up to three permits per household and charge a nominal annual administrative fee per permit from \$25 to \$50/year. Daily and 14-day guest passes are also sold through this program and a limited number of business permits are sold, typically at a 3 to 4X multiplier of the residential permit.

The recommended approach for single family dwellings would be supported by the City's existing municipal code, but is different than that established by the City at McKinley Court, which prohibits all non-resident parking between the hours of 8AM and 5PM on weekdays. Specifically, while the on-street parking in the residential areas surrounding the downtown should be prioritized for residents, it is still an essential element of the overall downtown parking supply. Upon review of Article 3 of San Leandro's Municipal Code, unlimited parking would be restricted for non-residents, to provide the opportunity for residents to park near their homes. Furthermore, Section 6-2-340 of the code indicates time limits may be set by the Engineering and Transportation Director. The code allows for 14-day visitor permits; however, it is recommended that the City establish 1-day visitor permits and consider the establishment of daily business/commuter permits in the code.

- 1-day visitor permits (scratch-off hang-tag): sold to residents in RPP districts for their guests, subject to monthly limit, to be monitored by a designated city department.
- 1-day business/commuter permits (print-out with barcode): sold on-line, availability of permits by zone, to be monitored by a designated city department and reported monthly to the Finance Department.

The current RPP program does not make accommodations for multi-family/multi-unit buildings. Some cities limit participation of new multi-unit buildings that are self-parked. New developments in San Leandro are being built with lower parking ratios to take advantage of high quality transit and a highly walkable neighborhood. While many residents do take advantage of these amenities, the economic reality of rising rents and housing affordability is also leading to increased instances of "doubling-up" of families in larger units. As such, where vehicles cannot be accommodated on-site, some accommodations should be made for these residents on-street. Unless a development agreement specifically prohibits a multi-family dwelling from participating in residential on-street parking, it is recommended that multi-family and single family housing be held to the same RPP regulations.

Implementation Guidance

Short-Term Actions: Conditions exist to move forward immediately (0-12 months):

- Identify City Department to be responsible for administering RPP program until/unless third party contractor is hired.
- Establish Geographic RPP Zones East and West of E14th Avenue based on map in Report Figures 2 and 4 above and interest of the residential neighborhoods.
- Establish fee schedule and enforcement hours
 - Suggested Fees: \$25/year
 - Suggested Hours: M-F 8-6PM
- Establish program for the sale of visitor passes
 - 1 day passes: \$1/day

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- Sold to residents only
- Consider establishing a program for the sale of passes to businesses in RPP zone
- Suggested Fees: \$100/year
- Link RPP sales to existing on-line permit sales system

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F. Employee Parking Solutions

Downtown stakeholders have indicated that there is not a good parking solution for part-time shift employees in the study area. Because of this, employees take up high demand parking in Washington Plaza, moving their vehicles or rubbing chalk every two hours to avoid enforcement or park in nearby residential neighborhoods. This reduces available parking for patrons to the Plaza, and residential areas and results in lower productivity for the shift employees. Although the recommended reduction in the cost for daily parking on the top deck of the Estudillo Garage is expected to improve this situation, the following options for employee parking may also be considered.

Option 1: Part-time Discounted Employee Parking (PDEP)

- A permit program that allows free or low cost parking in the Estudillo garage for part-time or low income employees
- Based on income, requires pay-stub and application for permit
- Discount/Rate:
- As an example - Sacramento provides a 2/3rd discount from full hourly rate of \$3.00.
 - Potential Discounts for qualified PT/LI employees:
 - \$1/day or \$0.10/hour for qualified part-time parkers; or
 - Free - similar to validation
- To ensure this approach is successful the City should adopt the proposed downtown parking regulations shown on Figure 2 in addition to regular enforcement on-street, in plaza and in nearby residential areas. Otherwise employees will not be motivated to adjust their current habits.

Option 2: Employee Parking Validation – via codes

- Validation Codes would be generated daily by parking management software
- Employer members login or receive daily email with set # of codes for their employees
- Employees would enter codes in garage kiosk or pay by phone app/text along with license plate and can park for unlimited hours (assume a shift is 4-6 hours?)
 - App/text would be necessary if they didn't get code until at place of work.
- The cost would be covered by employers and free to employees

Option 3: Employee Parking Validation – via tokens

- This approach is probably the most inconvenient for workflow of employee/employer time and also subject to “leakage/loss”
- This only works in a pay in advance model, so the employee would need tokens in advance of shift – or would have to run out and run back to get them
- Depending upon how the tokens are set – up the time periods can be for a pre-determined period of time.
- The City's current kiosk technology will need to be upgraded per recommendation H.3

³ Since the City is in process of interviewing replacement vendors, it is very likely that City can require that operator/integrator must work with or upgrade existing equipment.

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Implementation Guidance

Short-Term Actions: Conditions exist to move forward immediately (0-12 months):

- Identify City Department to be responsible for administering Employee Permit program until/unless third party contractor is hired.
- Determine feasible options for Employee Parking Program from above. Preferred option will be impacted by the supporting technology selected for the garage in Recommendation H.
- Develop process/program for employee outreach for selected program
- In addition to the options considered for employees above, per Recommendation C – the \$1/hour top deck on the Estudillo garage should be marketed heavily to part-time shift employees as an attractive long-term parking solution to avoid re-parking citations in the downtown.
 - Option 3 above would allow employers or others to provide employees with prepaid tokens or validated tickets – for parking on the “dollar deck”

G. Identify and Communicate the Parking System

It is essential that San Leandro make positive strides toward positioning its off-street system as a uniquely identifiable system. The on-street system is finite and future growth of visitor demand can only be met off-street. Customers/visitors must recognize and understand the City’s role in parking. As such, the City should develop a strategic approach to market, communicate and brand its parking system building upon the wayfinding program partially implemented as part of the San Leandro Boulevard Streetscape project. This will establish a recognizable and intuitively understandable parking message. Elements of this strategy should include:



Branding: Seattle, WA

- *Branding:* Promotes image and ties system together;
- *Wayfinding:* Clear signage system directing patrons to nearest public parking supply; and
- *Marketing:* Promote the program and raise awareness.

Implementation Guidance

Short-Term Actions: Conditions exist to move forward immediately (0-12 months):

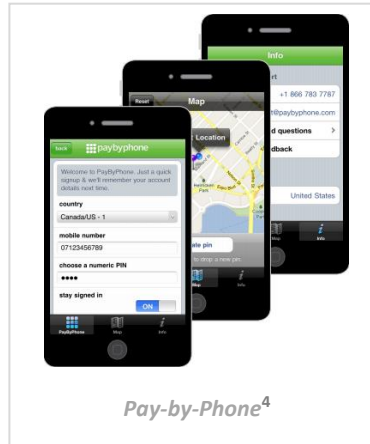
- Identify City Staff resource to act as point person to develop strategy and coordinate input among interested stakeholders. This resource is most likely to reside in Community Development.
- Coordinate with Recommendation C efforts which requires the design/selection and installation of parking regulation signs throughout the downtown.

H. Integrate Parking Technology

The City should consider the integration of a number of technologies to enhance their parking program. The most promising technologies include:

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- Convenient Parking Payment Options:** Single space “Smart meters”⁴ and pay-by-plate pay stations, complemented by mobile payment options such as *Pay-by-Phone*⁵ or *Parkmobile*⁶ provide users many convenient options to pay for parking, such as cash, credit, or an on-line account, which removes a significant barrier to paid parking with most of the current system.⁷
- Parking Enforcement Technology:** With a connected parking management and information database, enforcement



Pay-by-Phone⁴



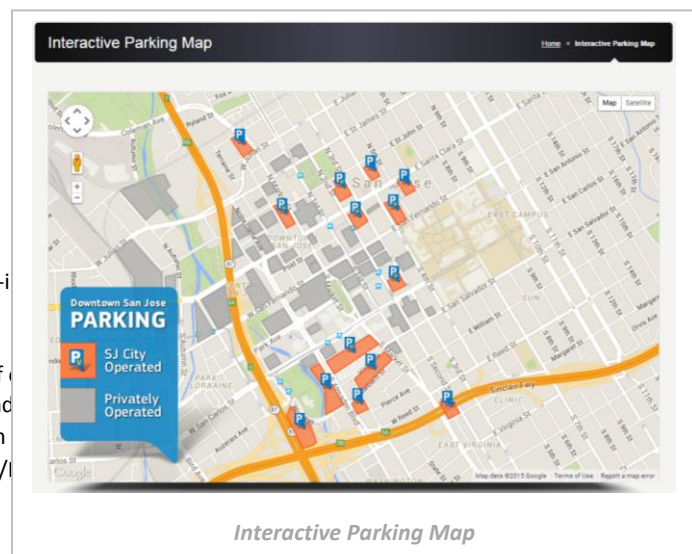
IPS Smart Meter³

officers can use the City’s existing mobile license plate recognition (mLPR) technology to enforce on-street and lot parking more quickly and efficiently by tracking violators, mapping key locations with high violation rates, and implementing handheld devices. Smartphones (iOS and Android) are becoming the handheld enforcement device of choice. We recommend the City consider using smartphones with accompanying software/applications, such as *AutoVu Freeflow* and *AutoVu Patroller*. This will save the City from needing to purchase excess unnecessary hardware.⁸

Once up and running again, the City would have the ability to use the Genetec *AutoVu Free Flow Enforcement System*, which can be used with fixed or mobile LPR units. Vehicles placed on the violations list will be available through the back-office interface in, or synchronized dynamically with parking enforcement vehicles using *AutoVu* mobile enforcement software to maximize enforcement efficiency.⁹

Mobile Applications: The *ParkMe* mobile application provides information about parking locations, availability, and prices. This information can be provided directly to *ParkMe* by businesses, cities, or parking facility operators.¹⁰ The application includes a map showing locations with data as well as detailed information when the location is selected. In addition to the mobile application, the information can be doubled as an online “widget,” embedded on any city website. *ParkMe* is currently active in Santa Monica and Walnut Creek.

- Interactive Map of Parking Information:** The City of San Jose offers an easy-to-read interactive parking map of City-operated off-street parking facilities in their Downtown area.¹¹ While not real-time, the map offers up-to-date information



Interactive Parking Map

⁴ <http://www.parking-net.com/parking-industry/ips-group-i>

⁵ <https://www.paybyphone.com/>

⁶ <http://us.parkmobile.com/#how-it-works>

⁷ It is understood that the City is currently in the process of replacing Parktopia which may bring their own systems and

⁸ This should be required to be compatible with any system

⁹ <https://www.genetec.com/Documents/EN/FeatureFocus/>

¹⁰ <https://www.parkme.com/how-it-works>

¹¹ <http://sjdowntownparking.com/parking-map>

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about parking facility rates and regulations at the user’s request. More information about a particular facility—such as the address, size, hours of operation, and rates—is available at the click on the blue pin of interest. San Leandro could similarly implement a map of their available public parking facilities and location/payment/directional information on the City website.

Implementation Guidance

Immediate: Conditions exist to move forward immediately to upgrade payment technology in the Estudillo Garage, and reinstate the LPR enforcement process.

- **Garage Equipment Upgrade:**
 - Identify City Department/Staff responsible for developing equipment RFQ/RFP for garage equipment replacement
 - Develop an RFQ/RFP for payment systems vendors.
 - Interview/Select vendor
- **Enforcement Equipment/Software:**
 - The Current mLPR requires back-office system software to support directed enforcement including a **re-parking** enforcement module.
 - Enforcement personnel will need an updated citation system compatible with handhelds as manual ticketing will not be sufficient for enforcing re-parking.
- **Long-Term:** Until the conditions for on-street pricing are met (85% occupancy), new payment technology will not be considered.

I. Manage Parking Fund to Solvency

It is challenging to accurately track all budget elements (revenues and costs) that feed into a parking system. However, to make informed short- and long-term operational and capital investment decisions, the City should be able to evaluate overall system performance, costs by facility and on street vs. off-street costs. In the long-term, San Leandro could be aided in this by a wireless individual pay station or smart meter technology meter system which, if installed, can “self-report” revenue collection by unit, space, facility, block or space. This reporting detail will help the City observe and understand trends and make timely programmatic/investment decisions.

The current financial reporting system does consider the true effective labor cost to manage/operate the City’s parking program nor does it include enforcement revenues, which currently go directly to the general fund. Understanding the true costs and revenues attributable to all parking operations and management will help the City may make more financially sustainable decisions with regard to capital investment, operations and management.

Additionally, management approaches alone that are acceptable both to the City and the general public are unlikely to generate revenues in the amount to bring the program into net positive revenue in the near term, so the short-term goal should be focused on narrowing the growing observed revenue gap.

In the long-term, the City will need to be cautious when implementing demand management (pricing) since demand is expected to be highly elastic and will impact anticipated revenues. A sustainable approach will be conservative including a range of fees for all users and locations including on and off-street, day use permits

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and discounted/free. To make this program successful and to meet the goal of revenue gap closure, it is recommended that the downtown parking citation costs and revenues be included in the parking fund.

The parking system financials reviewed in Section 3.0 of this report analyze all costs and revenues attributable to the parking program, even if they currently go to the general fund or other department budgets. The inclusion of all parking related revenues (such as citations) and donated labor/costs in this analysis indicates that the parking program is contributing positively to city budget and will be expected to continue to do so.

As such, the City will need to be prepared with an understanding of long-term capital planning needs. To fund the implementation of the parking management plan, the City will need more than one source of public resources, particularly in the near-term or until market conditions, density, and constraints on the supply drive parking costs upward since current assessed revenues are not dedicated all or in part to the parking program. Therefore, the City should restructure the parking fund to acknowledge actual costs and revenues that are attributed to operations and management of parking in Downtown San Leandro.

As soon as costs are properly accounted, the City can make the policy decision as to what items the Parking Fund budget will ultimately support. This could be one or more City staff positions, capital equipment, and maintenance, and/or a line item in the general fund.

Implementation Guidance

- **Medium Term Recommendation:** Several city departments contribute resources to the parking fund without attribution. Similarly many departments and programs unrelated to parking benefit from the revenue generated through parking citations now deposited in the general fund. Therefore, before any adjustments are made, the City needs to account for these budget items with a clear and open internal planning process.
- **Medium Term (12-24 months):** Review current allocation of parking system revenues and costs and consider realignment of general fund budget items so costs and revenues reflect reality and budgeting decisions can be made with a more sustainable long-term approach. All internal stakeholders should be involved in this review.
- **Long-Term (24-36 months):** Once the parking fund has been re-aligned/restructured it would be appropriate to take a long term look at capital planning needs and capital facilities planning which will include addressing potential funding gaps.

J. Encourage Transportation Demand Management (TDM)

A balanced and multi-modal system of transportation access increases overall “capacity” to the downtown and supports efficient visitor prioritized parking systems.

The 2007 Downtown San Leandro Transit-Oriented Development (TOD) Strategy includes TDM strategies to reduce both parking demand and minimum parking requirements in the downtown. The goal of these strategies is to reduce the use of automobiles in downtown San Leandro in favor of alternative modes of transportation. Encouraging alternative modes of transportation (e.g., transit, bike, walk and ridesharing) ensures that the City’s parking system serves customer/visitor access in the downtown at the highest level of efficiency and cost effectiveness. Every long-term space freed up (e.g., transitioning an employee to an alternative mode) creates customer capacity to use the space five separate times.

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The nature of TOD itself – mixing uses in a compact, walkable environment – enhances the city’s goal by transforming downtown San Leandro into a place that minimizes the need to drive. TDM adds to this with policies that ensure that access in and out of downtown minimizes single occupancy vehicles.¹²

It is recommended that the City of San Leandro continue to implement the transportation demand reduction strategies from this plan to support this goal. Per the 2007 plan, these include the following actions:

- Development/establishment of framework for a downtown Transportation Management Association (TMA)
- TMA Services should include TDM elements:
 - i. Customize TDM planning for members;
 - ii. Guaranteed Ride Home program;
 - iii. Wageworks/Commuter Check program (employers provide transit tickets to employees at a pre-tax discounted price);
 - iv. Managing and administering shuttle services between employers and BART, downtown or other key destinations;
 - v. Clipper/Discount transit passes to downtown employees to encourage transit ;
 - vi. Individual commute alternatives planning.
- Encourage existing businesses of 50 or more employees within close proximity to BART to adopt TDM Strategies or participate in a TMA
- Require new development to charge for parking, as part of the Parking Strategies (see below). This strategy, combined with free transit passes (for at least one year) provided by the development/management can be highly effective. This strategy may be introduced gradually and should be implemented in conjunction with public parking pricing.
- Encourage the establishment of car-sharing and/or rental car services, especially in proximity to the BART area.
- Encourage other employer-sponsored financial and non-financial incentives including travel allowances in lieu of parking subsidy, parking cash-out, transit discounts, reimbursement policies that encourage alternative modes for business travel, flexible work schedules, and information on tax incentives.

Implementation Guidance

- **Immediate:** Conditions exist to move forward immediately with this recommendation
- **Immediate Steps (0-12 months):**
 - City Staff should appoint a TOD/TDM champion to move forward with the implementation of the 2007 plan.
 - Champion will begin outreach to develop/establish framework of TMA.
- **Medium Term Steps (12-24 months):**
 - Induct/enroll initial TMA members.

¹² Downtown San Leandro Transit-Oriented Development (TOD) Strategy, City of San Leandro, 2007.

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2.4 Parking Strategy Matrix

The following matrix (Table 7) identifies the relationship between the guiding principles discussed in Section 2.2 and recommended parking strategies discussed in detail in Section 2.3.

Table 7. Parking Strategy Matrix

PARKING STRATEGIES	GUIDING PRINCIPLES							
	Downtown San Leandro is a Valuable Community Asset	Simplify Parking Operations			Make Downtown Accessible By All Modes	Parking System Should Support Downtown Businesses	Prioritize Residential Parking For Residents	Program is Financially Self-Sustaining
		i. Make Downtown Parking User Friendly	ii. Provide a Positive Customer Experience and Practical Employee Solution	iii. Simplify Internal Management of Parking System				
A. Adopt Goals and Guiding Principles	✓	✓	✓	✓	✓	✓	✓	✓
B. Refine Organizational Structure				✓				✓
C. Update Rate Policy and Pricing	✓	✓				✓		✓
D. Simplify Parking Time Stays	✓	✓				✓		
E. Residential Permit Parking							✓	
F. Identify & Communicate Parking System	✓	✓	✓			✓		
G. Integrate Parking Technology		✓	✓	✓				
H. Manage Parking Fund to Solvency	✓			✓		✓		✓
I. Encourage TDM	✓				✓	✓		

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3.0 Parking Management Plan Costs and Revenues

3.1 Introduction

CDM Smith developed a 10-year Proforma analysis of the recommended parking management plan strategies using cost and revenues provided from the City of San Leandro as a baseline. It includes capital equipment estimates and replacement costs as well as estimated labor needs to support the program and anticipated revenues. The evaluation includes different equipment options and pricing approaches. The Proforma analysis is included in Appendix D along with the supporting Financial Analysis Tables.

The capital and operating costs for the Parking Management Plan alternatives are summarized below and are the basis for the Proforma. This information is only an initial estimate and will most likely need revision throughout the implementation of the plan to reflect actual cost.

Recommended Program Summary

- Off-Street Lots with free 2-hour parking and \$1/hour parking meters
- Monthly Permits and Short-Term Meters at the Estudillo garage
- Residential Permit Program – Downtown

Recommended Capital Costs

- Multi-space meters at the Estudillo garage (2 meters at \$12,000 each with a 10-year lifespan; \$24,000 total capital cost)
- Enforcement PDAs (3 PDAs at \$2,000 each, including tablet and printer, with a 3-year lifespan; \$4,000 total capital cost every 3 years)
- Wayfinding Signs (one-time up-front cost of \$5,000)
- Assumption that equipment is financed through the vendor
- Assumption that Genetec LPR cameras are a sunk program cost which should be able to be integrated into an updated enforcement program at little additional cost per discussion with the vendor.
- Assumption that annual maintenance costs for the meters are included with the costs above.
- Assumption that new or replacement enforcement PDAs will be needed; however, the equipment vendor will evaluate what the City has and may make additional recommendations.

The following sections describe the program costs and revenues developed for the parking management plan.

3.2 Program Costs

Smart Meters versus Multi-space Meters

Although CDM Smith developed cost alternatives for two on-street metering technologies—single space smart meters and multi-space meters—the City of San Leandro has decided to move forward with free on-street parking and not requiring any on-street metering until a functional capacity of 85% is reached for on-street parking.

Off-Street Lots with Multi-space Meters

The Estudillo garage will need two new multi-space meters installed because the prior vendor can no longer support the existing equipment.

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City Labor Costs

Based on information provided by the City, CDM Smith assumed 3.38 FTEs currently support the parking program with a total annual budget of \$535,000. CDM Smith proposes to increase the number of FTEs supporting the parking program to 5.13 with a total annual budget of \$692,000. The increased FTEs would include two full-time parking aides and one half-time parking aide, 10% of the Public Works Manager's time, increasing the two public works employees to be full time, and 20% of the Information Services Specialist's time. Given that the total on-street and off-street parking space inventory in Downtown San Leandro is 3,200 spaces, the total labor cost per space per year is currently \$167, which would increase to \$216 under the proposed scenario. Labor costs are assumed to escalate with the Consumer Pricing Index (CPI).

Although this long-term proposal would result in increased labor costs, it would also result in increased revenue through use of the long-term parking options at the Garage and increased citation revenue from more rigorous enforcement of the time-restricted parking areas.

Third-Party Parking Manager

CDM Smith also recommends the City work with a third-party parking manager, which would offset some of the labor costs that the City currently has and would also improve efficiency of the system. The third-party parking manager would run solicitation and manage vendor services, run analytics on technologies, and would manage daily operations and potentially enforcement services. The third-party parking manager would cost the City a fixed monthly cost between \$7,500 and \$9,500, based on the agreed roadmap of services and level of staffing support from the City. It should be noted that the third-party parking manager would require an annual contract. In the Proforma model, the third-party parking manager's cost is assumed to escalate with the CPI.

3.3 Program Revenues

Meter Rates & Price Escalation

CDM Smith assumed that revenues at the Estudillo garage would escalate annually with the CPI with a rate in Year 1 of \$0.50. The revenue estimate accounts for only potential revenue hours because the Estudillo garage has 2 hours free.

As noted in Section 3.3, price escalation is required to keep the parking program net positive. Without escalation to cover labor costs, the program will begin to go negative in Year 3.

Mobile Payments versus Credit Card Payments

CDM Smith assumed that mobile payments are currently at 10% and will increase linearly to 50% in Year 10 as users sign up for accounts and become more accustomed to the mobile payment system and come to prefer the security and convenience of mobile payment over credit cards. The mobile payment company receives \$0.25 per transaction paid by the user at no additional cost to the City.

Banks charge the merchant 3 to 5 percent of the total transaction for credit card processing fees. To account for this in the model, CDM Smith assumed 4 percent of the total per transaction, and reduced the price per hour for credit card users by 4 percent. Because transaction fees for mobile payments are charged to the user rather than the City, the City would net the full price per hour; therefore, mobile payments would net more revenue for the City than credit card payments. If the City elects to use a mobile payment vendor for multiple services it will be possible to consolidate/reduce fees.

Downtown Parking Management Plan

Employee Permits

There are currently two kinds of monthly parking permits at the Estudillo garage, reserve permits and general permits. There are currently an estimated 113 monthly permits (combined reserve and general) at the Estudillo garage. The number of permits is assumed to increase linearly to 600 permits per month by Year 10 of the program. Although 600 permits per month exceeds the garage's capacity, it is typical to oversell permits because most permit holders do not use the garage at the same time, particularly in a situation like this with part-time/shift workers. CDM Smith is also recommending free permits for part-time/low-income (PTLI) employees. Over the 10-year period, CDM Smith anticipates that the number of reserve permits will increase from 94 to 200 total permits, the number of general permits will decrease from 19 to zero permits, and free permits will increase from zero to 400 permits to fill the balance. The City should have a policy of overselling the (PTLI) permits since it is anticipated that these users will have a variety of shifts and will be unlikely to fill the garage. Sales, occupancy and enforcement reports will be monitored to determine when and if adjustments to permit sales are merited.

Reserve permits are sold for \$55 per month, and general permits are sold for \$35 per month. Each permit purchased costs the City \$1 per month for processing.

CDM Smith evaluated two scenarios for permit rates: constant reserve permit rates and escalated reserve permit rates, which were assumed to escalate at approximately the CPI. At Year 10, escalated reserve permit rates would result in 37% more net revenue for the City, approximately \$62,000 per year.

Residential Preferred Parking Permits

CDM Smith developed a revenue estimate for a residential preferred parking program with the following assumptions:

- Approximately 10% of residential households in the City of San Leandro are located in the Downtown San Leandro study area and are eligible for inclusion in a potential RPP zone.
- Of the eligible households, 20 percent (650 households) will participate by Year 10, resulting in 650 permits per year by Year 10.
- The program will initially charge \$25/year and the cost will escalate annually with the CPI.
- An enforcement aide will be needed half-time at Year 3 and full time by Year 7 to support the RPP program.

Citation Revenue

Based on the citation revenue provided by the City, CDM Smith assumed that with the increase in the number of parking aides, citation revenue would increase approximately logarithmically. The current 5-year average for citations is \$135,000. With an approximately logarithmic increase, the citation revenue in Year 10 would be \$1,168,000.

Downtown Parking Management Plan

Appendices

Appendix A – Stakeholder Outreach Summary

Appendix B - 2013 Downtown San Leandro Parking Data Analysis

Appendix C – San Leandro Parking Demand Analysis

Appendix D – Proforma and Financial Analysis Tables

Appendix A – Stakeholder Outreach Summary



Downtown Parking Management Plan

Stakeholder Outreach Summary

During the month of July, the Placeworks team worked with the City of San Leandro to develop and execute a survey instrument to gather input from locals regarding existing parking management strategies. Survey methodology consisted of in-person intercept surveys recorded on tablets on SurveyMonkey survey software. This mechanism, along with summaries provided by individual surveyors on common themes and comments expressed while in the field, were used as the main platform to gather opinions, ideas, and concerns over existing San Leandro parking issues. The most pertinent elements of the intercept survey are described within this memo and the full results of the questionnaire are also available for review. Three hundred forty five (345) people participated in the survey.

Intercept surveys were conducted near major entertainment, recreation and dining venues on Wednesday July 15th at the Farmers Market and Thursday July 16th and Saturday July 18th, 2015 in at Washington Plaza and Juana/E. 14th Street. The intercept survey results provide insight into the most common modes people utilize to reach downtown, local concerns about parking in San Leandro, and opinions on potential parking solutions. The purpose of the surveys were to gather information from visitors to the area, regardless of whether they worked or lived in San Leandro, and to explore how they commute to the area and what sorts of amenities or concerns motivate them.

Stakeholder Issues

The most consistent issues and themes from business owners, employees, residents and visitors in San Leandro are summarized as follows:

- Majority of shoppers and restaurant goers are able to adequately finish their business within the exiting time restrictions
- Strong desire for increased time limit restrictions, both by visitors and business owners
- Strong concern over two-hour limit parking restrictions from employees
- Strong concern over peak noon-time parking and reparking due to lack of availability of on-street spaces
- Inadequate wayfinding and poor disbursement of existing parking information has made the nearby parking structure underutilized
- Concern over BART commuters parking in lots and on residential streets

In addition, a variety of other issues worthy of exploration arose during survey process, including:

Downtown Parking Management Plan – Outreach Summary

- How appropriate is the use of reduced parking requirements for higher-density, mixed-use development
- Spillover from nearby businesses is a real concern for business owners in the area

Key Highlights

Surveys were distributed to all people who visited the general vicinity where surveyors were located. Therefore, there is no specific breakdown of responses by group. Surveys were distributed from 4-8PM at the Farmers Market on the 15th, 10am -2 pm and 4-8PM on both Thursday the 15th and Saturday the 18th. Locations on the 16th and 18th included the Washington Plaza, Estudillo Garage and West Juana Ave between Washington and San Leandro Blvd.. A general profile of respondents, along with relevant data from the survey is provided below.

San Leandro General Parking Management Profile

Most of those surveyed were in the area for unstated purposes “Other”, shopping, or eating out. **Figure 1** shows a breakdown of respondents’ purpose for visiting San Leandro. Other and shopping each account for about a third of responses, with dining out “eating” and working following significantly behind. From the responses we can gather that most people in the area will not require long-term parking. Because most people in the area are shopping or partaking in undisclosed activities and only a small percentage (twelve percent) are working, most people can be assumed to be running short-term parking trips. **Figure 2** provides responses to our follow-up question examining the length of stay by those visiting. Seventy percent responded in-between 30 minutes or less and 2 hours maximum. Short-term parking is not an issue for visitors, but as observed by surveyors, is a major nuisance for employees in the area who are forced to shuffle cars every few hours or remove chalk marks from their tires to avoid getting ticketed.

Convenient and free off-street parking has helped place driving as the preferred mode of those surveyed, with sixty-one percent driving to San Leandro the day of surveying. **Figure 3** provides a more in-depth breakdown of results that show a significant preference for the automobile (sixty-one percent of those surveyed drove to San Leandro that day) and minimal for bicycling and transit (four and thirteen percent, respectively). While this currently is a major hindrance, it is also a significant opportunity where the city can make major changes through direct transit improvement and multimodal projects. **Figure 4** provides a breakdown of the locations where respondents chose to park, the majority choosing public parking lots (seventy-three percent) where there is no fee. Of those who responded to our survey, ninety-four percent did not pay for parking (refer to **Figure 5**).

The most-popular motivating factor for selecting a parking spot for those surveyed was availability (selected by fifty-one percent of respondents), specifically the first space to become available. Given that surveying was conducted on the day of the local Farmers Market, usually when most people visit the downtown during the week, this is no surprise. The second most popular motivating factor was proximity to destination (selected by forty-nine percent of respondents). In general, people remain satisfied (sixty-one percent very or somewhat satisfied) with current parking time

Downtown Parking Management Plan – Outreach Summary

restrictions (refer to **Figure 6**) and satisfied overall (fifty-four percent very or somewhat satisfied) with availability of parking in San Leandro (refer to **Figure 7**).

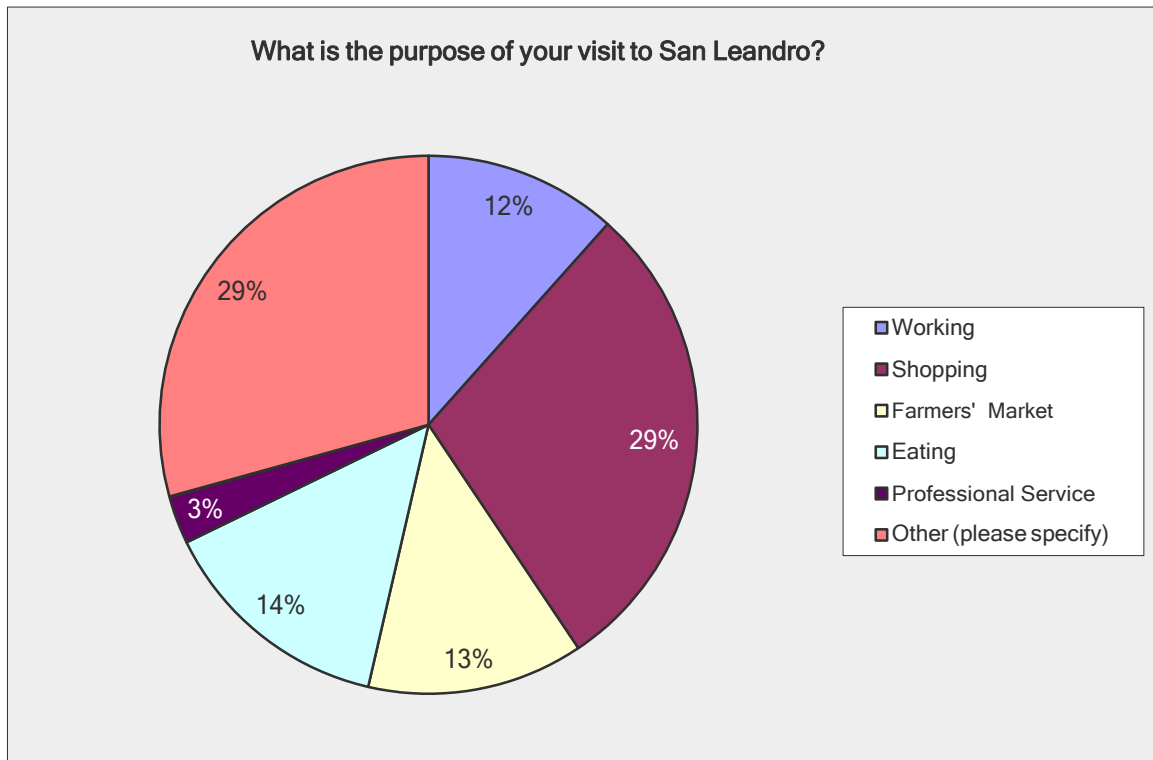


Figure 1 Purpose of your visit to San Leandro

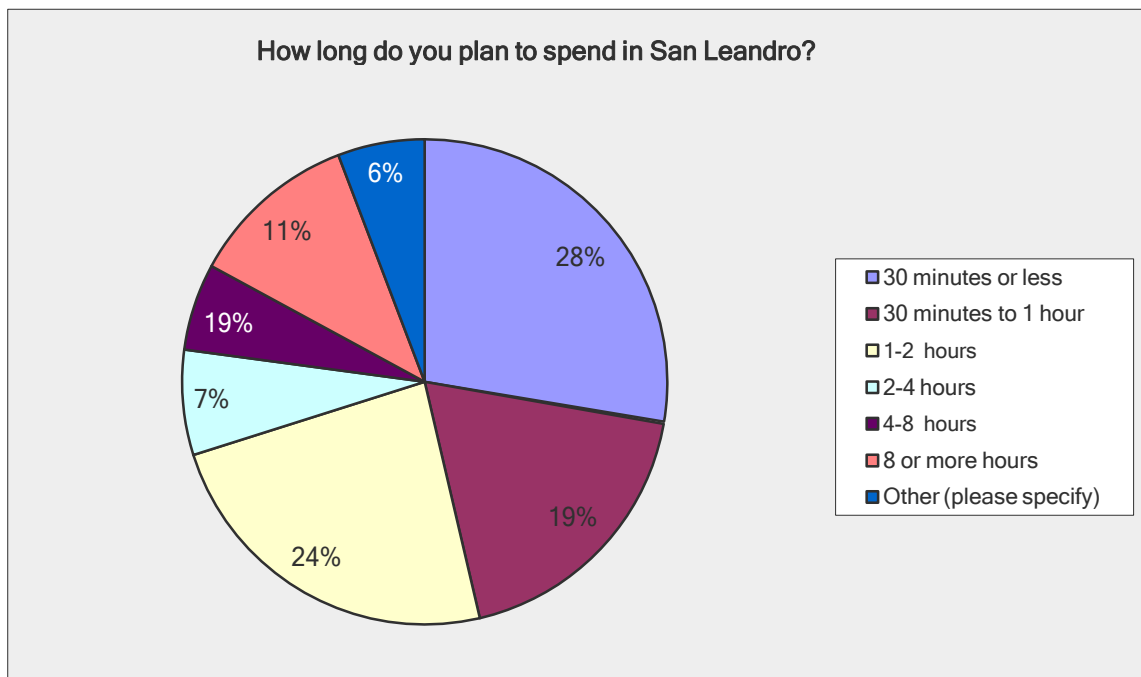


Figure 2 Length of stay

Downtown Parking Management Plan – Outreach Summary

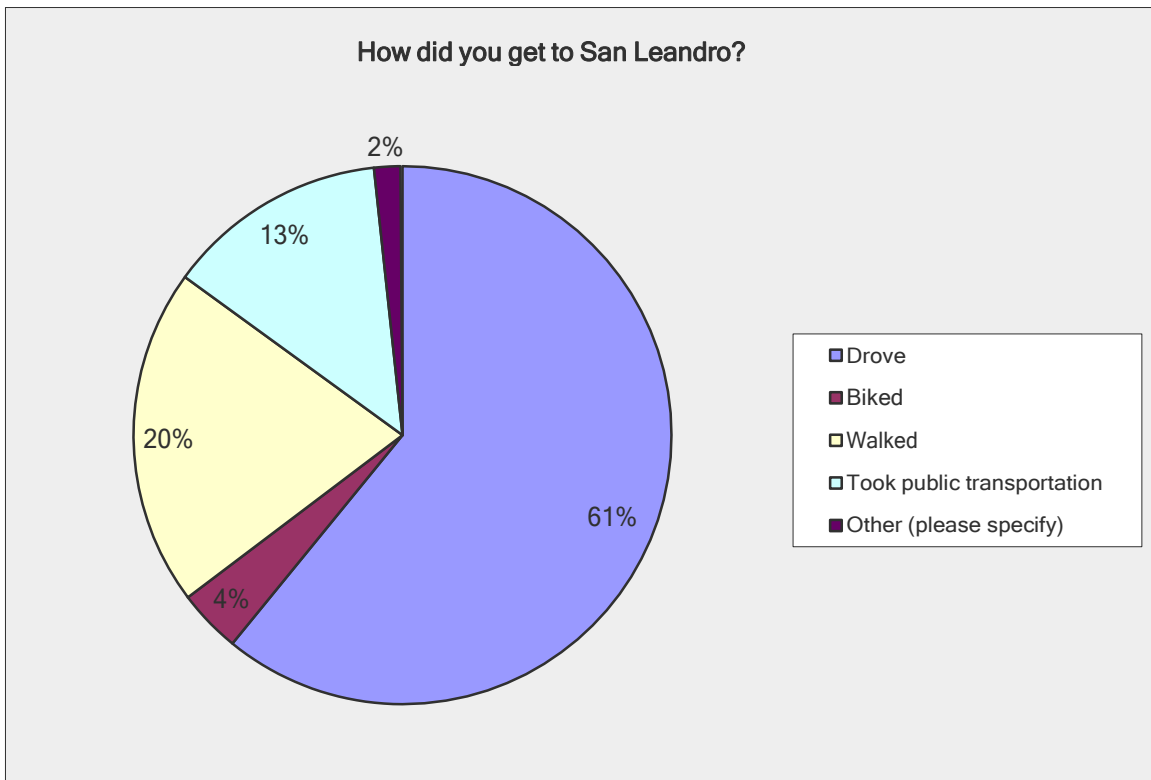


Figure 3 How did you get to San Leandro

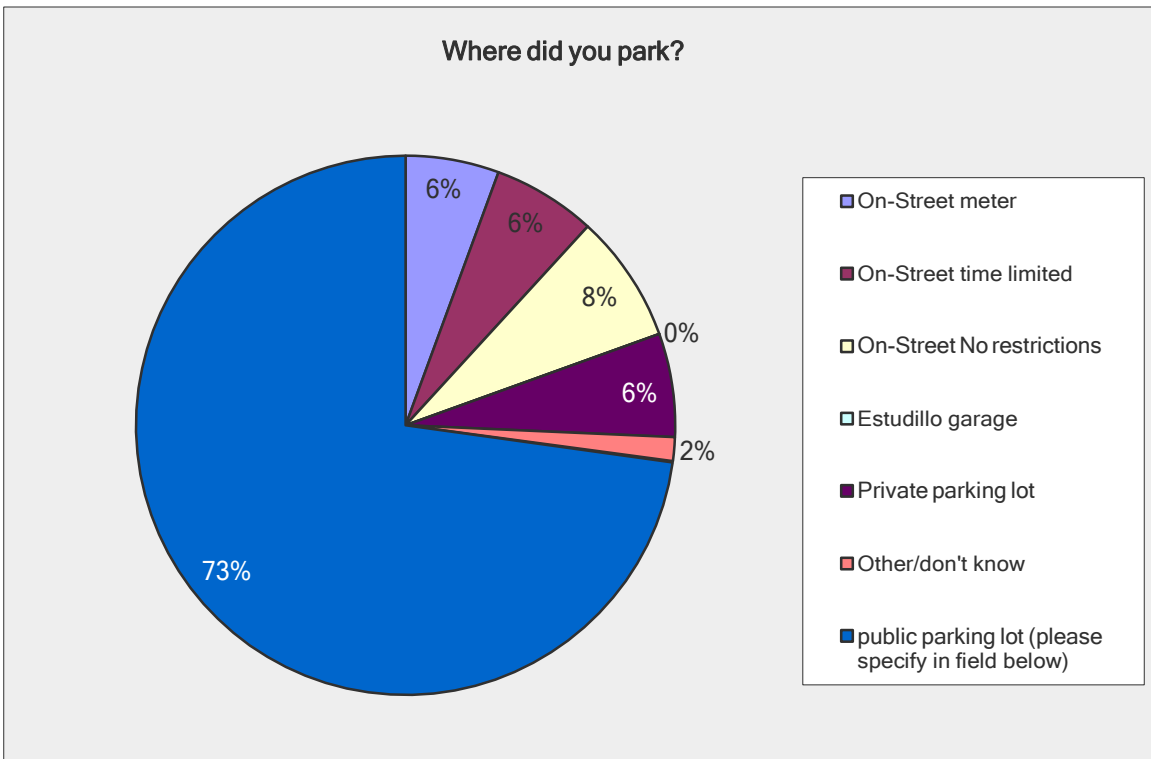


Figure 4 Where did you park?

Downtown Parking Management Plan – Outreach Summary

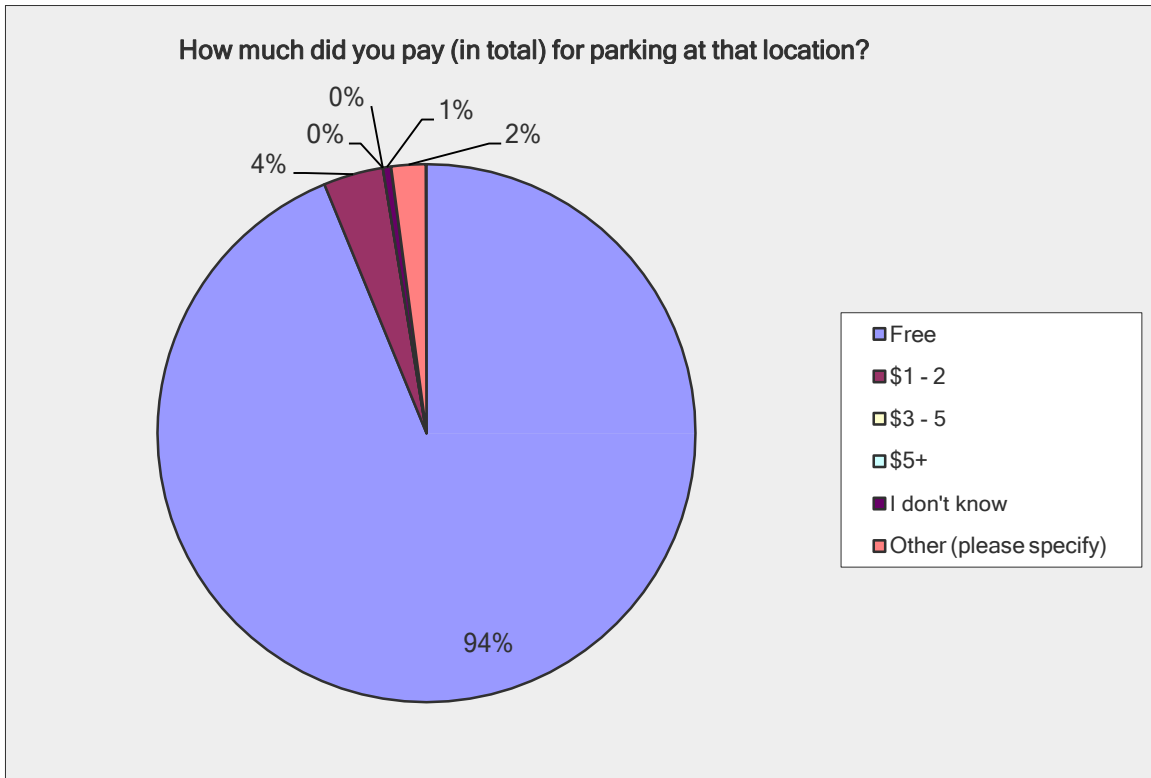


Figure 5 Cost of parking

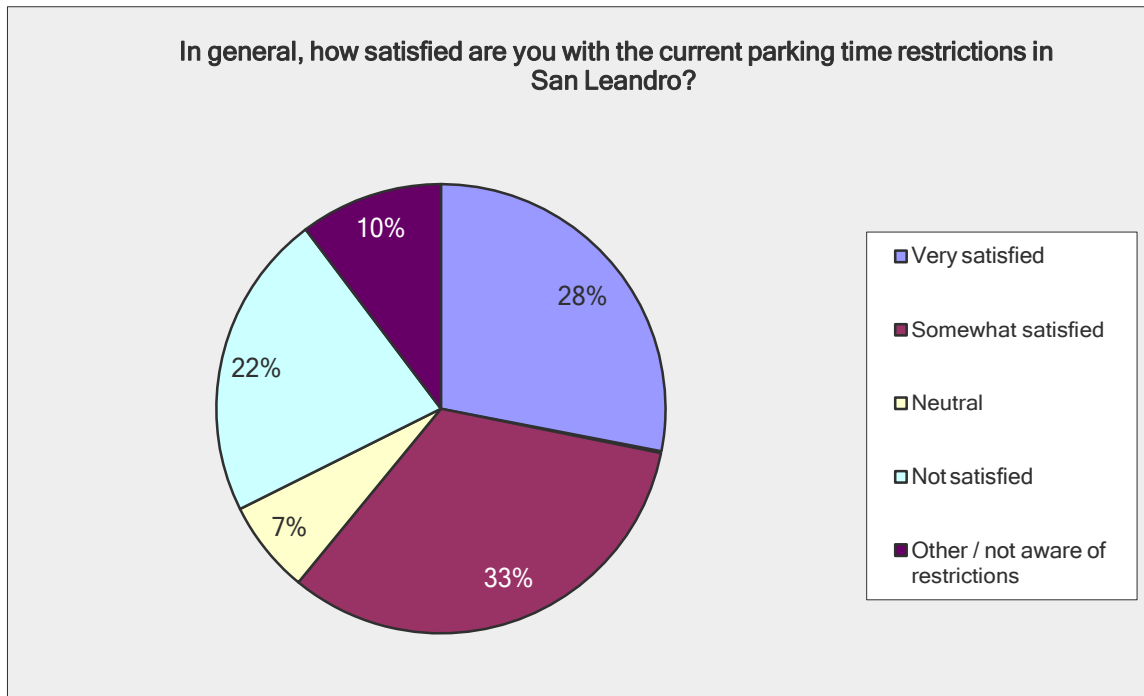


Figure 6 Satisfaction with current time restrictions

Downtown Parking Management Plan – Outreach Summary

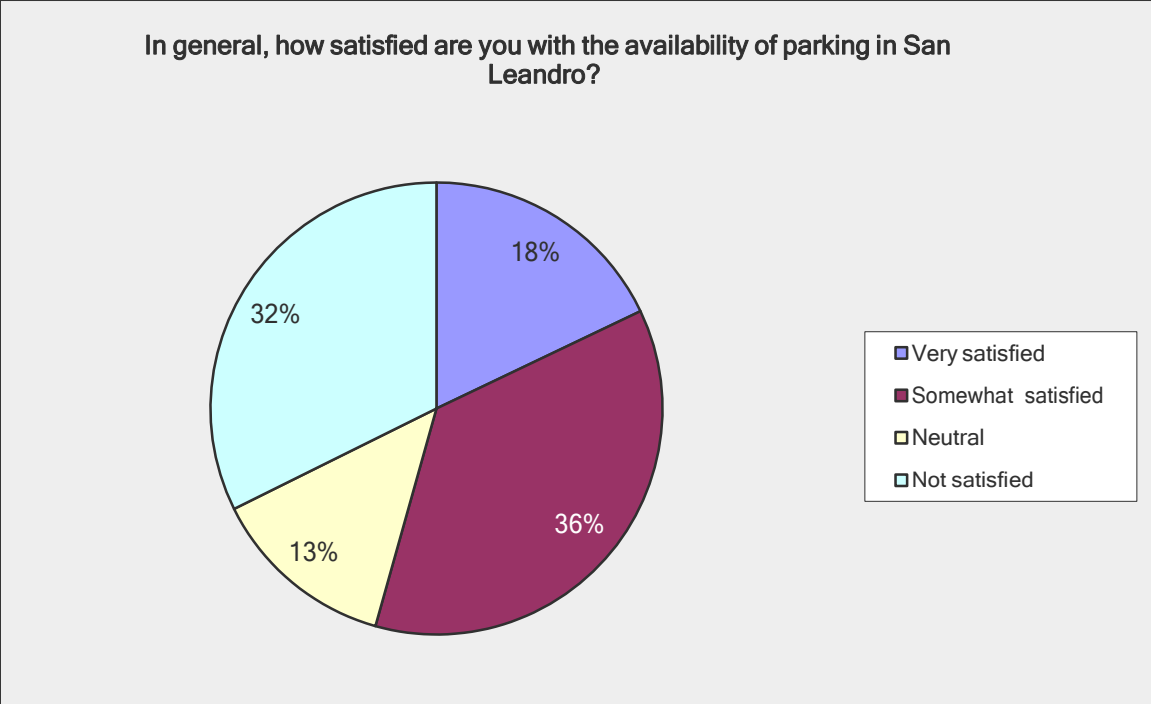


Figure 7 Satisfaction with available parking

Opinions related to on-street parking were slightly different from those focused on overall conditions. Fifty percent of respondents agree that finding on-street parking cannot be done quickly. An equal percentage of respondents believe parking garages or lots in the area have free spaces available (both at thirty percent). One good thing about existing on-street parking, as referenced previously, are the time-restrictions with visitors to the area. Only twenty-seven percent of respondents disagreed with the statement that time limits at the meter allow users enough time for their typical visit (refer to **Figure 8**). Time limits were the third most important thing respondents took into consideration when selecting a parking spot, number one being availability and number two being parking rate (refer to **Figure 9**).

Forty-one percent of respondents agree that the implementation of a residential parking permit (RPP) program in Downtown neighborhoods would help manage parking. Slightly more than one-third of respondents (thirty-six percent) disagreed. **Figure 10** provides a breakdown of the results of that question. Although the figures provide a somewhat even split between those opposed and those in favor of a potential RPP program, conversations with those opposed, neutral, or no opinion showed limited understanding about the permit program. It is our belief that through education on the issues occurring downtown and community meetings, a community members impacted by commercial/business parking in the downtown would support the program.

In addition to examining attitudes about the existing parking management system, attitudes about bicycle parking facilities were examined including motivations for commuting by alternative modes. Results here showed a split opinion with the state of San Leandro’s limited bike parking facilities. As shown in Figure 11, thirty-nine percent of respondents were either very or somewhat

Downtown Parking Management Plan – Outreach Summary

satisfied with bicycle parking and an equal thirty-nine percent were not satisfied. There is great room for improving on the City's side. Finally, most people who did not drive to the study area did so because of parking time limits (average score of 2, refer to **Figure 11**)

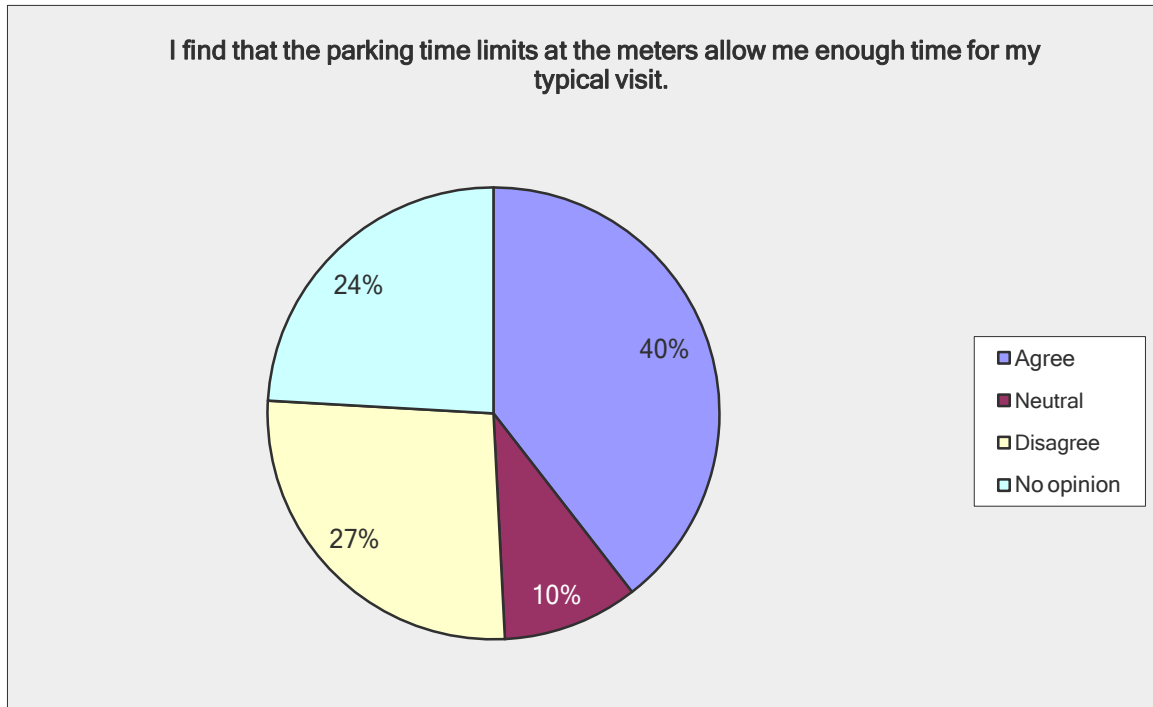


Figure 8 Time limits at meters

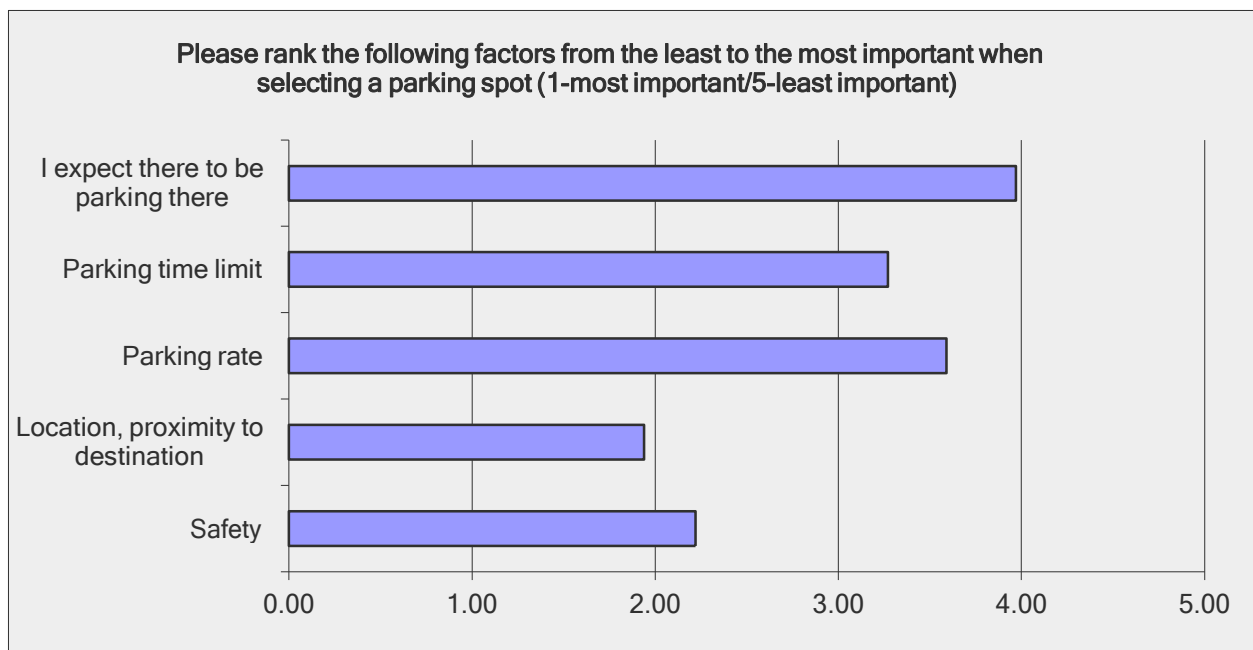


Figure 9 Important when selecting a parking spot

Downtown Parking Management Plan – Outreach Summary

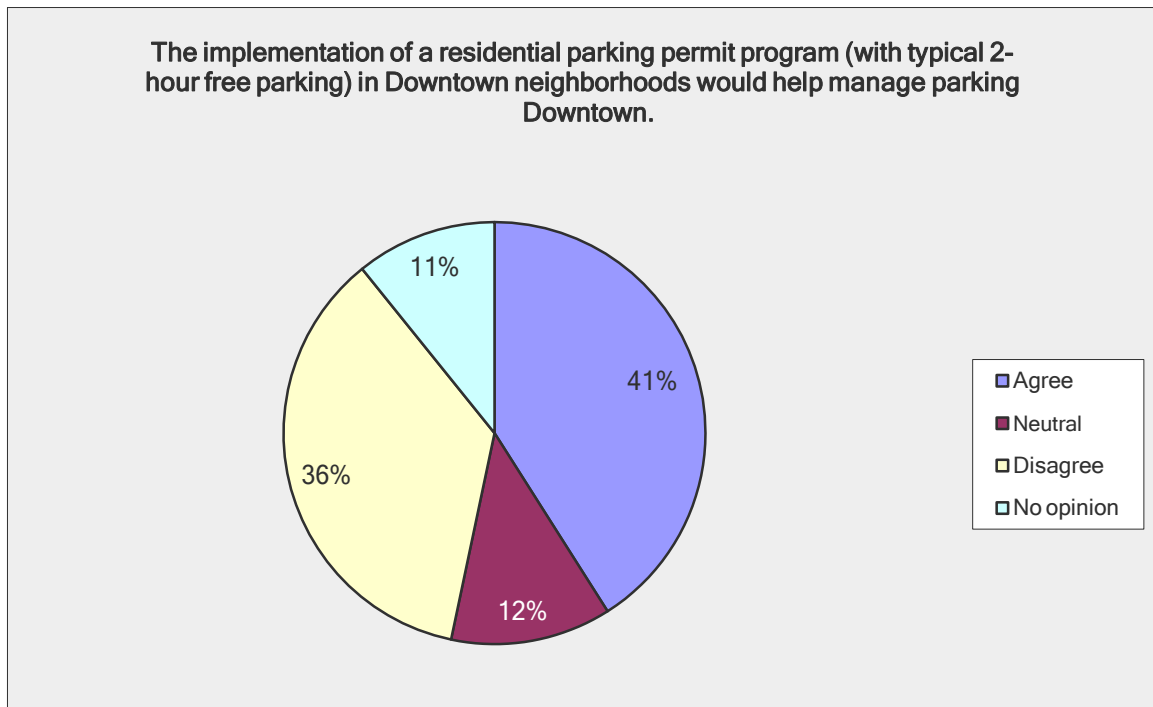


Figure 10 RPP in downtown neighborhoods

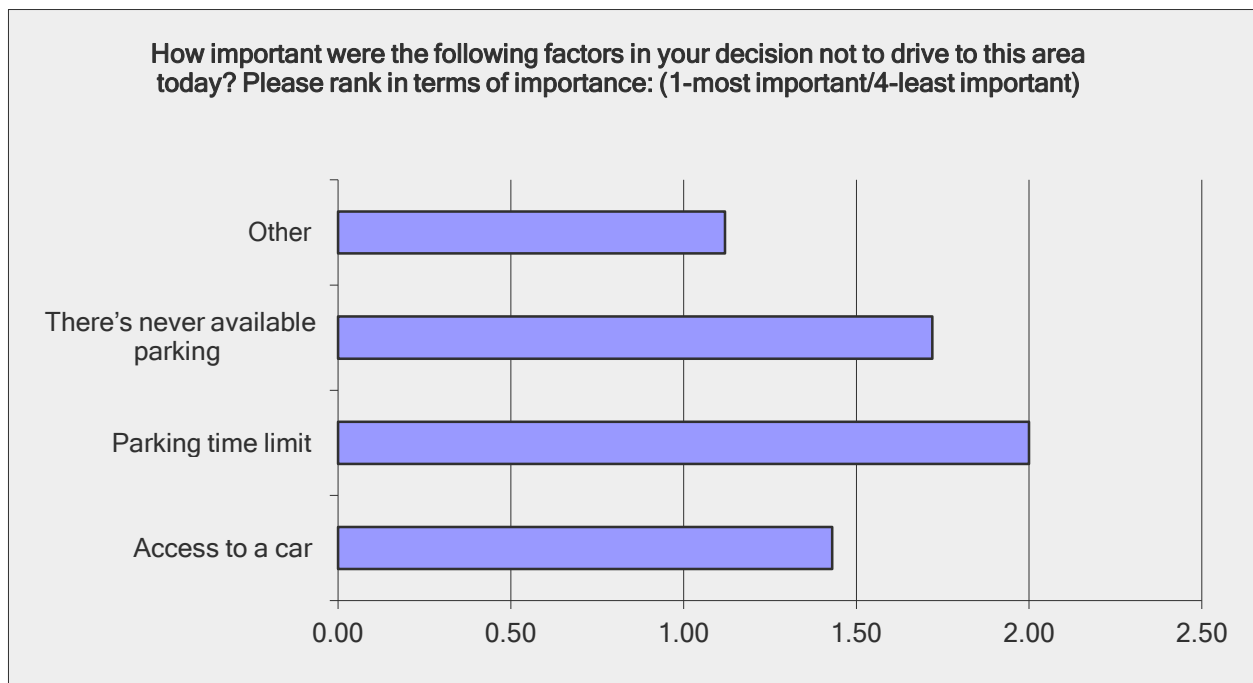


Figure 11 Factors that contributed to non-auto use

Overall Attitudes

Downtown Parking Management Plan – Outreach Summary

Our outreach reinforced that there is wide concern regarding the availability of parking in San Leandro and that identifying potential and appropriate remedies is worthy of the City's time and attention. As demonstrated in the survey results, there are currently a wide range of perspectives regarding pricing and parking time-limits. According to visitors surveyed, parking is mostly good if you are a visitor and do not require more than 2 hours of parking. Support for a residential preferential parking (RPP) system by respondents received a forty-one percent approval, with an additional twenty-three percent neutral/no opinion of its effects. Such results, with nearly one in four respondents responding that they are neutral/no opinion of potential effects of a new parking strategy, indicate that there is a strong opportunity for education. People are unsure how parking in the City truly works and could greatly benefit from educational workshops that bring residents up to speed on existing and future issues. The strongest consensus among the stakeholder outreach existed in the following areas:

- Strong support to make changes in time-restricted parking requirements and enforcement;
- Widespread recognition that the City's current parking facilities are underutilized and need improved wayfinding
- Insufficient parking management strategies cause greatest delay during noon, evening, and weekend travel

Appendix B - 2013 Downtown San Leandro Parking Data Analysis



Memorandum

To: Reh-Lin Chen and Kevin Cooke, City of San Leandro
From: Terri O'Connor, David Chew, and Ted Huynh, CDM Smith
Date: December 2, 2013
Subject: Downtown San Leandro Parking Data Analysis

This technical memorandum summarizes the analysis findings from the data collection efforts conducted for the downtown area of the City of San Leandro (the City).

Study Area

The study area was defined to be located roughly between the San Leandro BART station to the west, San Leandro Creek to the north, Bancroft Avenue to the east, and Elsie Avenue/Williams Street to the south. This study area is shown in **Figure 1**.

The study area was then split between two data analysis zones, called the core and periphery. The core is located within the heart of downtown San Leandro and contains all of the metered and the majority of the time-regulated parking located in the downtown, while the periphery rings the core, containing most of the unregulated parking spaces. **Figure 1** also depicts the locations of regulated and unregulated parking. Regulations include metered, time-enforced, or loading parking spaces. **Appendix A** exhibits all existing parking restrictions within downtown San Leandro.¹

Data Collection and Methodology

Data was collected by the City of San Leandro using vehicle-mounted mobile License Plate Recognition (LPR) devices and garage-mounted LPRs. Data was collected hourly from 9 AM to 6 PM over two days, including one weekday (Tuesday September 10th, 2013) and one weekend day (Saturday September 7th, 2013).

Mobile LPR devices mounted on city parking enforcement vehicles were used to collect data for all on-street parking in the study area, as well as for all off-street facilities, with the exception of the Estudillo Garage, which utilized the garage-mounted LPRs. With the mobile LPR devices, data was collected using a pre-determined route (shown in **Appendix B**) to ensure that all blockfaces and off-street spaces were passed by at least once during each hour of data collection.²

The garage-mounted LPR devices at Estudillo Garage collected continuous data for a 24-hour period on the collection dates. LPR cameras were mounted at each garage entrance and exit to

¹ This map was developed by the City of San Leandro.

² It should be noted that during the analysis of data, LPR reading errors were observed resulting in some instances of vehicle over-counting. Efforts were made to remove these redundancies where possible. Over-counting was not able to be field verified; adjustments were subsequently made in post processing using professional judgment.

record license plates. For the purpose of analysis, the data was processed to include a single one hour data point. Each data point consisted of the maximum occupancies that were observed in 15-minute intervals (i.e. the maximum vehicles observed within the garage at 9:00 AM, 9:15 AM, 9:30 AM and 9:45 AM). The analysis and findings from this data collection effort are described below.

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 1
Study Area

Parking Inventory

Inventory data provided by the City of San Leandro includes a total of 3,239 spaces within the study area, including 1,466 off-street spaces and 1,773 on-street spaces (608 core and 1,165 periphery). The breakdown of space types for on-street and off-street parking is shown below in **Table 1**.

Table 1 – Overall Parking Inventory

Space Type	Total	Regulated	Free
On-Street			
Core	608	368	240
Periphery	1,165	237	928
Total	1,773	605	1,168
Off-Street			
Washington Plaza Lot (North)*	128	128	0
Washington Plaza Lot (South)*	356	356	0
Pelton Center Lot	75	75	0
CVS Parking Lot	111	111	0
Main Library Parking Lot	153	153	0
Best Building Parking Lot	57	57	0
Albertson Temp Parking Lot	202	202	0
Estudillo Parking Garage	384	384	0
Total	1,466	1,466	0
Overall			
Total	3,239	2,071	1,168

*For purposes of the analysis, the Washington Plaza Lot was divided into two portions. These areas were divided by the Estudillo Avenue entrance/exit driveway into a northern and southern lot area.

Parking Occupancy Analysis

The parking occupancy analysis paints a detailed picture of how public parking is utilized in downtown San Leandro. The following terms are used when discussing parking occupancy.

- **Occupancy:** The number of cars parked in a specific area, lot, or blockface during one period of observation. It is often expressed as the percentage of the total supply of spaces that is occupied by parked cars.
- **Parking Event:** A parking event refers to each instance where a single, unique vehicle is observed parked in a single, unique space.
- **Peak:** The time period associated with the highest observed level of occupancy in a specific area or parking facility.
- **Practical Capacity:** The occupancy level or number of vehicles that can be parked in a facility or area before it becomes difficult for a driver to find a space without having to circle or

“cruise” for parking. Practical capacity is typically set at an 85 percent occupancy level. For on-street parking this equates to roughly one vacant space per blockface.

Overall Occupancy Analysis

Overall downtown San Leandro parking occupancies are graphically shown in relation to practical capacity (85 percent) for a weekday in **Figure 2** and for a weekend in **Figure 3**.

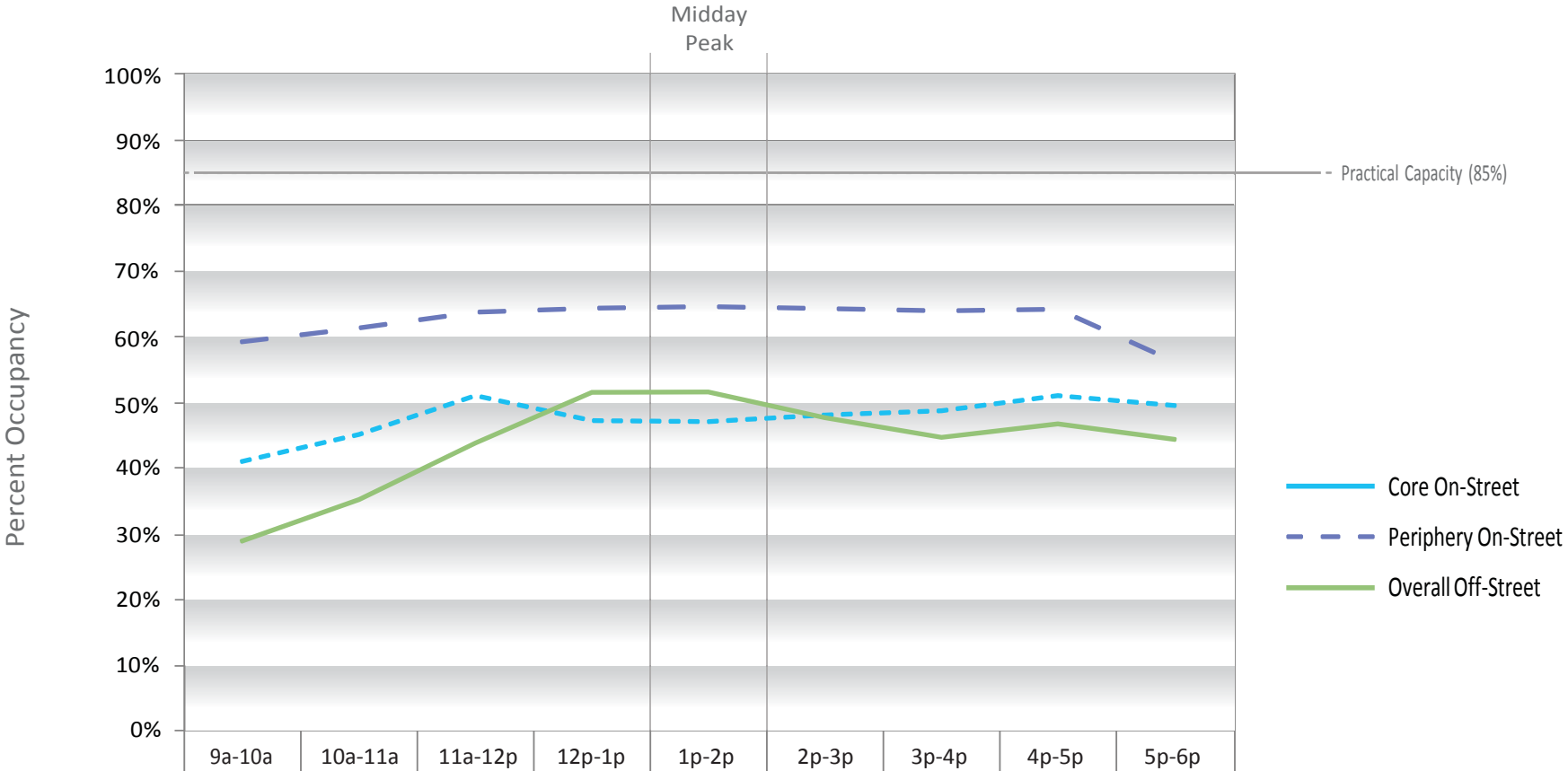
Weekday Overall Occupancy Trends

Weekday occupancy levels experience a gradual increase in the morning hours between 9 AM and 11 AM and then remain relatively constant throughout the day until 4 PM, when occupancy begins to decrease. Among the various parking areas, the periphery on-street spaces experience the highest occupancies throughout the day, peaking at approximately 64 percent, while the core peaks at 52 percent midday.

Weekend Overall Occupancy Trends

Weekend occupancy levels experience two different trends for on-street and off-street parking. On-street occupancy levels experience a slight shift in parking demand between the core and periphery, as the periphery observes the higher demand in the morning followed by the core in the afternoon and followed again by the periphery in the late afternoon; overall, occupancy levels remain consistent between the core and periphery at approximately 48 percent throughout the day. Off-street occupancy levels exhibits a single occupancy peak in the afternoon between 1 PM and 2 PM at approximately 47 percent. Overall weekend occupancies do not exceed 50 percent during any time period analyzed.

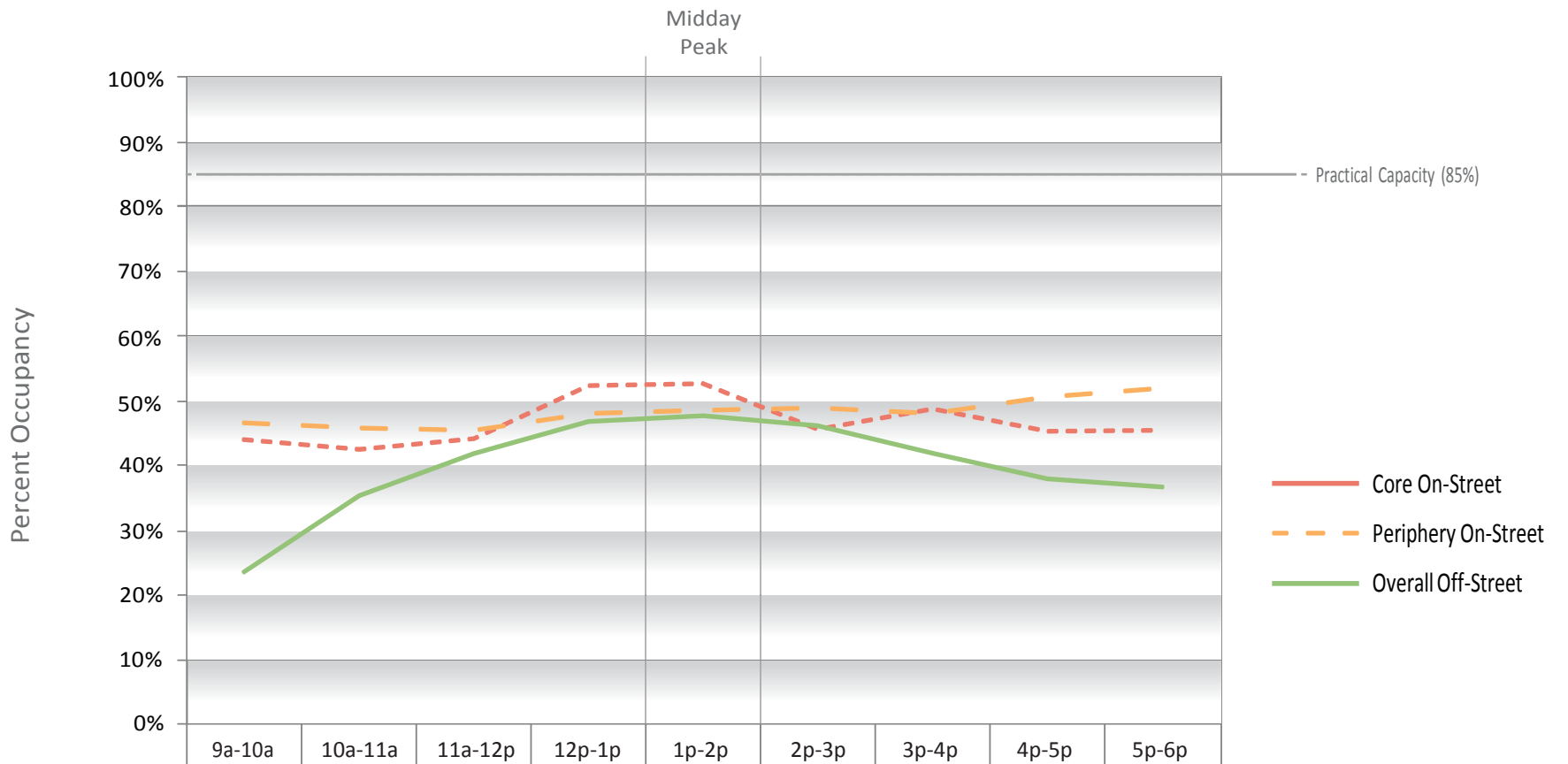
DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



	9a-10a	10a-11a	11a-12p	12p-1p	1p-2p	2p-3p	3p-4p	4p-5p	5p-6p
On-Street Spaces									
Core	41%	45%	51%	47%	47%	48%	49%	51%	49%
Periphery	59%	61%	64%	64%	64%	64%	64%	64%	56%
Overall	53%	56%	59%	58%	58%	59%	59%	60%	54%
Off-Street Spaces									
Overall	28%	34%	43%	50%	50%	47%	44%	46%	43%
All S Overall	42%	46%	52%	55%	55%	53%	52%	53%	49%

Figure 2
Weekday Overall Occupancy

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



	9a-10a	10a-11a	11a-12p	12p-1p	1p-2p	2p-3p	3p-4p	4p-5p	5p-6p
On-Street Spaces									
Core	44%	42%	44%	52%	52%	45%	49%	45%	45%
Periphery	46%	46%	45%	48%	48%	49%	48%	50%	52%
Overall	45%	44%	45%	49%	50%	48%	48%	49%	50%
Off-Street Spaces									
Overall	23%	34%	41%	46%	47%	45%	41%	37%	36%
All Spaces									
Overall	35%	40%	43%	48%	48%	46%	45%	43%	43%

Figure 3
Weekend Overall Occupancy

Hour-by-Hour Occupancy Levels

The following tables present hour-by-hour occupancy rates for core and periphery on-street parking and the various off-street parking facilities.

To provide visual definition, the tables are highlighted to indicate periods of high usage. Cells highlighted in light pink indicate hours when a facility meets or exceeds practical capacity (85 percent) and remains below 95 percent, cells shaded in dark pink indicate times when occupancy was observed to have reached a critical level of 95 percent or higher, and cells shaded in red indicate times when occupancy was observed to reach full capacity.

Weekday Occupancy

Table 2 shows the weekday hourly occupancy levels for the study area. Overall, on-street occupancies remain under practical capacity throughout the day, with the core around 50 percent occupancy and the periphery peaking at 64 percent occupancy. This preference for periphery spaces could be due to the high amount of unregulated spaces present in the periphery.

Among the seven off-street facilities, the Pelton Center Lot and the Washington Plaza Lot (South) experience the highest occupancies throughout the day, suggesting a high demand for parking within the area of these two lots; the northern portion of the Washington Plaza Lot hovers around 50 percent occupancy while all other facilities remain under 50 percent throughout the day. In addition, these two facilities both experience more than a 20 percent increase in occupancy between 11 AM and 12 PM. This increase is likely due to the high amount of midday parking demand as a result of the presence of retail within the vicinity as compared to the rest of the study area.

Table 2 – Weekday Occupancy Levels

Space Type	Total Spaces	AM					PM				
		9 10	10 11	11 12	12 1	1 2	2 3	3 4	4 5	5 6	
On-Street											
Core	608	41%	45%	51%	47%	47%	48%	49%	51%	49%	
Periphery	1,165	59%	61%	64%	64%	64%	64%	64%	64%	56%	
Total	1,773	53%	56%	59%	58%	58%	59%	59%	60%	54%	
Off-Street											
Washington Plaza Lot (North)	128	44%	40%	42%	54%	55%	54%	50%	54%	64%	
Washington Plaza Lot (South)	356	33%	47%	61%	85%	81%	68%	68%	67%	67%	
Pelton Center Lot	75	27%	47%	72%	97%	83%	95%	65%	75%	81%	
CVS Parking Lot	111	14%	18%	23%	16%	21%	24%	17%	20%	14%	
Main Library Parking Lot	153	22%	26%	48%	46%	48%	37%	31%	48%	46%	
Best Building Parking Lot	57	25%	39%	47%	44%	51%	42%	42%	46%	23%	
Albertson Temp Parking Lot	202	5%	11%	13%	13%	20%	21%	14%	13%	14%	
Estudillo Parking Garage	384	37%	38%	40%	40%	41%	40%	43%	41%	33%	
Total	1,466	28%	34%	43%	50%	50%	47%	44%	46%	43%	
Overall											
Total	3,239	42%	46%	52%	55%	55%	53%	52%	53%	49%	

Weekend Occupancy

Table 3 shows the weekend hourly occupancy levels for the study area. Similar to weekday occupancies, weekend on-street occupancies also remain under practical capacity throughout the day. Overall, on-street occupancy levels between the core and periphery areas remain relatively constant, at approximately 48 percent throughout the day, with an increase in core area on-street occupancy between 12 PM and 2 PM. This increase parking demand for the core area could be attributed to visitors arriving at the downtown core area for afternoon activities such as shopping.

The high demand for parking at the Pelton Center Lot and the Washington Plaza Lot, particularly the southern portion of the lot, are also observed on the weekend, as these two lots exhibit relatively high occupancy levels throughout the day. In addition, the Pelton Center Lot exceeds practical capacity throughout the day and reaches or exceeds actual capacity between 11 AM and 4 PM.

Table 3 – Weekend Occupancy Levels

Space Type	Total Spaces	AM				PM				
		9 10	10 11	11 12	12 1	1 2	2 3	3 4	4 5	5 6
On-Street										
Core	608	44%	42%	44%	52%	52%	45%	49%	45%	45%
Periphery	1,165	46%	46%	45%	48%	48%	49%	48%	50%	52%
Total	1,773	45%	44%	45%	49%	50%	48%	48%	49%	50%
Off-Street										
Washington Plaza Lot (North)	128	41%	55%	41%	51%	58%	62%	53%	48%	48%
Washington Plaza Lot (South)	356	41%	60%	70%	81%	83%	79%	67%	65%	78%
Pelton Center Lot*	75	43%	97%	100%	100%	100%	100%	100%	89%	93%
CVS Parking Lot	111	16%	6%	23%	21%	20%	25%	22%	16%	20%
Main Library Parking Lot	153	10%	25%	32%	41%	42%	54%	47%	46%	6%
Best Building Parking Lot	57	19%	25%	42%	53%	39%	0%	18%	21%	14%
Albertson Temp Parking Lot	202	6%	16%	19%	26%	27%	19%	24%	17%	18%
Estudillo Parking Garage	384	13%	15%	18%	18%	18%	17%	15%	13%	11%
Total	1,466	23%	34%	41%	46%	47%	45%	41%	37%	36%
Overall										
Total	3,239	35%	40%	43%	48%	48%	46%	45%	43%	43%

Note: The LPR recorded greater occupancy than listed inventory at the Pelton Center Lot from 11AM to 4PM, but because of the potential for overcounting and lack of field verification, the occupancy was capped at 100%.

Peak Hour Occupancy Analysis

Peak hour occupancy levels provide a look at parking during the busiest times of the day throughout the downtown. The overall peak hour occupancy levels are shown in **Figures 4** and **5** for each parking facility and blockface, for both weekday and weekend day.

Weekday Peak

The overall weekday peak occupancies are graphically shown in **Figure 4** between 1 PM and 2 PM when overall occupancy reaches 55 percent. The parking facilities and blockfaces west of East 14th Street experience a high amount of parking demand when compared with those east of East 14th Street, as the majority of blockfaces west of East 14th exceed practical capacity during the peak hour. In addition, the two off-street facilities on the west side of East 14th Street are the only two off-street facilities to exceed 70 percent. This higher amount of occupancy can be due to higher levels of retail activity, its proximity to the San Leandro BART station and potential spillover from BART parkers, and its residential characteristics.

Weekend Peak

The overall weekend peak occupancies are graphically shown in **Figure 5** between 1 PM and 2 PM when overall occupancy reaches 48 percent. Overall, the weekend peak exhibits fewer blockfaces exceeding practical capacity west of East 14th Street as compared to the weekday. However, the

Washington Plaza Lot (South) and Pelton Center Lot continue to exhibit the highest occupancies among the off-street facilities. This indicates that the high weekday occupancy west of East 14th Street is likely due to its close proximity to the San Leandro BART station, as commuters may be attracted to free parking near the station. In addition, the blockfaces surrounding the Washington Plaza Lot and the Pelton Center Lot do not experience high occupancy, suggesting that users attracted to the area for retail purposes are not spilling over to the neighboring blockfaces.

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 4
Weekday Peak Hour Occupancy 1:00PM - 2:00PM

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 5
 Weekend Peak Hour Occupancy 1:00PM - 2:00PM

Hours Over Capacity Analysis

The hours over capacity analysis shows locations where parking demand is sustained throughout the day, particularly at levels above practical capacity, and where parking may be underutilized. In **Figures 6** and **7** blockfaces and facilities are colored based on the number of hours during the day that each was observed to be at or above practical capacity (85 percent occupied).

Weekday

Figure 6 presents areas where parking demand is sustained above practical capacity throughout the day for a weekday. Approximately half (46 of 101) of the blockfaces west of East 14th Street exceed practical capacity for extended periods of time (4 or more hours), while few blockfaces east of East 14th Street exhibit this behavior. This indicates that the close proximity to BART significantly affects parking occupancies throughout the day, particularly along blockfaces near the station. The east side of downtown San Leandro remains relatively underutilized throughout the day, with many blockfaces never exceeding practical capacity during any time of the day.

Weekend

Figure 7 presents areas where parking demand is sustained above practical capacity throughout the day for a weekend. Overall, few blockfaces observe high demands for extended periods of time; the Pelton Center Lot is the only off-street facility to exceed practical capacity at any point throughout the day.

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 6
 Weekday Hours Over Capacity

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 7
Weekend Hours Over Capacity

Duration Analysis

The parking duration analysis is presented in terms of observed distribution of “parking events” by length of stay. A parking event is defined as when a vehicle is observed to occupy a single space during one observed time period during data collection.

Weekday

Table 4 presents the length of stay by space type for the study area between 9 AM and 6 PM for the weekday. The average user parking on-street in the periphery stays for slightly less than an hour longer than a user parking in the core area. This can be due to the higher amount of unregulated parking in the periphery area. Only 50 percent of on-street parkers stay for an hour or less, likely indicating that some on-street parkers are nearby residents or commuters who park in free parking areas.

Off-street, the Estudillo Parking Garage observes the highest average duration at just over 4 hours. In addition, 30 percent of its users stay for 8 hours or more. This suggests a high amount of employees utilizing the Estudillo Parking Garage. Among the remaining off-street facilities, the Best Building Parking Lot and Albertsons Temp Parking Lot exhibit similar durations of approximately 2.30 hours, while all other facilities experience average durations between 1.35 and 1.65 hours. Around three quarters of parkers use off-street parking for an hour or less, indicating that many visitors park in the off-street lots for short visits to nearby retail and restaurants.

Table 4 - Weekday Durations by Parking Type

Space Type/Facility	Total Spaces	Parking Duration (Hours)									Average Stay (Hours)
		1	2	3	4	5	6	7	8	9	
On-Street											
Core	608	60%	12%	7%	5%	4%	2%	2%	4%	5%	2.44
Periphery	1,165	46%	13%	6%	6%	4%	5%	4%	6%	9%	3.30
Total	1,773	50%	13%	6%	5%	4%	4%	4%	6%	8%	3.00
Off-Street											
Washington Plaza Lot (North)	128	87%	5%	3%	2%	1%	1%	0%	0%	0%	1.35
Washington Plaza Lot (South)	356	86%	6%	2%	1%	1%	1%	1%	1%	0%	1.37
Pelton Center Lot	75	79%	9%	4%	1%	2%	2%	2%	1%	0%	1.56
CVS Parking Lot	111	82%	4%	2%	1%	2%	4%	1%	3%	2%	1.79
Main Library Parking Lot	153	67%	21%	6%	2%	2%	1%	1%	0%	1%	1.65
Best Building Parking Lot	57	69%	7%	2%	6%	2%	7%	1%	3%	3%	2.27
Albertson Temp Parking Lot	202	57%	17%	7%	2%	5%	5%	5%	2%	1%	2.28
Estudillo Parking Garage	384	46%	6%	5%	3%	3%	2%	5%	11%	19%	4.05
Total	1,466	78%	8%	3%	2%	1%	2%	1%	2%	2%	1.76
Overall											
Total	3,239	65%	10%	5%	4%	3%	3%	3%	4%	5%	2.36

Figure 8 illustrates the average length of stay at each blockface/facility throughout the study area for the weekday. As expected, blockfaces in the periphery area exhibit longer durations than the core area. These longer durations are primarily observed west of East 14th Street, indicating that residents and/or BART users are utilizing these blockfaces for longer periods of time.

Weekend

Table 5 presents the length of stay by space type for the study area between 9 AM and 6 PM for the weekend. Similar to the weekday, the average user parking in the periphery stays for a longer period of time than users parking in the periphery, approximately 45 minutes longer.

The off-street facilities exhibit similar duration characteristics to the weekday with an average duration ranging from 1.26 to 2.14 hours. While the Estudillo Parking Garage observes the highest average duration at 2.14 hours, it is approximately 50 percent less compared to the weekday (4.05 hours). This suggests that employees are utilizing the garage for longer periods of time during weekdays, but the garage on the weekend is used more often by visitors. 81 percent of users park for an hour or less on weekends, indicating the high turnover of users parking at lots.

Table 5 - Weekend Durations by Parking Type

Space Type/Facility	Total Space	Parking Duration (Hours)										Average Stay (Hours)
		0-1	1-2	2-3	3-4	4-5	5-6	6-7	7-8	8-9	9-10	
On-Street												
Core	608	63%	13%	6%	3%	2%	4%	2%	2%	4%		2.25
Periphery	1,165	48%	15%	8%	6%	5%	4%	3%	4%	7%		2.95
Total	1,773	54%	14%	7%	5%	4%	4%	3%	4%	6%		2.67
Off-Street												
Washington Plaza Lot (North)	128	88%	6%	2%	2%	0%	1%	0%	0%	0%		1.26
Washington Plaza Lot (South)	356	87%	7%	2%	1%	1%	0%	1%	1%	1%		1.35
Pelton Center Lot	75	78%	12%	3%	2%	1%	0%	1%	2%	0%		1.57
CVS Parking Lot	111	79%	8%	1%	4%	2%	2%	1%	3%	1%		1.68
Main Library Parking Lot	153	65%	18%	6%	5%	2%	1%	1%	2%	0%		1.76
Best Building Parking Lot	57	80%	10%	1%	2%	6%	1%	0%	0%	0%		1.47
Albertson Temp Parking Lot	202	69%	12%	3%	4%	1%	3%	3%	4%	1%		2.00
Estudillo Parking Garage	384	74%	7%	1%	1%	4%	4%	2%	1%	6%		2.14
Total	1,466	82%	9%	2%	2%	1%	1%	1%	1%	1%		1.50
Overall												
Total	3,239	69%	11%	4%	3%	2%	2%	2%	2%	3%		2.03

Figure 9 illustrates the average length of stay at each blockface/facility throughout the study area for the weekend. Overall, there are fewer blockfaces exhibiting high durations than compared to the weekday. However, the southwest area of the study area continues to display high durations. The high durations in this area is likely due to its primarily residential nature.

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 8
Weekday Duration

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 9
Weekend Duration

Likely User Type Analysis

Vehicles parking within the downtown were assumed to be visitors or employees based on their length of stay; this high level of analysis helps to determine how different user types use parking in the downtown. Likely customers were defined as having a total parking duration of 4 hours or less and likely employees were defined as having parked for a total of 5 hours or more. Between the weekday and weekend, there is a five percent difference in user type profiles, with the weekend observing a higher amount of likely customers.

Table 6 -Likely User Types

User Type	Total Vehicles	% of All Vehicles
<i>Weekday</i>		
Likely Customer	4,708	81%
Likely Employee	1,107	19%
All Users	5,815	100%
<i>Weekend</i>		
Likely Customer	4,981	86%
Likely Employee	811	14%
All Users	5,792	100%

Turnover

Parking turnover is an indicator of how often a single parking space is used by multiple vehicles throughout the day. Turnover rates are essential for areas with limited parking supply, such as downtowns, as they signify the level of convenience and availability for patrons parking in the area throughout the day. Typically, higher turnover numbers show that parking spaces are constantly being made available, while lower turnover counts reflect long-term parking areas and few parking restrictions, making it easier for vehicles to stay longer, but reducing the number of spaces available nearby for arriving vehicles.

The average frequency of parking turnover is graphically shown in **Figures 10** and **11** for each blockface and off-street facility for the study area throughout the day for the weekday and the weekend days.

Weekday

On a weekday, downtown San Leandro has a mixture of high and low turnover blockfaces throughout the study area. Residential areas such as the area in the southeast corner of the study area experience lower turnover rates. Among the off-street facilities, the south portion of the Washington Plaza Lot and the Pelton Center Lot exhibit the highest amount of average turnover, as more than four vehicles on average utilize a parking space within these facilities throughout the day.

Weekend

Overall, the weekend experiences low amounts of turnover throughout the study area. With the exception of the blockfaces surrounding the Pelton Center Lot, all but 11 of the 162 on-street blockfaces observe an average of three or fewer unique vehicles per space per day. In addition, the Washington Plaza Lot (South) and the Pelton Center Lot are the only off-street facilities with an average of more than three unique vehicles per space per day.

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 10
Weekday Turnover

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS



Figure 11
Weekend Turnover

Reparking Analysis

The recording of license plates for data collection was also used to track instances of reparking throughout the entire study area. Reparking was defined to have occurred whenever a vehicle (via license plate) was observed to have moved from one off-street parking facility or blockface to another within the study area. The results of this reparking analysis are shown below in **Tables 7 and 8**.

Weekday

Among likely customers, just 8 percent were observed to repark throughout the day, with a majority of these users reparking only once, likely to another part of downtown or to avoid a time restriction. While customer reparking was relatively uncommon, just over 36 percent of employees were observed to have reparked at least once during the day. Although the majority of likely employees reparked only once (235 users), likely due to leaving for lunch or running an errand, approximately 40 percent of reparking employees (402 users) did so two or more times; this could be in order to move their vehicles to avoid time restrictions.

Table 8 – Weekday Reparking by User Type

User Type	Total	Parked Once	Reparked (Total)	Reparked				
				1 time	2 times	3 times	4 times	5 or more
Likely Customer	4,708	4,324	384	324	55	5	0	0
% of all likely customers	100%	91.8%	8.2%	6.9%	1.2%	0.1%	0.0%	0.0%
Likely Employee	1,107	705	402	235	106	36	16	9
% of all likely employees	100%	63.7%	36.3%	21.2%	9.6%	3.3%	1.4%	0.8%
All Users	5,815	5,029	786	559	161	41	16	9
% of all users	100%	86.5%	13.5%	9.6%	2.8%	0.7%	0.3%	0.2%

Weekend

The weekend observed a similar amount of likely customers as the weekday and exhibited similar reparking characteristics, as majority of reparking customers did so only once. Although the weekend observed fewer likely employees than the weekday, a higher quantity of these users reparked at least once throughout the day. In addition, there is a higher percentage of employees reparking two or more times; suggesting that weekend employees are more likely to repark to avoid time restrictions.

Table 9 – Weekend Reparking by User Type

User Type	Total	Parked Once	Reparked (Total)	Reparked				
				1 time	2 times	3 times	4 times	5 or more
Likely Customer	4,981	4,547	434	375	51	8	0	0
% of all likely customers	100%	91.3%	8.7%	7.5%	1.0%	0.2%	0.0%	0.0%
Likely Employee	811	452	359	198	101	33	18	9
% of all likely employees	100%	55.7%	44.3%	24.4%	12.5%	4.1%	2.2%	1.1%
All Users	5,792	4,999	793	573	152	41	18	9
% of all users	100%	86.3%	13.7%	9.9%	2.6%	0.7%	0.3%	0.2%

In addition to the reparking analysis, the fixed LPR data from the Estudillo Garage allowed for insight into the parking behavior of users whom utilize the garage. **Table 10** and **11** displays the amount of re-entry observed by user type throughout the day for the weekday and weekend days. Re-entry refers to a vehicle observed to park in the garage for any given time, exits the garage, then re-enters the garage to park at a later time. A total of six likely employees were observed to re-enter the garage on the weekday while only one user did so on the weekend. This analysis indicates that re-entry into Estudillo Garage to avoid parking restrictions is not a concern.

Table 10 – Weekday Estudillo Garage Re-Entry

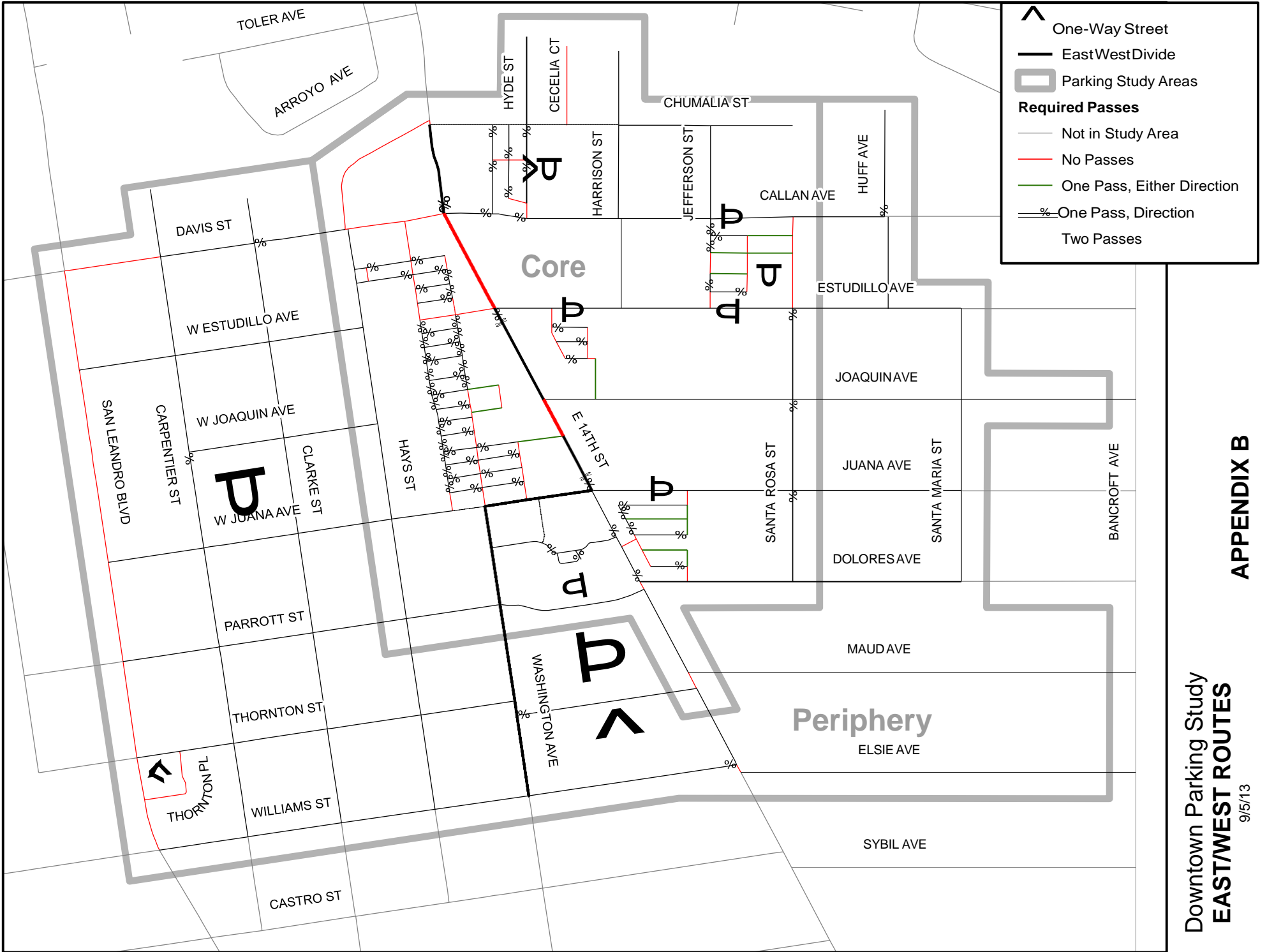
User Type	Total	Parked Once	Re-Entry (Total)	Re-Entry		
				1 time	2 times	3 or more
Likely Customer	612	601	11	10	1	0
% of all likely customers	100%	98.2%	1.8%	1.6%	0.2%	0.0%
Likely Employee	38	32	6	6	0	0
% of all likely employees	100%	84.2%	15.8%	15.8%	0.0%	0.0%
All Users	650	633	17	16	1	0
% of all users	100%	97.4%	2.6%	2.5%	0.2%	0.0%

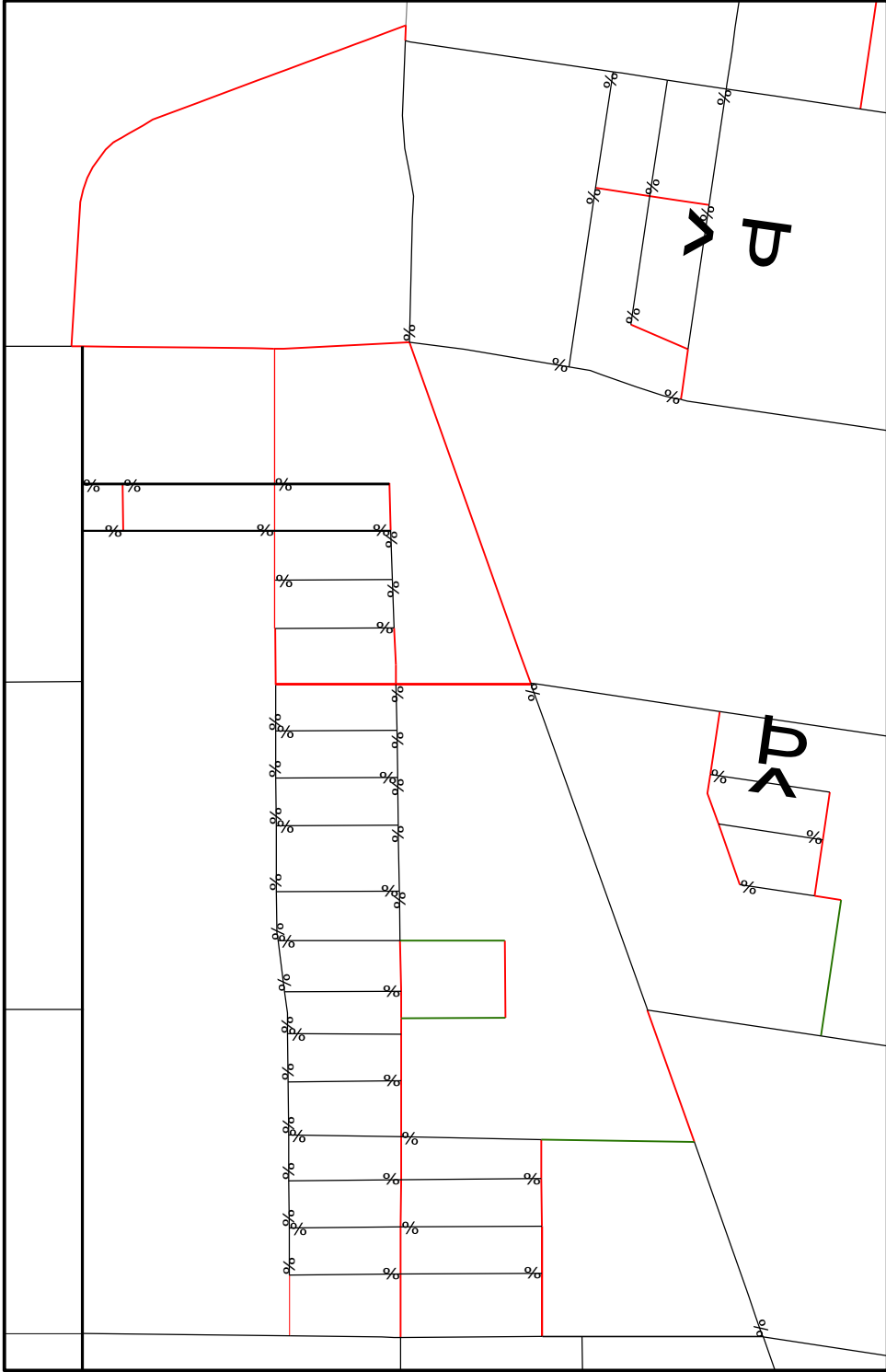
Table 11 – Weekend Estudillo Garage Re-Entry

User Type	Total	Parked Once	Re-Entry (Total)	Re-Entry		
				1 time	2 times	3 or more
Likely Customer	784	768	16	16	0	0
% of all likely customers	100%	98.0%	2.0%	2.0%	0.0%	0.0%
Likely Employee	14	13	1	1	0	0
% of all likely employees	100%	92.9%	7.1%	7.1%	0.0%	0.0%
All Users	798	781	17	17	0	0
% of all users	100%	97.9%	2.1%	2.1%	0.0%	0.0%

DOWNTOWN SAN LEANDRO PARKING DATA ANALYSIS

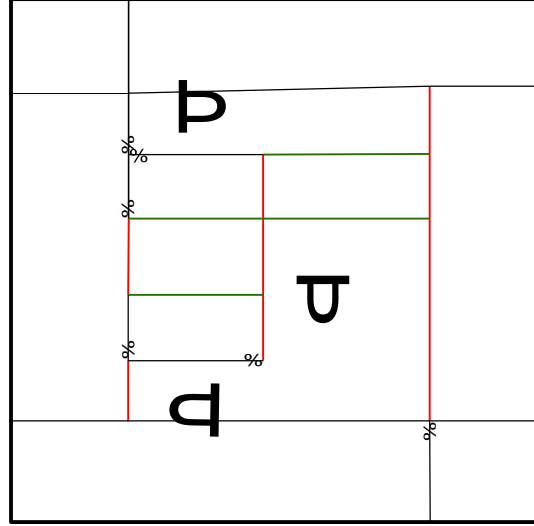




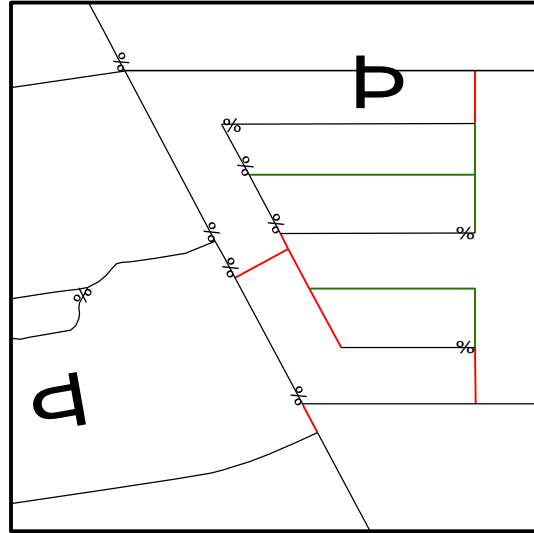


Washington Plaza,
CVS, Best Building

Main Library



Albertson's



APPENDIX B

Downtown Parking Study
PARKING LOT ROUTES

9/5/13

Appendix C – San Leandro Parking Demand Analysis



Memorandum

To: Reh-Lin Chen and Jeff Kay, City of San Leandro

From: Terri O'Connor, David Chew, and Ted Huynh, CDM Smith

Date: August 3, 2015

Subject: Task 2.2 San Leandro Downtown Parking Demand Analysis

This technical memorandum documents and summarizes the demand-based parking model created by CDM Smith for the City of San Leandro, focusing on the primary downtown core commercial district and surrounding areas. The following are discussed in the remainder of the memo as independent subsections:

- Definition of the modeled core demand area;
- Current land uses and the calculated demand-based parking rates based on existing on-street space and off-street public facility occupancies;
- Anticipated future land uses and available parking supply for near-term and long-term future scenarios;
- Summary of the customized shared parking model, based on the Urban Land Institute's Shared Parking Manual, and how the model was calibrated to reflect demand-based conditions in the modeled San Leandro demand area; and
- Projected parking demand for future scenarios.

Demand Model Area

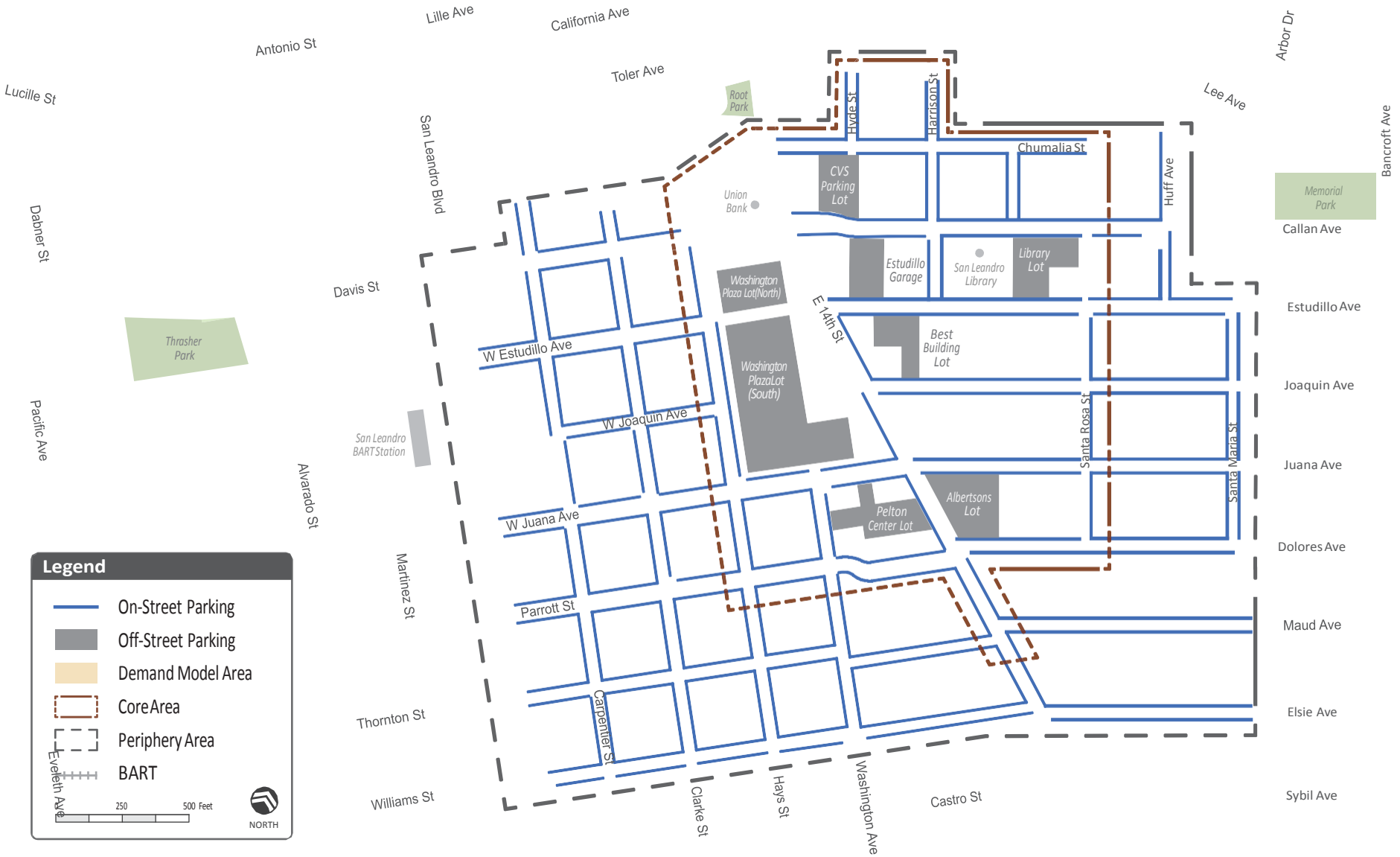
This section describes the study area used for the demand model analysis; the area boundary comprises the land uses that was determined to be the primary area of downtown San Leandro which generated the majority of the parking demand that utilize the available public parking supply. The boundaries for the parking demand model are the same as the ones from the Downtown San Leandro Parking Data Analysis memorandum conducted by CDM Smith from December 2013. This was defined as being located roughly between the San Leandro BART station to the west, San Leandro Creek to the north, Bancroft Avenue to the east, and Elsie Avenue/Williams Street to the south.

Land uses within the study area include the San Leandro Main Library, the Pelton Shopping Center and Washington Plaza, among other retail, restaurant and office land uses. A substantial amount of residential development is also located within the area. The previous Downtown San Leandro

Parking Data Analysis was subdivided into core and periphery parking supply zones. The core is located within the heart of downtown San Leandro and contains mostly metered and time-regulated parking, while the periphery rings the core towards the BART station and is comprised mostly with unregulated parking spaces.

Figure 1 shows the demand model analysis study area in downtown San Leandro, including the core and periphery boundaries.

DOWNTOWN SAN LEANDRO PARKING DEMAND ANALYSIS



Legend

- On-Street Parking
- Off-Street Parking
- Demand Model Area
- Core Area
- Periphery Area
- BART

Scale: 0, 250, 500 Feet

NORTH

Figure 1
Study Area

Existing Land Uses and Parking Occupancies

This section summarizes the current land uses located within the land use analysis area, as well as parking occupancies based on data collection from September 2013.

Land Uses

Table 1 shows the existing land uses as well as the overall square footage estimates corresponding to each respective land use type within the analyzed area located in downtown San Leandro. This information was provided by the City and was based on the most recent and available parcel survey in the downtown. As a note, only land uses in the area that did not have their own available parking supply (i.e. not self-parked) were included in this analysis. All self-parked land uses were presumed to have sufficient parking supply and excluded from the analysis.

Table 1 Existing Downtown San Leandro Land Use Information*

Land Use	Existing Square Footage (sq. ft.)
Retail	200,218
Fine/Casual Dining Restaurant	21,617
Family Restaurant	39,619
Fast Food Restaurant	43,928
Nightclub	2,640
Library	116,388
Health Club	24,048
Church	30,802
Office < 25 KSF ¹	207,736
Medical/Dental Office	79,179
Banks	33,285
Residential (units) ²	500
Total	799,460

*Notes:

1. KSF = 1,000 square feet
2. Land uses not provided in square feet are summarized by the unit provided in parentheses and are not included in the total square footage.

Table 1 above shows that San Leandro currently has approximately 800,000 square feet of utilized retail, restaurant, office, and other space utilized within the bounds of the study area. Approximately 8,588 square feet of additional space was noted as being available or vacant during the study period, resulting in a calculated 1.1 percent vacancy rate. Due to the variation of the local economy and absence of real-time leasing and rental information, the vacancy rate was not assumed to cause a substantial change to the study area in terms of new infill parking demand; as a result, vacant space was omitted from the analysis.

Parking Inventory and Occupancy

As part of the Downtown San Leandro Parking Data Analysis, parking inventory and occupancy counts, including license plate data, were collected during the month of September during one midweek (Tuesday, September 10th, 2013) and one weekend day (Saturday, September 7th, 2013). For the purpose of this analysis, these parking occupancies were analyzed in order to estimate parking demand for the most typical midweek and weekend day. License plate data was utilized to determine other characteristics like the customer/employee parking ratio. **Table 2** provides existing parking inventory within the study area, as well as parking occupancies during the midday peak (around 12 PM) and evening hour (5 PM) parking periods.

Overall, at the time of data collection, the existing downtown parking inventory within the study area comprised a total of 3,203 publicly available parking spaces. This includes all types of spaces, including short-term and handicap spaces, but excludes parking spaces assigned exclusively with a particular land use. The available public parking facilities and on-street parking blockfaces are shown in **Figure 1**.

Table 2 Existing On-Street and Off-Street Parking Inventory and Occupancy

Space Type	Day of Week	Inventory	Midday Peak Hour (12 PM) Occupancy	Evening Hour (5 PM) Occupancy
On-Street	Midweek	1,737	997 (57%)	923 (53%)
	Weekend		835 (48%)	836 (48%)
Off-Street	Midweek	1,466	740 (50%)	636 (43%)
	Weekend		684 (47%)	525 (36%)
Total	Midweek	3,203	1,737 (54%)	1,559 (49%)
	Weekend		1,519 (47%)	1,361 (42%)

The total combined on-street and off-street occupancies at the midday peak hour and evening hour remain relatively consistent. Midweek occupancies were at its highest during the midday peak hour at 55 percent; weekend occupancies also reach its highest peak during the midday peak hour at 48 percent.

Existing parking occupancies vary highly between different off-street lots and on-street parking blockfaces. In general, parking occupancies west of East 14th Street experience higher occupancies than east of East 14th Street on the midweek. Weekend occupancies are relatively consistent across the study area, with higher occupancies at the Pelton Center Lot and areas north of the library; the Pelton Center Lot is the only off-street lot with sustained high occupancies for both midweek and weekend days.

Future Scenarios

This section discusses the assumptions and expected changes in land uses in the downtown demand area of San Leandro. These changes were evaluated on a short-term (pipeline) and longer-

term 10-year future basis, resulting in changes in land use intensities and types as a result of changing assumptions regarding future developments within the City's downtown.

Short-Term (Pipeline) Scenario

The short-term (pipeline) scenario forecasts parking demand in the near future, approximately two to three years from present. This scenario forecasts anticipated development in the study area that is currently or about to be under construction, resulting in changes in land use intensities and the public parking supply.

Anticipated Land Use and Supply Changes

This scenario accounts for three anticipated future developments occurring within downtown San Leandro. These projects include the Marea Alta Apartments, the San Leandro Tech Campus, the opportunity location at the former CVS site, and the Galvin Project.

Marea Alta Apartments

The Marea Alta Apartments replace a 329 space BART parking lot with a mixed-use affordable rental housing development.¹ The BART parking lot is located to the east of the San Leandro BART station along San Leandro Boulevard between Juana Avenue and Joaquin Avenue. The project includes a mixture of affordable housing, senior affordable housing, retail, and a child care facility.

To accommodate its parking demand, the project provides 246 replacement parking spaces for BART users and 162 dedicated parking spaces for the project. Based on the proposed land uses, the project was analyzed individually to determine its impact on existing public parking within downtown San Leandro. Using the parking demand rates developed for this analysis (discussed in further detail in the following sections), the project is anticipated to reach a maximum parking demand of 206 spaces for both midweek and weekend days. Taking into account the project's dedicated parking spaces and the impact to BART parking, for the purpose of this analysis, an estimate of 127 spaces of parking demand is included in the public parking demand; the estimate conservatively assumed all 329 existing BART parking spaces were in use and the new 246 BART parking spaces will also be used at 100 percent occupancy during the peak demand hours. While this estimate is used for the purpose of this analysis, it should be noted that this is a conservative estimate given the project's location adjacent to BART and the inclusion of both affordable and senior units, as these factors are acknowledged to reduce parking demand.

¹ Marea Alta Apartments project. City of San Leandro.
<http://www.sanleandro.org/depts/cd/projects/mareaalta.asp>. Accessed on June 22, 2015.

San Leandro Tech Campus

The San Leandro Tech Campus project is anticipated to bring three six-story office buildings, totaling 500,000 square feet, to a vacant lot located immediately to the west of the San Leandro BART station.²

The project will remove an estimated 96 parking spaces along Martinez Street; these spaces are currently assumed to be used by BART patrons. Once completed, the project will include an on-site multi-story parking structure capable of holding approximately 1,100 publicly available parking spaces, with a portion of those spaces to be reserved for BART users. Applying the same methodology used for the Marea Alta Apartments project, the Tech Campus project was analyzed individually based on its land use to determine its impact on existing public parking within downtown San Leandro. The projected parking demand for the project is anticipated to reach a maximum usage of 601 spaces throughout both midweek and weekend days; this is substantially less than the provided 1,100 on-site parking spaces, even when including BART patron parking. Taking into account the spaces removed along Martinez Street and the anticipated peak parking demand, the project is not anticipated to have an impact to the available public parking supply. It was therefore assumed to be a self-parked project and not included as a contributing project to the parking demand in the near-term pipeline development projections.

The aforementioned project will include a supply of 1,100 publicly available parking spaces as part of its buildout. Since the site will allow the general public to utilize its parking structure, these 1,100 spaces were included as part of the overall public parking supply.

Former CVS Opportunity Site

The opportunity site in downtown San Leandro, located at the former CVS site (1188 East 14th Street), is anticipated to house 90 units of residential and up to approximately 5,000 square feet of retail.³ At present, the site is pending bids for construction by interested developers. City staff has indicated parking for the retail development is not likely to be provided at the site, as on-site parking is not required for retail development under 5,000 square feet. However, the residential units are anticipated to be self-parked based on current zoning code requirements of 1.5 spaces per unit. As a result, the retail component of the project is included in the near-term pipeline scenario as a contributing project to the public parking demand.

Galvin Project

The Galvin project includes the construction of 60 housing units on approximately a half acre lot and is currently going through the approval process. The project is located south of the Pelton

² San Leandro Tech Campus project. City of San Leandro.

<http://www.sanleandro.org/depts/cd/projects/techcampus.asp>. Accessed on June 22, 2015.

³ 1188 14th Street Development Site. <http://oppsites.com/sites/508>. Accessed on June 22, 2015.

Shopping Center at the corner of Washington Avenue and Thornton Street at 1659-1695 Washington Avenue.

As part of the project, parking is proposed to be provided with a total of 75 spaces, for a rate of 1.25 spaces per unit. This is less than the current zoning code requirement of 1.5 spaces per unit. Using the same methodology for the Marea Alta Apartments and Tech Campus project, the Galvin project was also analyzed individually based on its land use to determine its impact on existing public parking within downtown San Leandro. The projected parking demand for the project is anticipated to reach a maximum usage of 62 spaces throughout both midweek and weekend days; this is less than the provided 75 on-site parking spaces. It was therefore assumed to be a self-parked project and not included as a contributing project to the parking demand in the near-term pipeline scenario. The spaces to be provided as part of the project would not be publicly available and as such were not considered to be public supply.

Table 3 summarizes the anticipated land uses under the short-term scenario. As described above, the Marea Alta Apartments, the San Leandro Tech Campus, and the Galvin project were analyzed individually for parking demand due to their ability to provide on-site parking. The land use square footages for these projects are not included in Table 3 below. However, while the San Leandro Tech Campus Project and Galvin Project are expected to provide sufficient on-site parking for its generated demand, the Marea Alta Apartments' generated parking demand is anticipated to extend beyond the provided on-site parking spaces and therefore was added to the short-term scenario.

As mentioned above, the inclusion of the San Leandro Tech Campus will expand the available parking supply in this scenario by 1,100 parking spaces. The remainder of the new supply from the other pipeline developments are reserved for their individual land uses and thus omitted from the inventory.

Table 3 – Short-Term Scenario – Anticipated Downtown San Leandro Land Uses*

Land Use	Existing Square Footage (sq. ft.)
Retail	205,218
Fine/Casual Dining Restaurant	21,617
Family Restaurant	39,619
Fast Food Restaurant	43,928
Nightclub	2,640
Library	116,388
Health Club	24,048
Church	30,802
Office <25 KSF ¹	207,736
Medical/Dental Office	79,179
Banks	33,285
Residential (units) ²	500
Total	804,460

*Notes:

1. KSF = 1,000 square feet
2. Land uses not provided in square feet are summarized by the unit provided in parentheses and are not included in the total square footage.

10-Year Future Scenario

The 10-year scenario forecasts parking demand in the longer-term future, approximately 10 years from now (2025). This scenario forecasts the anticipated annual growth in development within downtown San Leandro.

Anticipated Land Uses and Facility Changes

This scenario accounts for annual growth in development within downtown San Leandro to year 2025. An annual growth rate was determined based on data provided by City staff. Traffic volumes within the city and derived from the Alameda County Transportation Commission (ACTC) traffic model for years 2010 and 2040 were used to calculate an expected annual growth rate of 2.1 percent. This annual growth rate was applied to each land use to determine the anticipated land uses for year 2025, shown in **Table 4**. The pipeline projects from the short-term scenario are also included within the 10-year future scenario; however, they are primarily self-parked projects that would not substantially contribute to the public parking demand.

This scenario does not take into account the implementation of the 2007 Downtown San Leandro Transit-Oriented Development (TOD) Strategy. This planning document, developed by the Community Development Department, seeks strategies to reduce both parking demand and minimum parking requirements in the downtown. The document “establishes a land use framework, a comprehensive circulation system, design and development guidelines, and a series of

implementation actions that will guide new development in downtown San Leandro⁴ in the future, focusing on increasing transit ridership and enhancing the sustainability and livability of the core downtown. The traffic growth rates identified by the ACTC model were assumed to not reflect these type of long-term changes, since the rates are generally high and focus on vehicular traffic increases. By not taking into account the strategies outlined in the planning document, the resulting long-term scenario likely is conservative in parking demand estimation.

No changes in parking supply were assumed to occur between the short-term and this scenario. This means that there is an assumed 1,100 spaces from the San Leandro Tech Campus project included in this scenario as additional parking inventory for public use.

Table 4 – 10-Year Scenario – Anticipated Downtown San Leandro Land Uses*

Land Use	Existing Square Footage (sq. ft.)
Retail	256,928
Fine/Casual Dining Restaurant	27,740
Family Restaurant	50,841
Fast Food Restaurant	56,370
Nightclub	3,388
Library	149,354
Health Club	30,859
Church	39,526
Office <25 KSF ¹	266,576
Medical/Dental Office	101,606
Banks	42,713
Residential (units) ²	642
Total	1,025,901

*Notes:

1. KSF = 1,000 square feet
2. Land uses not provided in square feet are summarized by the unit provided in parentheses and are not included in the total square footage.

Parking Model Development

This section reviews the methodology and assumptions associated with the creation of the demand-based parking model for forecasting parking demand for future scenarios.

Shared Parking Model

A shared parking model was developed for the downtown San Leandro demand area based upon the Urban Land Institute (ULI) spreadsheet model which includes case studies, data collection, and

⁴ Downtown San Leandro Transit-Oriented Development (TOD) Strategy, City of San Leandro, 2007.

other observations regarding multi-land use developments and shared parking alternatives to segregated parking requirements.⁵ Shared parking is used in order to improve efficiencies for parking facilities, particularly due to time of day differences for differing land uses' parking demand. The spreadsheet model uses principles identified in the Shared Parking manual to find the time of day where the cumulative parking demand would be at its peak in order to define the maximum parking demand and thus the proposed parking supply, rather than totaling each land use's parking demand individually, which results in an oversupply of parking and additional costs if parking is built but not needed.

Demand-Based Model Development

The ULI shared parking model was used as the starting point for the parking demand estimation analysis. However, as the City is forecasting potential future scenarios within the downtown area and not creating a new development, existing data including current downtown land uses and parking occupancies instead were used to develop a parking demand-based model. A demand-based model bases estimated parking demand from existing conditions data, which can be used in lieu of ULI default values, which are mainly derived from suburban mixed-use developments and may not suit all types of shared parking developments such as an existing traditional downtown like San Leandro. In addition, existing data from the site itself is accurate and unique to that site along, resulting in demand forecasts that take local conditions and characteristics into account. As a result, a customized demand-based parking spreadsheet model was tailored particularly for San Leandro and its unique split of land uses.

As the model is demand-based, the actual parking supply is not a key input in the model, since demand is assumed to occur independently from supply. Instead, the demand is used to estimate the impact of the demand on the available existing and future parking supply. The Shared Parking manual reports that the "effective parking supply" (also referred to as practical capacity) of a facility is usually in the range of 85 to 95 percent of the total parking supply, since it becomes increasingly more difficult to find parking spaces quickly beyond the effective parking supply. Therefore, the resultant supply needed to meet the effective demand was calculated by dividing the estimated parking demand by the effective parking supply percentage to derive the necessary amount of parking to accommodate that level of parking demand at the desired effective parking supply percentage.

Existing Data Input

The City provided recent parcel data of existing land use square footage estimates to CDM Smith as inputs into the customized shared parking model, in order to derive a baseline expected parking demand. The estimated square footage associated with each land use was incorporated and modified into the demand model using assumptions regarding land use intensity and other factors,

⁵ Shared Parking, 2nd Edition, Urban Land Institute, 2005.

in addition to the customer/employee ratio and parking turnover as determined by data from the parking demand analysis from 2013.

It is important to note that land uses within the defined downtown model area that were self-parked as well as vacancy rates were excluded as inputs into the model. No parking demand associated from these land uses were included because they have sufficient parking at its own parking facilities based on City code, and would not be anticipated to substantially affect parking demand at the public parking lots and on-street parking serving the downtown area. Vacancy rates also were assumed to not be a significant factor to affecting the parking demand profile of downtown San Leandro land uses.

After applying these land uses into the spreadsheet model, the shared parking maximum using default recommended parking ratios (i.e. parking spaces required per unit land use) was then calculated.

Temporal Adjustments and Calibration

The baseline demand determined by the default parking ratio values did not match what was counted under existing conditions within the downtown parking area. This is due to the type of recommended rates for the particular assigned land uses, which do not take into account the unique local conditions associated with downtown San Leandro. Since CDM Smith had already collected parking occupancy counts in September 2013, adjustments were made to the demand model to better fit the projected parking occupancy with actual counts. These adjustments included:

1. Applying and converting the City's existing and anticipated future land use scenarios to model land uses. These land uses were adjusted to correspond and match closely with San Leandro's particular land use mix.
2. Modifying and customizing base land use parking rates, in order to match all modeled land uses with the existing data, to create customized parking demand profiles corresponding to San Leandro land uses. These modifications were made so that the mode's peak hour shared parking demand estimates would be similar to what was collected for existing conditions.
3. Using the parking duration and turnover values calculated and completed for the existing conditions analysis, the customer/employee split was identified and applied to the model. Employee and customer parking rates were evaluated for their cumulative effect on shared parking demand during the peak hours.
4. Calibrating time-of-day factors to adjust for the unique nature of the downtown core in San Leandro. Adjustments were made based on the types of businesses open during different times of day and the demand intensities of those businesses and land uses. In particular, the residential component of the study area has an outsized effect on parking demand within the study area. In order to accurately account for the residential parking impact, a separate

calibration was conducted for residential portions of the study area prior to incorporating that demand rate with the rest of the parking demand model.

Most of the adjustments to the model were made with this step, in order to fine tune the model to match the peak period parking data received in existing conditions. Assumptions such as low mid-afternoon restaurant occupancy and low office visitor demand were largely maintained, while the unique nature of the downtown was accounted for using professional judgment.

It is important to note that these calibrations take into account the adjacent San Leandro BART station and its impact on neighboring on-street parking from commuter spillover parking demand. The occupancy counts used from September 2013 include this potential parking spillover from BART users into the adjacent public parking supply, as discussed in the 2013 Downtown San Leandro Parking Data Analysis memorandum.

Following final calibration of the existing conditions model, the same model and underlying assumptions were applied to future scenarios to determine expected parking demand. These results are reported in the following section.

Parking Model Results

This section reports the results from the demand-based parking model that was developed for the City of San Leandro's downtown demand area based on existing land uses and parking occupancy counts. **Table 5** exhibits the model's results for all scenarios.

Table 5 – Future Scenario Parking Demand Results*

Time of Day	Existing September Counts	Modeled Scenario		
		Existing ¹	Short-Term ²	10-Year
Available Public Parking Supply³				
Midweek – Midday Peak	3,203	3,203	4,303	4,303
Weekend – Midday Peak	3,203	3,203	4,303	4,303
Peak Parking Demand Scenarios				
Midweek Midday	1,735 (54%)	1,778 (56%)	1,912 (44%)	2,283 (53%)
Midweek Evening	1,559 (49%)	1,598 (50%)	1,732 (40%)	2,050 (48%)
Weekend Midday	1,519 (47%)	1,541 (48%)	1,675 (39%)	1,975 (46%)
Weekend Evening	1,361 (42%)	1,387 (43%)	1,521 (35%)	1,780 (41%)
Peak Parking Supply Required to Achieve 85% Occupancy⁴				
Midweek Midday/Evening	-	-	4,303	4,303
<i>Additional Parking Supply Needed During Midweek Midday/Evening</i>	-	-	0	0
Weekend Midday/Evening	-	-	4,303	4,303
<i>Additional Parking Supply Needed During Weekend Midday/Evening</i>	-	-	0	0

*Note:

- Existing scenario parking demand results are derived from the parking demand model; these values differ slightly from the actual occupancies counted since the model outputs do not exactly match actual counts.
- The 126 additional parking demand for the Marea Alta Apartments is included in the short-term pipeline scenario.
- The additional supply for short-term and 10-year future scenarios is a result of the construction of the San Leandro Tech Campus's new parking structure which provides an estimated 1,100 new publically available parking spaces.
- Parking supply shown in these scenarios indicates that no time of day would have peak parking demand that exceeds 85% of the available parking supply.

Peak Parking Demand Scenarios

Based on Table 5, with the additional 1,100 spaces in parking supply from the San Leandro Tech Campus in the downtown area, no future scenario would experience parking demand surpassing the available downtown effective parking supply (practical capacity). These scenarios include:

- Short-term (pipeline) scenario: Parking demand is projected to reach a maximum of 44 percent occupancy during the midweek midday.
- 10-Year (long-term) scenario: Parking demand is projected to reach a maximum of 53 percent occupancy during the midweek midday.

Based on the table above and data provided by the City, the short-term future scenario is expected to have lower parking demand occupancies by percentage occupied than when compared with

existing conditions. This decrease is largely due to the addition of the San Leandro Tech Campus's new parking supply. While the Marea Alta Apartments, the San Leandro Tech Campus, and Galvin projects are being added in the short-term scenario as pipeline developments, they were regarded as being self-parked projects; as such, most of that new parking demand is self-contained within the individual land uses' parking supply.

The 10-year long-term scenario includes overall projected growth in all land use square footage along with the additional supply from the San Leandro Tech Campus's new parking structure. With the projected growth and increase in supply, parking occupancy rates are expected to be slightly less than existing conditions.

Effective Parking Supply

A parking facility or system is often perceived as full when it has not yet reached its capacity. This is usually in the range of 85 to 95 percent occupancy. Effective parking supply (practical capacity) is the number of occupied spaces at optimum operating efficiency. This range has to do with the familiarity of users with all the details of the parking system, (i.e. what spaces are likely to be available at a certain time of day and thus a lower cushion) versus a parking system that serves more unfamiliar users. A small supply cushion would be appropriate during the anticipated system peaks to help reduce search time during the peak. It also provides additional cover for operating and seasonal fluctuations in occupancy.

Future short-term and long-term parking occupancies are anticipated to remain below practical capacity for both midweek and weekend days at the midday peak hour and evening hour for downtown San Leandro. This indicates existing supply is and would continue to be sufficient for short-term and long-term future development.

SHARED PARKING DEMAND SUMMARY

PEAK MONTH: SEPTEMBER -- PEAK PERIOD: 12 PM, WEEKDAY

Land Use	Project Data Quantity Unit		Midweek					Weekend					Midweek			Weekend		
			Base Rate	Mode Adj	Non-Captive Ratio	Project Rate	Unit	Base Rate	Mode Adj	Non-Captive Ratio	Project Rate	Unit	Peak Hr Adj	Peak Mo Adj	Estimated Parking Demand	Peak Hr Adj	Peak Mo Adj	Estimated Parking Demand
													12 PM	September		1 PM	September	
Community Shopping Center (<400 ksf) Employee	200,218	sf GLA	2.18	1.00	1.00	2.18	/ksf GLA	2.08	1.00	1.00	2.08	/ksf GLA	0.87	0.64	241	0.84	0.64	221
Fine/Casual Dining Restaurant Employee	21,617	sf GLA	7.63	1.00	1.00	7.63	/ksf GLA	0.36	1.00	1.00	0.36	/ksf GLA	0.92	0.80	41	0.95	0.80	55
Family Restaurant Employee	39,619	sf GLA	4.95	1.00	1.00	4.95	/ksf GLA	5.95	1.00	1.00	5.95	/ksf GLA	0.67	0.91	101	0.69	0.91	81
Fast Food Restaurant Employee	43,928	sf GLA	5.74	1.00	1.00	5.74	/ksf GLA	2.25	1.00	1.00	2.25	/ksf GLA	0.92	1.00	41	0.72	1.00	35
Nightclub Employee	2,640	sf GLA	7.63	1.00	1.00	7.63	/ksf GLA	5.10	1.00	1.00	5.10	/ksf GLA	0.92	0.91	164	0.81	0.91	148
Library Employee	116,388	sf GLA	1.20	1.00	1.00	1.20	/ksf GLA	1.80	1.00	1.00	1.80	/ksf GLA	0.92	1.00	44	0.85	1.00	60
Church Employee	30,802	sf GLA	5.74	1.00	1.00	5.74	/ksf GLA	3.60	1.00	1.00	3.60	/ksf GLA	0.92	0.91	211	0.90	0.91	129
Residential, Rental, Shared Spaces Reserved Guest	500 500	units sp/unit units	1.58	1.00	1.00	1.58	/ksf GLA	1.40	1.00	1.00	1.40	/ksf GLA	0.92	1.00	63	0.95	1.00	58
Health Club Employee	24,048	sf GLA	7.63	1.00	1.00	7.63	/ksf GLA	6.13	1.00	1.00	6.13	/ksf GLA	0.00	0.92	0	0.00	0.92	0
Office Employee	207,736	sf GLA	0.44	1.00	1.00	0.44	/ksf GLA	1.00	1.00	1.00	1.00	/ksf GLA	0.00	1.00	0	0.07	1.00	0
Medical/Dental Office Employee	79,179	sf GLA	0.75	1.00	1.00	0.75	/ksf GLA	0.84	1.00	1.00	0.84	/ksf GLA	0.67	1.00	58	0.81	1.00	79
Bank (Branch) with Drive-In Employee	33,285	sf GLA	0.18	1.00	1.00	0.18	/ksf GLA	0.26	1.00	1.00	0.26	/ksf GLA	0.82	1.00	16	0.81	1.00	25
Office Employee	207,736	sf GLA	3.30	1.00	1.00	3.30	/ksf GLA	1.93	1.00	1.00	1.93	/ksf GLA	0.46	0.80	29	0.80	0.80	29
Medical/Dental Office Employee	79,179	sf GLA	0.12	1.00	1.00	0.12	/ksf GLA	0.20	1.00	1.00	0.20	/ksf GLA	0.67	0.90	2	0.97	0.90	4
Bank (Branch) with Drive-In Employee	33,285	sf GLA	1.93	1.00	1.00	1.93	/ksf GLA	2.20	1.00	1.00	2.20	/ksf GLA	0.67	0.80	32	0.93	0.80	51
Residential, Rental, Shared Spaces Reserved Guest	500 500	units sp/unit units	0.18	1.00	1.00	0.18	/ksf GLA	1.00	1.00	1.00	1.00	/ksf GLA	0.77	0.90	3	0.93	0.90	26
Office Employee	207,736	sf GLA	1.50	1.00	1.00	1.50	/unit	1.50	1.00	1.00	1.50	/unit	0.51	1.00	379	0.64	1.00	482
Medical/Dental Office Employee	79,179	sf GLA	0	1.00	1.00	0	/unit	0	1.00	1.00	0	/unit	0.92	1.00	0	0.97	1.00	0
Bank (Branch) with Drive-In Employee	33,285	sf GLA	0	1.00	1.00	0	/unit	0	1.00	1.00	0	/unit	0.05	1.00	4	0.13	1.00	10
Office Employee	207,736	sf GLA	0.11	1.00	1.00	0.11	/ksf GLA	0.01	1.00	1.00	0.01	/ksf GLA	0.37	1.00	8	0.25	1.00	1
Medical/Dental Office Employee	79,179	sf GLA	1.23	1.00	1.00	1.23	/ksf GLA	0.11	1.00	1.00	0.11	/ksf GLA	0.82	1.00	208	0.25	1.00	6
Bank (Branch) with Drive-In Employee	33,285	sf GLA	1.35	1.00	1.00	1.35	/ksf GLA	1.20	1.00	1.00	1.20	/ksf GLA	0.67	1.00	72	0.25	1.00	24
Bank (Branch) with Drive-In Employee	33,285	sf GLA	0.38	1.00	1.00	0.38	/ksf GLA	0.30	1.00	1.00	0.30	/ksf GLA	0.92	1.00	28	0.25	1.00	6
Bank (Branch) with Drive-In Employee	33,285	sf GLA	1.35	1.00	1.00	1.35	/ksf GLA	1.20	1.00	1.00	1.20	/ksf GLA	0.47	1.00	21	0.20	1.00	8
Bank (Branch) with Drive-In Employee	33,285	sf GLA	0.40	1.00	1.00	0.40	/ksf GLA	0.32	1.00	1.00	0.32	/ksf GLA	0.92	1.00	12	0.23	1.00	3
ULI base data have been modified from default values.												Customer	941	Customer	781			
												Employee	837	Employee	760			
												Reserved	0	Reserved	0			
												Total	1778	Total	1541			

Table
 Project: San Leandro Parking Management Plan
 Description: Short-Term (Pipeline)

7/16/2015

SHARED PARKING DEMAND SUMMARY

PEAK MONTH: SEPTEMBER -- PEAK PERIOD: 12 PM, WEEKDAY

Land Use	Project Data Quantity Unit		Midweek					Weekend					Midweek			Weekend		
			Base Rate	Mode Adj	Non-Captive Ratio	Project Rate	Unit	Base Rate	Mode Adj	Non-Captive Ratio	Project Rate	Unit	Peak Hr Adj	Peak Mo Adj	Estimated Parking Demand	Peak Hr Adj	Peak Mo Adj	Estimated Parking Demand
													12 PM	September		1 PM	September	
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Fine/Casual Dining Restaurant Employee	21,617	sf GLA	7.63	1.00	1.00	7.63	/ksf GLA	5.95	1.00	1.00	5.95	/ksf GLA	0.92	0.80	42	0.95	0.80	56
Family Restaurant Employee	39,619	sf GLA	2.06	1.00	1.00	2.06	/ksf GLA	2.25	1.00	1.00	2.25	/ksf GLA	0.67	0.91	101	0.69	0.91	81
Fast Food Restaurant Employee	43,928	sf GLA	4.95	1.00	1.00	4.95	/ksf GLA	2.25	1.00	1.00	2.25	/ksf GLA	0.92	1.00	41	0.72	1.00	35
Nightclub Employee	2,640	sf GLA	1.20	1.00	1.00	1.20	/ksf GLA	5.10	1.00	1.00	5.10	/ksf GLA	0.92	0.91	164	0.81	0.91	148
Library Employee	116,388	sf GLA	5.74	1.00	1.00	5.74	/ksf GLA	1.80	1.00	1.00	1.80	/ksf GLA	0.92	1.00	44	0.85	1.00	60
Health Club Employee	24,048	sf GLA	1.58	1.00	1.00	1.58	/ksf GLA	3.60	1.00	1.00	3.60	/ksf GLA	0.92	0.91	211	0.90	0.91	129
Church Employee	30,802	sf GLA	6.13	1.00	1.00	6.13	/ksf GLA	1.40	1.00	1.00	1.40	/ksf GLA	0.92	1.00	63	0.95	1.00	58
Residential, Rental, Shared Spaces Reserved Guest	500 500	units sp/unit units	0.44	1.00	1.00	0.44	/ksf GLA	1.00	1.00	1.00	1.00	/ksf GLA	0.00	0.92	0	0.00	0.92	0
Office Employee	207,736	sf GLA	0.75	1.00	1.00	0.75	/ksf GLA	0.84	1.00	1.00	0.84	/ksf GLA	0.67	1.00	58	0.81	1.00	79
Medical/Dental Office Employee	79,179	sf GLA	0.18	1.00	1.00	0.18	/ksf GLA	0.26	1.00	1.00	0.26	/ksf GLA	0.82	1.00	16	0.81	1.00	25
Bank (Branch) with Drive-In Employee	33,285	sf GLA	3.30	1.00	1.00	3.30	/ksf GLA	1.93	1.00	1.00	1.93	/ksf GLA	0.46	0.80	29	0.80	0.80	29
			0.12	1.00	1.00	0.12	/ksf GLA	0.20	1.00	1.00	0.20	/ksf GLA	0.67	0.90	2	0.97	0.90	4
			1.93	1.00	1.00	1.93	/ksf GLA	2.20	1.00	1.00	2.20	/ksf GLA	0.67	0.80	32	0.93	0.80	51
			0.18	1.00	1.00	0.18	/ksf GLA	1.00	1.00	1.00	1.00	/ksf GLA	0.77	0.90	3	0.93	0.90	26
			1.50	1.00	1.00	1.50	/unit	1.50	1.00	1.00	1.50	/unit	0.51	1.00	379	0.64	1.00	482
			0	1.00	1.00	0	/unit	0	1.00	1.00	0	/unit	0.92	1.00	0	0.97	1.00	0
			0	1.00	1.00	0	/unit	0	1.00	1.00	0	/unit	0.05	1.00	4	0.13	1.00	10
			0.11	1.00	1.00	0.11	/ksf GLA	0.01	1.00	1.00	0.01	/ksf GLA	0.37	1.00	8	0.25	1.00	1
			1.23	1.00	1.00	1.23	/ksf GLA	0.11	1.00	1.00	0.11	/ksf GLA	0.82	1.00	208	0.25	1.00	6
			1.35	1.00	1.00	1.35	/ksf GLA	1.20	1.00	1.00	1.20	/ksf GLA	0.67	1.00	72	0.25	1.00	24
			0.38	1.00	1.00	0.38	/ksf GLA	0.30	1.00	1.00	0.30	/ksf GLA	0.92	1.00	28	0.25	1.00	6
			1.35	1.00	1.00	1.35	/ksf GLA	1.20	1.00	1.00	1.20	/ksf GLA	0.47	1.00	21	0.20	1.00	8
			0.40	1.00	1.00	0.40	/ksf GLA	0.32	1.00	1.00	0.32	/ksf GLA	0.92	1.00	12	0.23	1.00	3
ULI base data have been modified from default values.												Customer	947	Customer	787			
												Employee	838	Employee	761			
												Reserved	0	Reserved	0			
												Total	1785	Total	1548			

Table
 Project: San Leandro Parking Management Plan
 Description: Long-Term

7/16/2015

SHARED PARKING DEMAND SUMMARY

PEAK MONTH: SEPTEMBER -- PEAK PERIOD: 12 PM, WEEKDAY

Land Use	Project Data Quantity Unit		Midweek					Weekend					Midweek			Weekend		
			Base Rate	Mode Adj	Non-Captive Ratio	Project Rate	Unit	Base Rate	Mode Adj	Non-Captive Ratio	Project Rate	Unit	Peak Hr Adj	Peak Mo Adj	Estimated Parking Demand	Peak Hr Adj	Peak Mo Adj	Estimated Parking Demand
													12 PM	September		1 PM	September	
Community Shopping Center (<400 ksf) Employee	256,928	sf GLA	2.18	1.00	1.00	2.18	/ksf GLA	2.08	1.00	1.00	2.08	/ksf GLA	0.87	0.64	309	0.84	0.64	284
Fine/Casual Dining Restaurant Employee	27,740	sf GLA	7.63	1.00	1.00	7.63	/ksf GLA	5.95	1.00	1.00	5.95	/ksf GLA	0.92	0.80	53	0.95	0.80	70
Family Restaurant Employee	50,841	sf GLA	4.95	1.00	1.00	4.95	/ksf GLA	2.25	1.00	1.00	2.25	/ksf GLA	0.67	0.91	129	0.69	0.91	103
Fast Food Restaurant Employee	56,370	sf GLA	5.74	1.00	1.00	5.74	/ksf GLA	2.25	1.00	1.00	2.25	/ksf GLA	0.92	1.00	52	0.72	1.00	45
Nightclub Employee	3,388	sf GLA	4.95	1.00	1.00	4.95	/ksf GLA	5.10	1.00	1.00	5.10	/ksf GLA	0.92	0.91	211	0.81	0.91	190
Library Employee	149,354	sf GLA	1.20	1.00	1.00	1.20	/ksf GLA	1.80	1.00	1.00	1.80	/ksf GLA	0.92	1.00	56	0.85	1.00	78
Church Employee	39,526	sf GLA	5.74	1.00	1.00	5.74	/ksf GLA	3.60	1.00	1.00	3.60	/ksf GLA	0.92	0.91	270	0.90	0.91	166
Residential, Rental, Shared Spaces Reserved Guest	642 642	units sp/unit units	1.58	1.00	1.00	1.58	/ksf GLA	1.40	1.00	1.00	1.40	/ksf GLA	0.92	1.00	82	0.95	1.00	75
Health Club Employee	30,859	sf GLA	7.63	1.00	1.00	7.63	/ksf GLA	6.13	1.00	1.00	6.13	/ksf GLA	0.00	0.92	0	0.00	0.92	0
Office Employee	266,576	sf GLA	0.44	1.00	1.00	0.44	/ksf GLA	1.00	1.00	1.00	1.00	/ksf GLA	0.00	1.00	0	0.07	1.00	0
Medical/Dental Office Employee	101,606	sf GLA	0.75	1.00	1.00	0.75	/ksf GLA	0.84	1.00	1.00	0.84	/ksf GLA	0.67	1.00	75	0.81	1.00	101
Bank (Branch) with Drive-In Employee	42,713	sf GLA	0.18	1.00	1.00	0.18	/ksf GLA	0.26	1.00	1.00	0.26	/ksf GLA	0.82	1.00	21	0.81	1.00	32
Office Employee	266,576	sf GLA	3.30	1.00	1.00	3.30	/ksf GLA	1.93	1.00	1.00	1.93	/ksf GLA	0.46	0.80	38	0.80	0.80	38
Medical/Dental Office Employee	101,606	sf GLA	0.12	1.00	1.00	0.12	/ksf GLA	0.20	1.00	1.00	0.20	/ksf GLA	0.67	0.90	2	0.97	0.90	5
Bank (Branch) with Drive-In Employee	42,713	sf GLA	1.93	1.00	1.00	1.93	/ksf GLA	2.20	1.00	1.00	2.20	/ksf GLA	0.67	0.80	41	0.93	0.80	65
Residential, Rental, Shared Spaces Reserved Guest	642 642	units sp/unit units	0.18	1.00	1.00	0.18	/ksf GLA	1.00	1.00	1.00	1.00	/ksf GLA	0.77	0.90	5	0.93	0.90	33
Office Employee	266,576	sf GLA	1.50	1.00	1.00	1.50	/unit	1.50	1.00	1.00	1.50	/unit	0.51	1.00	486	0.64	1.00	618
Medical/Dental Office Employee	101,606	sf GLA	0	1.00	1.00	0	/unit	0	1.00	1.00	0	/unit	0.92	1.00	0	0.97	1.00	0
Bank (Branch) with Drive-In Employee	42,713	sf GLA	0	1.00	1.00	0	/unit	0	1.00	1.00	0	/unit	0.05	1.00	5	0.13	1.00	12
Office Employee	266,576	sf GLA	0.11	1.00	1.00	0.11	/ksf GLA	0.01	1.00	1.00	0.01	/ksf GLA	0.37	1.00	10	0.25	1.00	1
Medical/Dental Office Employee	101,606	sf GLA	1.23	1.00	1.00	1.23	/ksf GLA	0.11	1.00	1.00	0.11	/ksf GLA	0.82	1.00	268	0.25	1.00	7
Bank (Branch) with Drive-In Employee	42,713	sf GLA	1.35	1.00	1.00	1.35	/ksf GLA	1.20	1.00	1.00	1.20	/ksf GLA	0.67	1.00	92	0.25	1.00	31
Bank (Branch) with Drive-In Employee	42,713	sf GLA	0.38	1.00	1.00	0.38	/ksf GLA	0.30	1.00	1.00	0.30	/ksf GLA	0.92	1.00	35	0.25	1.00	8
Bank (Branch) with Drive-In Employee	42,713	sf GLA	1.35	1.00	1.00	1.35	/ksf GLA	1.20	1.00	1.00	1.20	/ksf GLA	0.47	1.00	27	0.20	1.00	10
Bank (Branch) with Drive-In Employee	42,713	sf GLA	0.40	1.00	1.00	0.40	/ksf GLA	0.32	1.00	1.00	0.32	/ksf GLA	0.92	1.00	16	0.23	1.00	3
ULI base data have been modified from default values.													Customer	1207	Customer	1001		
													Employee	1076	Employee	974		
													Reserved	0	Reserved	0		
													Total	2283	Total	1975		

Appendix D – Proforma and Financial Analysis Tables

Appendix D - 10 Year Proforma Detailed Calculations

Transactions	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Year 7	Year 8	Year 9	Year 10
Estimated # Transactions/yr	103,544	105,356	107,200	109,076	110,985	112,927	114,903	116,914	118,960	121,042
Estimated revenue for mobile payment company	\$ 2,589	\$ 3,793	\$ 5,038	\$ 6,326	\$ 7,658	\$ 9,034	\$ 10,456	\$ 11,925	\$ 13,442	\$ 15,130
Revenue										
Mobile Payment - % of overall users	10%	14%	19%	23%	28%	32%	36%	41%	45%	50%
On-Street Meter \$/hour (proposed) - Constant - Mobile Payment (net for City)	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00	\$ 1.00
On-Street Meter \$/hour (proposed) - Constant - Credit Card Payment (net for City)	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96	\$ 0.96
On-Street Meter Revenue - Constant Rate	\$ 501,194	\$ 502,110	\$ 503,025	\$ 503,940	\$ 504,855	\$ 505,770	\$ 506,685	\$ 507,600	\$ 508,515	\$ 509,513
On-Street Meter \$/hour (proposed) - Escalated - Mobile Payment (net for City)	\$ 1.00	\$ 1.00	\$ 1.25	\$ 1.25	\$ 1.50	\$ 1.50	\$ 1.75	\$ 1.75	\$ 2.00	\$ 2.00
On-Street Meter \$/hour (proposed) - Escalated - Credit Card Payment (net for City)	\$ 0.96	\$ 0.96	\$ 1.20	\$ 1.20	\$ 1.44	\$ 1.44	\$ 1.68	\$ 1.68	\$ 1.92	\$ 1.92
On-Street Meter Revenue - Escalated Rate	\$ 501,194	\$ 502,110	\$ 628,781	\$ 629,925	\$ 757,282	\$ 758,655	\$ 886,698	\$ 888,300	\$ 1,017,030	\$ 1,019,026
Off-Street Lots - Quantity of spots used daily	62	62	62	62	62	62	62	62	62	62
Off-Street Lots - Revenue (MSMs, Mobile Payment)	\$ 166,874	\$ 166,874	\$ 208,593	\$ 208,593	\$ 250,312	\$ 250,312	\$ 292,030	\$ 292,030	\$ 333,749	\$ 333,749
Estudillo - Reserve Permits - Quantity	94	106	118	130	142	154	166	178	190	200
Estudillo - Reserve Permits - Constant Rate	\$ 70	\$ 70	\$ 70	\$ 70	\$ 70	\$ 70	\$ 70	\$ 70	\$ 70	\$ 70
Estudillo - Reserve Permits - Constant Rate - Revenue	\$ 78,960	\$ 89,040	\$ 99,120	\$ 109,200	\$ 119,280	\$ 129,360	\$ 139,440	\$ 149,520	\$ 159,600	\$ 168,000
Estudillo - Reserve Permits - ESCALATED Rate	\$ 70	\$ 72	\$ 75	\$ 78	\$ 81	\$ 84	\$ 87	\$ 90	\$ 93	\$ 96
Estudillo - Reserve Permits - Escalated Rate - Revenue	\$ 78,960	\$ 91,584	\$ 106,200	\$ 121,680	\$ 138,024	\$ 155,232	\$ 173,304	\$ 192,240	\$ 212,040	\$ 230,400
Estudillo - General Access Permits - Quantity	19	17	15	13	11	9	7	5	3	-
Estudillo - General Access Permits - Revenue	\$ 10,260	\$ 9,180	\$ 8,100	\$ 7,020	\$ 5,940	\$ 4,860	\$ 3,780	\$ 2,700	\$ 1,620	\$ -
Estudillo - Free Permits - Quantity	-	44	88	132	176	220	264	308	352	400
Estudillo - Free Permits - Revenue	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Estudillo - Quantity of spots used daily	73	70	67	64	61	58	55	52	49	46
Estudillo - Escalated Rate	\$ 0.50	\$ 0.52	\$ 0.54	\$ 0.56	\$ 0.58	\$ 0.60	\$ 0.62	\$ 0.64	\$ 0.66	\$ 0.68
Estudillo - Revenue (\$0.50/hr, Mobile Payment % follows row 43)	\$ 94,666	\$ 94,551	\$ 94,121	\$ 93,373	\$ 92,306	\$ 90,918	\$ 89,208	\$ 87,174	\$ 84,814	\$ 83,043
RPP - Number of permits per year	200	250	300	350	400	450	500	550	600	650
RPP - Price per year	25	26	27	28	29	30	31	32	33	34
RPP - Revenue	\$ 5,000	\$ 6,469	\$ 8,034	\$ 9,701	\$ 11,475	\$ 13,361	\$ 15,366	\$ 17,494	\$ 19,752	\$ 22,147
Citations	\$ 135,000	\$ 162,000	\$ 194,400	\$ 233,280	\$ 279,936	\$ 335,923	\$ 403,108	\$ 483,729	\$ 580,475	\$ 696,570
Total Revenue w/o Citations w/ Constant Meter Rates w/ Constant Permit Rates	\$ 856,955	\$ 868,224	\$ 920,992	\$ 931,827	\$ 984,167	\$ 994,581	\$ 1,046,509	\$ 1,056,518	\$ 1,108,050	\$ 1,116,452
Total Revenue w/o Citations w/ Escalated Meter Rates w/ Escalated Permit Rates	\$ 856,955	\$ 870,768	\$ 1,053,828	\$ 1,070,292	\$ 1,255,339	\$ 1,273,338	\$ 1,460,387	\$ 1,479,938	\$ 1,669,005	\$ 1,688,365
Total Revenue w/ Citations w/ Constant Meter Rates w/ Constant Permit Rates	\$ 991,955	\$ 1,030,224	\$ 1,115,392	\$ 1,165,107	\$ 1,264,103	\$ 1,330,504	\$ 1,449,617	\$ 1,540,248	\$ 1,688,525	\$ 1,813,022
Total Revenue w/ Citations w/ Escalated Meter Rates w/ Escalated Permit Rates	\$ 991,955	\$ 1,032,768	\$ 1,248,228	\$ 1,303,572	\$ 1,535,275	\$ 1,609,261	\$ 1,863,494	\$ 1,963,667	\$ 2,249,480	\$ 2,384,935
Costs for All Alternatives										
Capital Costs - PDAs	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333	\$ 1,333
Capital Costs - Signs	\$ 5,000	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Capital Costs - MSMs in off-street lots	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000	\$ 12,000
Capital Costs - MSMs in Estudillo	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400	\$ 2,400
Permits - Quantity	113	167	221	275	329	383	437	491	545	600
Permits - Cost	\$ 1,356	\$ 2,004	\$ 2,652	\$ 3,300	\$ 3,948	\$ 4,596	\$ 5,244	\$ 5,892	\$ 6,540	\$ 7,200
Third-party Parking Manager	\$ 108,000	\$ 111,780	\$ 115,692	\$ 119,742	\$ 123,932	\$ 128,270	\$ 132,760	\$ 137,406	\$ 142,215	\$ 147,193
City Labor	\$ 642,351	\$ 664,833	\$ 688,103	\$ 712,186	\$ 737,113	\$ 762,912	\$ 789,613	\$ 817,250	\$ 845,854	\$ 875,459
City Labor - Addl Parking Aide - Quantity	-	-	0.50	0.50	0.75	0.75	1.00	1.00	1.00	1.00
City Labor - Addl Parking Aide	\$ -	\$ -	\$ 52,901	\$ 54,752	\$ 85,003	\$ 87,978	\$ 121,410	\$ 125,659	\$ 130,057	\$ 134,609
TOTAL Costs for All Alternatives	\$ 772,440	\$ 794,351	\$ 875,081	\$ 905,713	\$ 965,729	\$ 999,489	\$ 1,064,760	\$ 1,101,940	\$ 1,140,399	\$ 1,180,194
Alternative 1 - Smart Meters - Costs										
Number of Meters	344									
Average Cost per Unit	\$ 500.00									
Estimated Lifespan (years)	10									
Capital Equipment (Smart Meters)	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200	\$ 17,200
Total Cost for On-Street Smart Meters (incl. capital costs, permits, and labor)	\$ 789,640	\$ 811,551	\$ 892,281	\$ 922,913	\$ 982,929	\$ 1,016,689	\$ 1,081,960	\$ 1,119,140	\$ 1,157,599	\$ 1,197,394
On-Street Smart Meters - Net Revenue w/o Citations w/ Constant Meter Rates w/ Constant Permit Rates	\$ 67,314	\$ 56,673	\$ 28,711	\$ 8,913	\$ 1,238	\$ (22,108)	\$ (35,451)	\$ (62,622)	\$ (49,549)	\$ (80,942)
On-Street Smart Meters - Net Revenue w/o Citations w/ Escalated Meter Rates w/ Escalated Permit Rates	\$ 67,314	\$ 59,217	\$ 161,548	\$ 147,378	\$ 272,409	\$ 256,649	\$ 378,427	\$ 360,798	\$ 511,406	\$ 490,971
On-Street Smart Meters - Net Revenue w/ Citations w/ Constant Meter Rates w/ Constant Permit Rates	\$ 202,314	\$ 218,673	\$ 223,111	\$ 242,193	\$ 281,174	\$ 313,815	\$ 367,657	\$ 421,107	\$ 530,926	\$ 615,628
On-Street Smart Meters - Net Revenue w/ Citations w/ Escalated Meter Rates w/ Escalated Permit Rates	\$ 202,314	\$ 221,217	\$ 355,948	\$ 380,658	\$ 552,345	\$ 592,572	\$ 781,535	\$ 844,527	\$ 1,091,881	\$ 1,187,541
Alternative 2 - Multispace Meters - Costs										
Spaces per Multispace Meter	8									
Number of Meters	43									
Cost per Unit	\$ 12,000.00									
Estimated Lifespan (years)	10									
Capital Equipment (Multispace Meters)	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600	\$ 51,600
Total Cost for On-Street Multispace Meters (incl. capital costs, permits, and labor)	\$ 824,040	\$ 845,951	\$ 926,681	\$ 957,313	\$ 1,017,329	\$ 1,051,089	\$ 1,116,360	\$ 1,153,540	\$ 1,191,999	\$ 1,231,794
On-Street Multispace Meters - Net Revenue w/o Citations w/ Constant Meter Rates w/ Constant Permit Rates	\$ 32,914	\$ 22,273	\$ (5,689)	\$ (25,487)	\$ (33,162)	\$ (56,508)	\$ (69,851)	\$ (97,022)	\$ (83,949)	\$ (115,342)
On-Street Multispace Meters - Net Revenue w/o Citations w/ Escalated Meter Rates w/ Escalated Permit Rates	\$ 32,914	\$ 24,817	\$ 127,148	\$ 112,978	\$ 238,009	\$ 222,249	\$ 344,027	\$ 326,398	\$ 477,006	\$ 456,571
On-Street Multispace Meters - Net Revenue w/ Citations w/ Constant Meter Rates w/ Constant Permit Rates	\$ 167,914	\$ 184,273	\$ 188,711	\$ 207,793	\$ 246,774	\$ 279,415	\$ 333,257	\$ 386,707	\$ 496,526	\$ 581,228
On-Street Multispace Meters - Net Revenue w/ Citations w/ Escalated Meter Rates w/ Escalated Permit Rates	\$ 167,914	\$ 186,817	\$ 321,548	\$ 346,258	\$ 517,945	\$ 558,172	\$ 747,135	\$ 810,127	\$ 1,057,481	\$ 1,153,141

Equipment Assumptions	Number of Units	Cost per unit	Lifespan (years)
Enforcement PDA	2	\$ 2,000.00	3
Signs	1	\$ 5,000.00	0

Background, Cost, and Revenue Assumptions	
Short-Term Spaces - Total Metered	344
Estimated transactions per day	344
On-Street Parking Rates (Proposed) - Mobile Payment	\$ 1.00
On-Street Parking Rates (Proposed) - Credit Card Payment	\$ 0.96
Revenue Hours/Day	9
WEEKDAY Revenue Days/Year	249
WEEKDAY Average Daily Occupancy	57%
WEEKEND Revenue Days/Year	52
WEEKEND Average Daily Occupancy	50%
Annual Consumer Price Index	3.5%
Permits - Price of Reserve Permit per month	\$ 70.00
Permits - Price of General Access Permit per month	\$ 45.00
Permits - Price of Free Permit per month	\$ -
Permits - Cost for City per permit per month (per ParkMobile)	\$ 1.00
Estudillo - Parking Spots - Quantity	384
Estudillo - Mobile Payment Rate	\$ 0.25
MSMs in Off-Street Lots - Quantity	10
MSMs in Estudillo - Quantity	2
Increase in citations - %	20%
# Households in RPP Area	3,250
Price per RPP - annual price at start	\$ 25.00
% of eligible people buying RPP	650

Appendix D - Labor Rate Analysis

Current				Direct rates				Loaded rates				
Department	Title	FTE		Rate (Hrly)	Rate (Monthly)	Rate (Annual)	Annual Budget	Rate (Hrly)	Rate (Monthly)	Rate (Annual)	Annual Budget	
Police	Parking Aide	1		\$ 23.74	\$ 4,115.28	\$ 49,383.36	\$ 49,383.36	\$ 47.48	\$ 8,230.56	\$ 98,766.72	\$ 98,766.72	
Public Works	Deputy Public Works Director*	0.50		\$ 54.79	\$ 9,496.85	\$ 113,962.22	\$ 56,981.11	\$ 109.60	\$ 18,996.55	\$ 227,958.63	\$ 113,979.32	
Public Works	Street supervisor	0.75		\$ 41.50	\$ 7,193.33	\$ 86,320.00	\$ 64,740.00	\$ 83.01	\$ 14,388.82	\$ 172,665.90	\$ 129,499.42	
Public Works	Street maintenance worker II	0.75		\$ 31.74	\$ 5,501.60	\$ 66,019.20	\$ 49,514.40	\$ 63.49	\$ 11,004.85	\$ 132,058.21	\$ 99,043.65	
Information Services	Information Services Specialist	0.05		\$ 37.73	\$ 6,539.87	\$ 78,478.40	\$ 3,923.92	\$ 75.47	\$ 13,081.70	\$ 156,980.34	\$ 7,849.02	
Community Development - BD	Business Development Manager	0.2		\$ 58.93	\$ 10,214.20	\$ 122,570.40	\$ 24,514.08	\$ 117.88	\$ 20,431.46	\$ 245,177.57	\$ 49,035.51	
Engineering and Transportation	Senior Engineer	0.1		\$ 53.45	\$ 9,264.60	\$ 111,175.20	\$ 11,117.52	\$ 146.45	\$ 25,385.00	\$ 304,620.05	\$ 30,462.00	
Finance Department	Asst Finance Director	0.02		\$ 56.12	\$ 9,727.80	\$ 116,733.60	\$ 2,334.67	\$ 112.25	\$ 19,455.60	\$ 233,467.20	\$ 4,669.34	
Finance Department	Sr Acct Clerk	0.005		\$ 28.16	\$ 4,880.37	\$ 58,564.48	\$ 292.82	\$ 56.31	\$ 9,760.75	\$ 117,128.96	\$ 585.64	
Finance Department	Accountant I	0.005		\$ 36.83	\$ 6,383.87	\$ 76,606.40	\$ 383.03	\$ 73.66	\$ 12,767.73	\$ 153,212.80	\$ 766.06	
Finance Department	PT Accountant	0.0025		\$ 36.83	\$ 6,383.87	\$ 76,606.40	\$ 191.52	\$ 73.66	\$ 12,767.73	\$ 153,212.80	\$ 383.03	
Total		3.3825					\$ 263,376.43				\$ 535,039.73	
							from BaseFin	\$ 111,153.00			from BaseFin	\$ 170,832.00
							Difference	\$ 152,223.43			Difference	\$ (364,207.73)
								42%				32%
											# spaces in Core + Periphery	3,203
											Labor Cost/Space/Year	\$ 167.04

* Added by CDM Smith, not provided in FTE estimate from City.

P

				Direct rates				Loaded rates				
Department	Title	FTE		Rate (Hrly)	Rate (Monthly)	Rate (Annual)	Annual Budget	Rate (Hrly)	Rate (Monthly)	Rate (Annual)	Annual Budget	
Police	Parking Aide	2		\$ 23.74	\$ 4,115.28	\$ 49,383.36	\$ 98,766.72	\$ 47.48	\$ 8,230.56	\$ 98,766.72	\$ 197,533.44	
Public Works	Deputy Public Works Director	0.1		\$ 54.79	\$ 9,496.85	\$ 113,962.22	\$ 11,396.22	\$ 109.60	\$ 18,996.55	\$ 227,958.63	\$ 22,795.86	
Public Works	Street supervisor	1		\$ 41.50	\$ 7,193.33	\$ 86,320.00	\$ 86,320.00	\$ 83.01	\$ 14,388.82	\$ 172,665.90	\$ 172,665.90	
Public Works	Street maintenance worker II	1		\$ 31.74	\$ 5,501.60	\$ 66,019.20	\$ 66,019.20	\$ 63.49	\$ 11,004.85	\$ 132,058.21	\$ 132,058.21	
Information Services	Information Services Specialist	0.20		\$ 37.73	\$ 6,539.87	\$ 78,478.40	\$ 15,695.68	\$ 75.47	\$ 13,081.70	\$ 156,980.34	\$ 31,396.07	
Community Development - BD	Business Development Manager	0.2		\$ 58.93	\$ 10,214.20	\$ 122,570.40	\$ 24,514.08	\$ 117.88	\$ 20,431.46	\$ 245,177.57	\$ 49,035.51	
Engineering and Transportation	Senior Engineer	0.1		\$ 53.45	\$ 9,264.60	\$ 111,175.20	\$ 11,117.52	\$ 146.45	\$ 25,385.00	\$ 304,620.05	\$ 30,462.00	
Finance Department	Asst Finance Director	0.02		\$ 56.12	\$ 9,727.80	\$ 116,733.60	\$ 2,334.67	\$ 112.25	\$ 19,455.60	\$ 233,467.20	\$ 4,669.34	
Finance Department	Sr Acct Clerk	0.005		\$ 28.16	\$ 4,880.37	\$ 58,564.48	\$ 292.82	\$ 56.31	\$ 9,760.75	\$ 117,128.96	\$ 585.64	
Finance Department	Accountant I	0.005		\$ 36.83	\$ 6,383.87	\$ 76,606.40	\$ 383.03	\$ 73.66	\$ 12,767.73	\$ 153,212.80	\$ 766.06	
Finance Department	PT Accountant	0.0025		\$ 36.83	\$ 6,383.87	\$ 76,606.40	\$ 191.52	\$ 73.66	\$ 12,767.73	\$ 153,212.80	\$ 383.03	
Total		4.6325					\$ 317,031.46				\$ 642,351.08	
							from BaseFin	\$ (75,998.00)			from BaseFin	\$ 0.35
							Difference	\$ 393,029.46			Difference	\$ (642,350.73)
								-24%				0%
											# spaces in Core + Periphery	3,203
											Labor Cost/Space/Year	\$ 200.55

Notes:

1. Staff indicates that they are dedicating 2.85 FTE to the parking program, but are only charging 41% of fully loaded effort.
2. Made assumptions for Information Services FTE.
3. Finance OH numbers not included on rate table, so most common consolidated rate was used (100%).

Staff overhead charges	Benefits	IOH	Staff Support	Total OH	Parking FTE
Police	33%	14.8%	52.20%	100%	1.0
Public Works	33%	14.8%	52.23%	100%	2.0
Information Services	33%	14.8%	52.23%	100%	0.05
Community Development - BD	33%	14.8%	52.23%	100%	0.2
Engineering and Transportation	33%	54%	87%	174%	0.1
Finance Department				100%	0.0325
TOTAL FTE					3.3825