Memorandum

WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME

To: Philip Kern, PE, QSD
City of La Mesa
8130 Allison Avenue
La Mesa, CA 91942

From: Mario Tambellini, PE, TE
Nicole Scappaticci, PE

Date: June 19, 2023

Subject: **Qdoba La Mesa Traffic Assessment Letter**

INTRODUCTION

This Traffic Assessment Letter (TAL) has been prepared to present the results of a traffic assessment for the proposed Qdoba La Mesa Project (Project) located in the City of La Mesa (City). The Project would construct a Qdoba restaurant with drive-through on two (2) parcels located on the southeast quadrant of the intersection of Jackson Drive with Parkway Drive. The Project location is shown in **Attachment A**. The two (2) parcels are identified as APNs 490-592-04-00 and 490-592-02-00. There is a currently unoccupied smog shop located on the western portion of the Project site. The Project would demolish the existing building. This TAL includes the following:

- Project trip generation
- Intersection and roadway operations analysis
- Site access analysis, including Project driveway throat length, corner sight distance, and turning radii, analysis
- Discussion of Project impact on transit and other public facilities
- On-site parking evaluation
- Drive-through queueing analysis

This TAL has been prepared based on the *Guidelines for Transportation Impact Studies in the San Diego Region* (Institute of Transportation Engineers, dated May 2019) standards as well as the City's *Department of Public Works Development Review Process for Traffic* (revised February 2, 2016).

PROJECT DESCRIPTION

The Project proposes to construct an 1,890 square-foot Qdoba restaurant with 36 seats and a drive-through on a site which currently contains a smog shop building that is no longer in operation. Project access would be provided via a proposed driveway on Parkway Drive located approximately 215-ft east of the intersection of Jackson Drive with Parkway Drive. There are two (2) existing driveways on the northern edge of the Project site which would be removed as part of the Project. The City's *2012 General Plan* designates the site as Regional Serving Commercial. According to the City's Zoning Map, the site is zoned General Commercial/Grossmont Overlay/Urban Design Overlay (C-G-D). The Project site plan is included in **Attachment B**.

PROJECT TRIP GENERATION AND DISTRIBUTION

Trip generation rates from *The (Not So) Brief Guide of Vehicular Traffic Generation Rates for the San Diego Region (San Diego Association of Governments (SANDAG) Traffic Generation Rates)* (SANDAG, April 2002) were used to estimate Project generated trips. The Fast Food (with drive-through) land use was used to represent the Project. **Table 1** summarizes the trip generation for the proposed Project.

Table 1. Project Trip Generation

Land Use	Quantity	Units	Daily	AM Peak Hour			PM Peak Hour		
				In	Out	Total	In	Out	Total
Fast Food (with drive-through)[1]	1.890	KSF[2]	1,229	43	43	86	43	43	86
Pass-By Trips (Daily/AM/PM = 40%)[3]			*492*	*17*	*17*	*34*	*17*	*17*	*34*
Primary Trips[4]			***737***	***26***	***26***	***52***	***26***	***26***	***52***

Notes:
[1]Trip rates are based on the (Not So) Brief Guide of Vehicular Traffic Generation Rates for the San Diego Region (SANDAG, April 2002). The AM and PM peak hours are both 7% of daily trips per the SANDAG Traffic Generation Rates.
[2]KSF = thousand square feet
[3]PM Pass-By percentages are from the (Not So) Brief Guide of Vehicular Traffic Generation Rates for the San Diego Region. PM Pass-By percentages were assumed to be applicable for AM and Daily conditions as well. This is generally consistent with the ITE Trip Generation Handbook (3rd Edition) which has an average AM Pass-By percentage of 49%.
[4]Primary Trips = Generated Trips - Pass-By Trips

As illustrated in **Table 1**, the proposed Project is anticipated to generate a total of 737 daily primary trips, 52 AM peak hour primary trips (26 inbound, 26 outbound), and 52 PM peak hour primary trips (26 inbound, 26 outbound) under typical weekday traffic demand conditions.

Project trips would be assigned to the surrounding roadway network based on the following distribution, which was developed based on Project characteristics, existing travel patterns, and knowledge of the area:

- Primary Trips
    - 60% to/from Jackson Drive south of Parkway Drive
    - 40% to/from Jackson Drive north of Parkway Drive
- Pass-By Trips
    - 50% from Jackson Drive south of Parkway Drive
    - 50% from Jackson Drive north of Parkway Drive

Project trip distribution is shown in **Figure 1**.

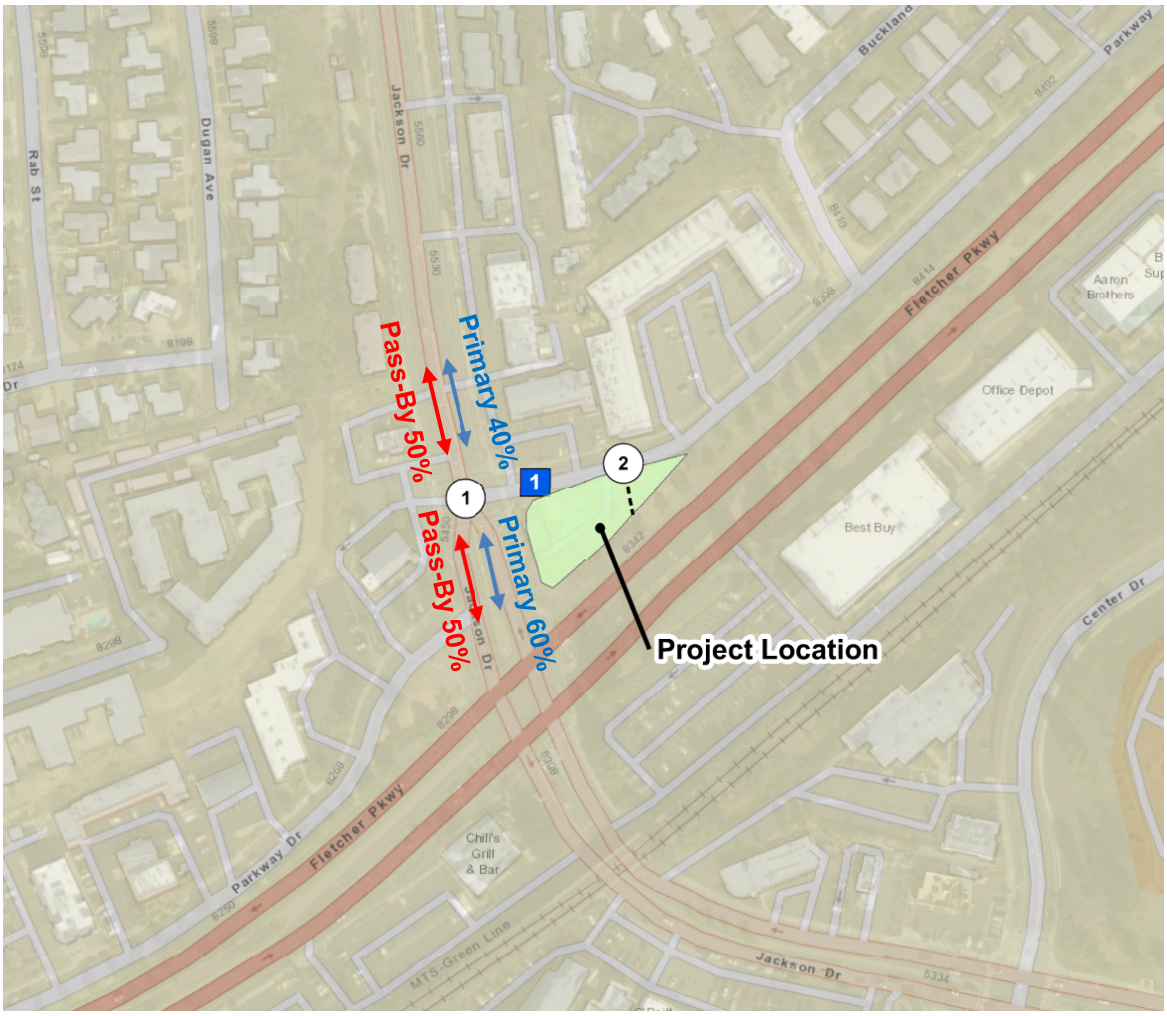


Figure 1. Project Trip Distribution

INTERSECTION AND ROADWAY SEGMENT OPERATIONS ANALYSIS

ANALYSIS SCENARIOS AND STUDY FACILITIES

Intersection and roadway operations were studied under the following scenarios:

- Existing Conditions
- Existing Plus Project Conditions

As shown in Attachment A, the following intersections and roadway facilities were included in this analysis:

Study Intersections:

1. Jackson Drive & Parkway Drive
2. Project Driveway & Parkway Drive (proposed)

Study Roadway Segment:

1. Parkway Drive between Jackson Drive and the Project Driveway

TRAFFIC VOLUMES

Weekday AM and PM peak hour turning movement counts were collected on Thursday, February 17, 2022 between 7:00 AM to 9:00 AM and between 4:00 PM to 6:00 PM. Average daily traffic (ADT) counts were collected on the same day. Traffic data count sheets are included in **Attachment C**. A summary of the intersection turning movements and lane geometry for Existing conditions are presented in **Figure 2**.

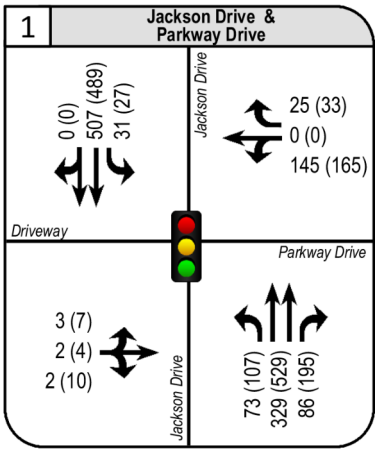


Figure 2. Existing AM (PM) Peak Hour Intersection Volumes and Lane Geometry

Primary Project trips and pass-by trips were assigned to the roadway network based on the previously shown distributions. Pass-by trips are considered vehicle trips currently on the local roadway network that would make a short diversion to visit the project site. In this case, pass-by trips were considered to originate from vehicles traveling northbound or southbound on Jackson Drive. The primary Project trip assignment and pass-by trip assignment, and lane geometry for Existing Plus Project conditions, are presented in **Figures 3** and **4**, respectively.

Primary project trips and pass-by trips are added to Existing volumes to obtain Existing Plus Project peak hour volumes, which are shown in **Figure 5**.

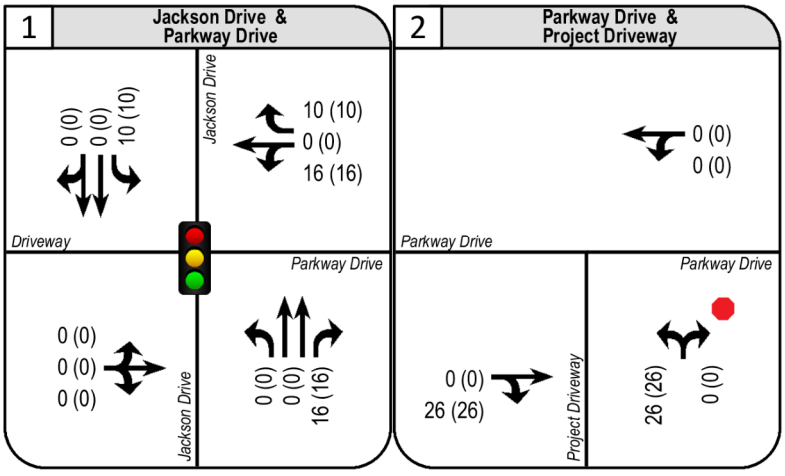


Figure 3. Primary Project AM (PM) Peak Hour Trip Assignment and Lane Geometry

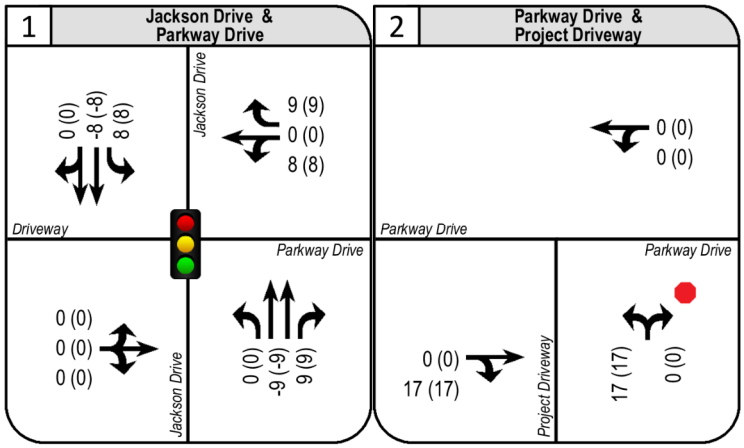


Figure 4. Pass-By AM (PM) Peak Hour Trip Assignment and Lane Geometry

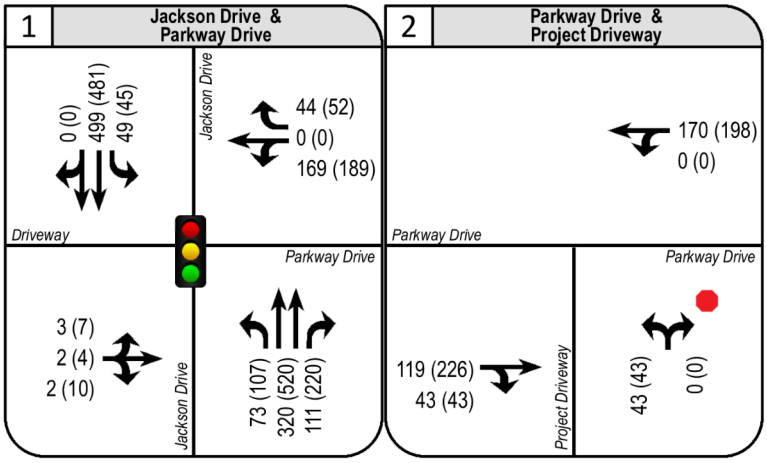


Figure 5. "Existing Plus Project" Weekday AM (PM) Peak Hour Intersection Volumes and Lane Geometry

Level of Service Criteria

The City's General Plan Circulation Element Policy CE-1.1.8 states that when a traffic analysis indicates that the Level of Service (LOS) for a street reaches "E" or below, the City will determine what improvements or changes in operations are needed to maintain or improve the LOS. The City's *Traffic Impact Requirements for Development* (February 2016) memorandum states that when a traffic analysis indicates that the level of service (LOS) for a street reaches "D" or below, the City will determine if improvements or changes in operations are needed to maintain or improve the Level of Service. Based on City general Plan requirements, the minimum acceptable LOS for the study intersections and roadway segment is considered to be LOS "D".

Intersection Operations Analysis

Synchro 11 software and Highway Capacity Manual, 6th Edition (HCM 6th Edition) methodology was used to determine intersection delay and LOS operations under Existing weekday AM and PM peak hour conditions.

For signalized intersections, the intersection delays and LOS reported are the average values for the whole intersection. For one-way stop-controlled (OWSC) intersections, the worst approach/movement delay and LOS is reported. The delay-based HCM 6th Edition LOS criteria for different types of intersection controls are outlined in **Table 2**.

Table 2. HCM 6th Edition Intersection LOS Thresholds

Level of Service	Description	Intersection Control Delay (seconds/vehicle)	
		Unsignalized	Signalized
A	Free-flow conditions with negligible to minimal delays.	delay ≤ 10.0	delay ≤ 10.0
B	Good progression with slight delays.	10.0 < delay ≤ 15.0	10.0 < delay ≤ 20.0
C	Relatively higher delays.	15.0 < delay ≤ 25.0	20.0 < delay ≤ 35.0
D	Somewhat congested conditions with longer but tolerable delays.	25.0 < delay ≤ 35.0	35.0 < delay ≤ 55.0
E	Congested conditions with significant delays.	35.0 < delay ≤ 50.0	55.0 < delay ≤ 80.0
F	Jammed or grid-lock type operating conditions.	delay > 50.0	delay > 80.0
Source: HCM 6th Edition Exhibit 19-8 and 20-2.			

Table 3 presents a summary of the intersection LOS operations under weekday AM and PM peak hour Existing and Existing Plus Project conditions.

Table 3. Intersection Operations

#	Intersection	Control Type	LOS Criteria	Peak Hour	Existing		Existing Plus Project	
					Delay (sec/veh)[2]	LOS	Delay (sec/veh)[2]	LOS
1	Jackson Drive & Parkway Drive	Signal	D	AM	12.6	B	13.1	B
				PM	13.1	B	14.5	B
2	Parkway Drive & Project Driveway	OWSC[1]	D	AM			10.9	B
				PM			12.3	B
Notes: *[1] OWSC = One-Way Stop-Controlled*								

As shown in **Table 3** presents a summary of the intersection LOS operations under weekday AM and PM peak hour Existing and Existing Plus Project conditions.

Table 3, all intersections operate at acceptable LOS (LOS "D" or better) under Existing and Existing Plus Project conditions. Synchro software HCM 6th Edition intersection LOS output reports are included in **Attachment D**.

Roadway Segment Operations Analysis

Functional classification for the study roadway segment was obtained from the City's *General Plan Circulation Element* (February 2016). LOS thresholds from the SANTEC/ITE *Guidelines for Transportation Impact Studies in the San Diego Region* (January 2019) were applied to the study roadway segment. The "Collector (commercial- industrial fronting)" classification thresholds were applied to the roadway segment. **Table 4** provides a summary of the roadway LOS operations under Existing and Existing Plus Project conditions.

As shown in **Table 4**, the study roadway segment operates at acceptable LOS (LOS "D" or better) under Existing and Existing Plus Project conditions.

Table 4. Roadway Segment Operations

#	Roadway Segment	Facility Type[1]	LOS Critieria[2]	Maximum Volume for Acceptable LOS[3]	Existing ADT	Existing LOS	Project ADT	Existing Plus Project ADT	Existing Plus Project LOS
1	Parkway Drive, east of Jackson Drive	Local Collector	D	6,500	4,159	C	1,229	5,388	D

Note:
[1] Source: Figure CE-1, City of La Mesa General Plan Circulation Element
[2] Source: City of La Mesa General Plan Circulation Element
[3] Source: Table 7-2, SANTEC/ITE Guidelines for Transportation Impact Studies in the San Diego Region (January 22, 2019). The "Collector (commercial - industrial fronting)" classification thresholds were applied to the roadway segment.

SIGHT DISTANCE ANALYSIS

City Zoning Ordinance 24.05.030N allows obstructions no higher than 36 inches inside sight distance visibility triangles measuring 15 feet along each curb or edge of pavement from the juncture of a street and driveway forming two sides of a triangle, with the third side connecting the ends of the two lines.

Using the city code, a sight triangle analysis was performed for the single driveway entrance and exit to the parcel on Parkway Drive. At the driveway, a substantially clear line of sight should be maintained between the driver of a vehicle exiting the property in both directions without interference from trees, large signs, or anything that may impede this visibility for the driver. Sight triangles are met or exceeded for the proposed project as illustrated in **Attachment E**.

INTERNAL SITE CIRCULATION AND PARKING

PROJECT DRIVEWAY THROAT LENGTH

The throat length for vehicles exiting the Project driveway onto Parkway Drive is approximately 15-feet. The 95th percentile queues for the northbound approach of the Project driveway are projected to be one vehicle (approximately 25 feet) or less under Existing Plus Project conditions. Based on the Project site plan, a single queued vehicle exiting the Project Driveway may partially block the first parking space on the east side of the Project site. However, the low projected 95th percentile queues indicate that this would only occur a small percent of the time during the peak hour. Thus, the throat length is considered sufficient based on the 95th percentile queues shown in the Synchro output reports included in **Attachment C**.

TURN RADII ANALYSIS

Proposed Project site circulation was evaluated by performing turning analysis on the 23-foot-wide Project Driveway using AutoCAD software. City of La Mesa Public Works Department Driveway Standards state that commercial driveway widths are 14 feet minimum and 35 feet maximum. A 23-foot garbage truck design vehicle was used to evaluate turns in order to represent a typical heavy vehicle that would visit the site. Turning exhibits showing ingress and egress turns are included in **Attachment F**. Based on the current Project site plan, a 23 foot long design vehicle would be able to navigate the driveway without conflicting with an opposing vehicle. However, vehicles larger than the design vehicle may have difficulty entering or exiting the site without conflicting with another vehicle using the driveway. Additionally, as there is no dedicated turnaround area on site, large vehicles would likely need to make a 3-point turn to exit the site.

TRANSIT, BICYCLES, AND PEDESTRIANS

The nearest transit stop to the Project site is the Grossmont Transit Center, located approximately 0.6 miles from the site. The Grossmont Transit center serves the Metropolitan Transit System (MTS) Green and Orange Trolley lines. This stop also served bus Route 852, which travels between Grossmont Center and Colina del

Sol Park. The Grossmont Transit center is accessible from the Project site via existing pedestrian facilities along Jackson Drive and Fletcher Parkway. The Project is not anticipated to affect existing transit facilities.

Existing striped bike lanes are present along Jackson Drive north of Parkway Drive. It is recommended that the Project provide adequate onsite bicycle parking and storage for patrons of the Project. Existing sidewalks are present along the north side of Parkway Drive and both sides of Jackson Drive within the Project vicinity. Existing curb ramps and pedestrian crossings are present on all four legs of the Jackson Drive & Parkway Drive intersection and on three legs of the Jackson Drive & Fletcher Parkway intersection. The Project proposes to connect to the existing sidewalk at the southeast corner of the Jackson Drive & Parkway Drive intersection. The Project would provide adequate connectivity to existing bicycle and pedestrian facilities.

PARKING

Based on requirements outlined in Section 24.04 of the City Zoning Ordinance, the Project is required to provide 1 parking space per square foot gross leasable area (GLA), exclusive of the dining area, plus 1 space per three-person seating capacity. The Project consists of 1,231 square feet GLA (excluding dining area) and 36 seats, thus requiring 17 parking spaces. The Project proposes to provide 17 total parking spaces, including one (1) accessible parking space, therefore meeting the City's minimum parking requirements.

DRIVE-THROUGH QUEUEING ANALYSIS

A drive-through queueing analysis was performed for the Project based on data collected at other drive-through restaurants within the Project vicinity. Drive-through queueing data over five-minute intervals was collected on Thursday, February 17, 2022, at the following locations and time periods:

- Starbucks at 6140 Lake Murray Boulevard, 7 AM to 9 AM
- Chick-fil-A at 8200 Parkway Drive (dual order boards), 11 AM to 1 PM
- Vallarta Express at 5341 Jackson Drive, 11 AM to 1 PM

Starbucks and Chick-fil-A are national chains and Vallarta Express is a local chain with five locations throughout San Diego County. Drive-through queueing data is included in **Attachment G**. A summary of the drive-through queue data is included in **Table 5**.

Table 5. Drive-Through Queueing Data Summary

Location	Available Drive-Through Storage (ft)[1]	Max Observed Queue (veh)			
		Pick-Up Window to Order Board	Order Boar to Drive-Through Entrance	Beyond Drive-Through Entrance	Total
Starbucks at 6140 Lake Murray Boulevard	200	5	4	3	12
Chick-fil-A at 8200 Parkway Drive	340	10	8	10	28
Vallarta Express at 5341 Jackson Drive	115	4	3	0	7

Notes:
[1] Available drive-through storage is measured from the drive-through entrance to the order pick-up window(s).

Data at the Chick-fil-A location was collected at request of City staff. Chick-fil-A was shown to experience queuing beyond the drive through entrance approximately 52% of the time during the two-hour data collection period. The Chick-fil-A location includes dual order boards and internal parking lot traffic control measures (including bollards) to route drive-through queues along the northern parking aisle. As Chick-fil-A is a popular national chain that experiences higher than typical demand at most locations, the Project's queueing characteristics are not anticipated to match those of Chick-fil-A.

The Starbucks and Vallarta Express data is anticipated to more closely represent maximum queues at the Project site. Based on the average of the maximum queues at Starbuck and Vallarta Express, the Project is

likely to experience a maximum drive-through queue of 10 vehicles. As, shown in **Attachment H**, the Project site plan would accommodate the maximum projected drive-through queue of 10 vehicles. The Project site has a maximum drive-through queueing capacity of up to 12 vehicles without blocking the Project driveway or internal circulation.

CONCLUSION

The proposed Project is anticipated to generate a total of 737 daily primary trips, 52 AM peak hour primary trips (26 inbound, 26 outbound), and 52 PM peak hour primary trips (26 inbound, 26 outbound) under typical weekday traffic demand conditions.

Intersection LOS at all study intersections and roadway segments was projected to be acceptable (LOS "D" or better) under all study scenarios.

Sight distance triangles of 15-feet were provided on both sides of the single driveway entrance/exit on Parkway Drive.

The throat length for vehicles exiting the Project driveway onto Parkway Drive is approximately 15-feet. The 95th percentile queues for the northbound approach of the Project driveway are projected to be one vehicle (approximately 25 feet) or less under Existing Plus Project conditions. Based on the Project site plan, a single queued vehicle exiting the Project Driveway may partially block the first parking space on the east side of the sight. However, the low projected 95th percentile queues indicate that this would only occur a small percent of the time during the peak hour. Thus, the throat length is considered sufficient.

Proposed Project site circulation was evaluated by performing turning analysis on the 23-foot-wide Project Driveway. A 23-foot garbage truck design vehicle was used to evaluate turns in order to represent a typical heavy vehicle that would visit the site. Based on the current Project site plan, the design vehicle would be able to navigate the driveway without conflicting with an opposing vehicle. However, vehicles larger than the design vehicle may have difficulty entering or exiting the site without conflicting with another vehicle using the driveway. Additionally, as there is no dedicated turnaround area on site, large vehicles would likely need to make a 3-point turn to exit the site.

The Grossmont Transit center is accessible from the Project site via existing pedestrian facilities along Jackson Drive and Fletcher Parkway. The Project is not anticipated to affect existing transit facilities.

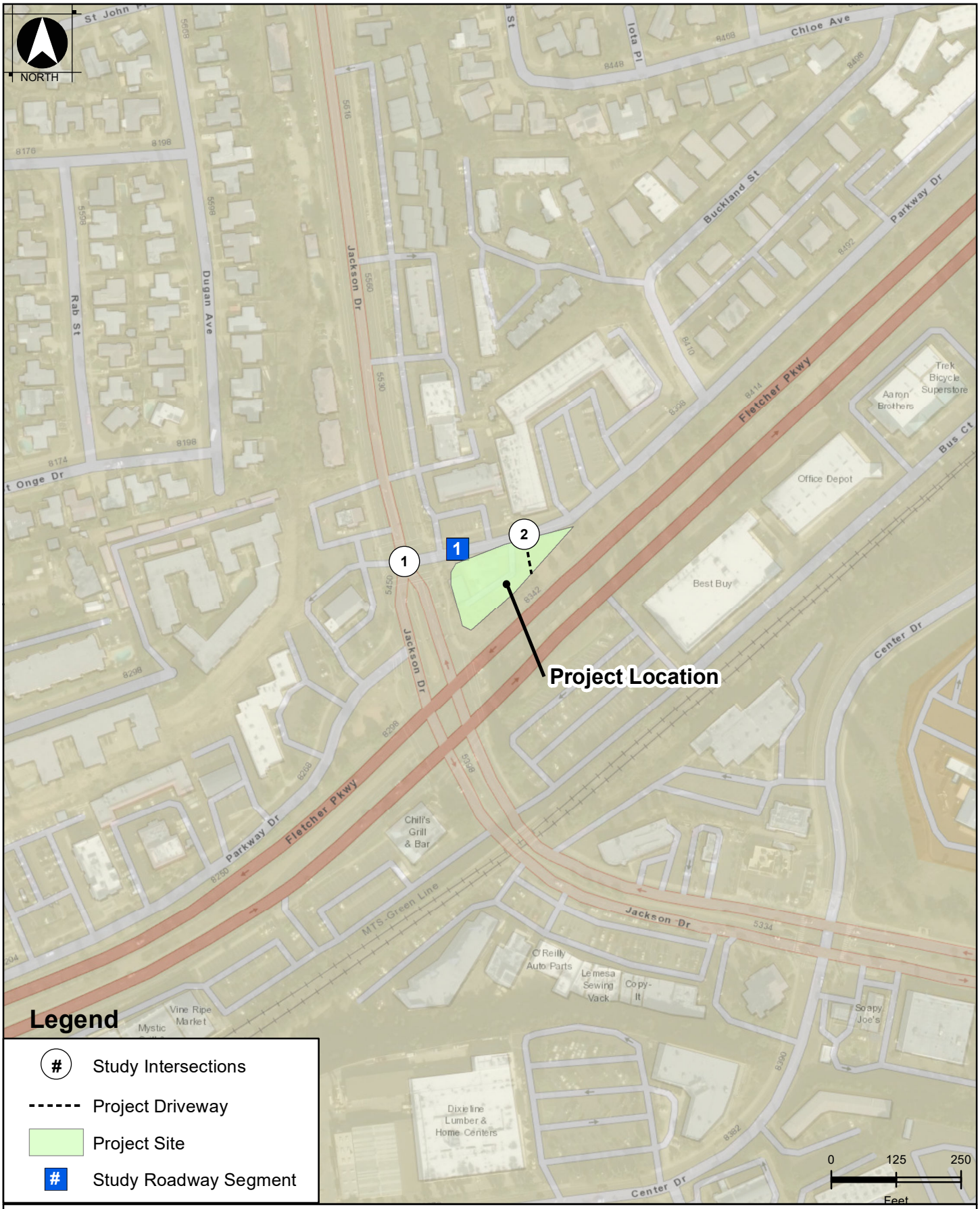
It is recommended that the Project provide adequate onsite bicycle parking and storage for patrons of the Project. The Project proposes to connect to the existing sidewalk at the southeast corner of the Jackson Drive & Parkway Drive intersection. The Project would provide adequate connectivity to existing bicycle and pedestrian facilities.

The Project proposes to provide 17 total parking spaces, including one (1) accessible parking space, therefore meeting the City's minimum parking requirements.

A drive-through queueing analysis was performed for the Project based on data collected at other drive-through restaurants within the Project vicinity, including Starbucks, Chick-fil-A, and Vallarta Express. As Chick-fil-A is a popular national chain that experiences higher than typical demand at most locations, the Project's queueing characteristics are not anticipated to match those of Chick-fil-A. The Starbucks and Vallarta Express data is anticipated to more closely represent maximum queues at the Project site. The Project site has a drive-through queueing capacity of 12 vehicles. Based on the average of the maximum queues at Starbuck and Vallarta Express, the Project is likely to experience a maximum drive-through queue of 10 vehicles. The Project site plan would accommodate the maximum projected drive-through queue.

ATTACHMENT A

PROJECT LOCATION AND STUDY FACILITIES



Project Location and Study Facilities

Qdoba La Mesa TAL
La Mesa, CA
April 2022

Attachment A

WOOD RODGERS

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ATTACHMENT B

PROJECT SITE PLAN

INTERIOR PARKING LANDSCAPE CALCS	
Interior Parking =	6664 SQ. FT.
10% of Interior Parking =	666 SQ. FT.
Proposed Interior Landscaping =	3056 SQ. FT.

ARCHITECTURAL SITE PLAN

Scale: 1"=10'-0"

SITE PLAN GENERAL NOTES

A. REFER TO BASE SHELL CIVIL DRAWINGS, BY OTHERS, FOR SITE LOCATION, LOT LINES, LOT SETBACKS, SIDEWALKS, CURBS, UTILITIES, PARKING REQUIREMENTS AND SIGNAGE.

B. REFER TO LANDSCAPE DRAWINGS FOR LANDSCAPE DESIGN.

C. 36" MINIMUM ADA PATH OF TRAVEL REQUIRED TO REMAIN CLEAR AND UNOBSTRUCTED.

SITE PLAN KEY NOTES

1. NEW DIRECTIONAL SIGNAGE – REFER TO DETAIL 18/ SD1.2
2. EXISTING SIDEWALK, FIELD VERIFY WIDTH. GC TO WIDEN TO 5'-0", IF LESS THAN 5'-0" WIDE.
3. NEW SITE DIRECTIONAL SIGNAGE AS SHOWN
4. NEW PARKING LOT POLE MOUNTED LIGHT
5. NEW TRASH ENCLOSURE – REFER TO SD2.0
6. NO BUILD EASEMENT
7. PROPERTY LINE – REFER TO CIVIL DRAWINGS
8. NEW 6" CONCRETE CURB – REFER TO CIVIL DRAWINGS
9. NEW CURB RAMP – REFER TO CIVIL DRAWINGS
10. NEW BOLLARD – REFER TO CIVIL DRAWINGS
11. ACCESSIBLE PARKING STALL AND ACCESS AISLE – REFER TO CIVIL DRAWINGS
12. EXISTING SINGLE PHASE ELECTRICAL SERVICE
13. NEW LANDSCAPE SCREEN AT DRIVE-THRU LANE, FOR REFERENCE ONLY – REFER TO LANDSCAPE PLAN
14. PROPERTY OWNER/DEVELOPER TO MAINTAIN LANDSCAPE AREA SHOWN IN YELLOW OUTSIDE OF PARCEL BOUNDARY, TO BE REVIEWED AND APPROVED BY CITY ENGINEER. DEPTH TO BE 5'-0" TYPICAL EXCEPT ADJACENT TO PARKING TO ALLOW FOR VEHICLE OVERHANG: 7'-0" AT COMPACT STALLS AND 8'-0 AT STANDARD STALLS. REFER TO LANDSCAPE PLAN FOR ADDITIONAL STREETSCAPE ENHANCEMENT ALONG JACKSON DRIVE.
15. EXISTING DRIVEWAY, ASPHALT PAVING, AND DAMAGED SIDEWALK TO BE REMOVED AND REPLACED – REFER TO LANDSCAPE PLAN.
16. NEW 5'-0" WIDE SIDEWALK – REFER TO CIVIL DRAWINGS
17. EXISTING STREET LIGHT
18. EXISTING TRAFFIC SIGNAL LIGHT
19. EXISTING ELECTRICAL EQUIPMENT.
20. EXISTING WATER VAULT.
21. EXISTING 8" VITRIFIED CLAY (VC) SANITARY SEWER MAIN.
22. EXISTING ELECTRICAL PULL BOX.
23. EXISTING WATER SERVICE.
24. NEW BUILDING MOUNTED SITE LIGHT
25. NEW CANOPY SITE LIGHT
26. STORM DRAIN MAINTENANCE MANHOLE – REFER TO CIVIL
27. GREASE INTERCEPTOR – REFER TO CIVIL
28. GREASE WASTE POINT OF CONNECTION – REFER TO CIVIL AND PLUMBING
29. SANITARY SEWER POINT OF CONNECTION – REFER TO CIVIL AND PLUMBING
30. SANITARY SEWER MAN HOLE (SSMH)
31. SANITARY SEWER CLEANOUT
32. EXISTING WATER VAULT
33. PERFORATED STORM DRAIN PIPE – REFER TO CIVIL
34. CONNECTION TO BACK OF EXISTING DRAIN INLET – REFER TO CIVIL
35. DOMESTIC AND IRRIGATION WATER METERS AND BACKFLOWS
36. EXISTING TRANSFORMER
37. NEW GAS SERVICE POINT OF CONNECTION – REFER TO CIVIL AND PLUMBING
38. SIGHT DISTANCE VISIBILITY TRIANGLES – REFER TO CIVIL
39. NEW STANDARD COMMERCIAL DRIVEWAY ENTRY/APRON (G-26) – REFER TO CIVIL

Parking Calculations:
Required: 1 for each 250 s.f. GLA, exclusive of the dining area, plus 1 for each 3 persons seating capacity in the dining room
1231 s.f./ 250 = 5 (4.924)
32 seats/ 3 = 11
Total = 16

Provided: 8 Standard + 8 Compact = 16 Stalls
TABLE 11B-208.2 1 ADA (1:25)

Photometric Lighting Schedule

Symbol	Label	Quantity	Catalog Number	Description	Lamp	Wattage
	P4	4	PRV-C40-D-UNV-T4-BZ	Single Head Eaton Lumark Prevail Series LED Area Unit w/Type T4 Distribution (20ft. Pole Height w/3ft. Concrete Base)	LED/4000K	131
	P5	1	PRV-C40-D-UNV-T5-BZ	Single Head Eaton Lumark Prevail Series LED Area Unit w/Type T5 Distribution (20ft. Pole Height w/3ft. Concrete Base)	LED/4000K	131
	OD	1	XTOR1B-W	Cooper Lighting Solutions Lumark Crosstour Series 12w Wall Mounted Overdoor LED Wall Sconce Unit (9ft. Fixture Mounting Height)	LED/4000K	12.2
	UC	5	V120-SO-4000K	GM Lighting Vision 120 Series Linear Under Canopy LED Tape Lighting (76 Total Linear FT)	LED/4000K (3w per FT)	2.97786

Statistics

Description	Symbol	Avg	Max	Min	Max/Min	Avg/Min
Parking Lot Light Levels	+	3.1 fc	9.7 fc	0.3 fc	32.3:1	10.3:1
Property Light Spill Levels	+	0.2 fc	3.6 fc	0.0 fc	N/A	N/A
Property Line Light Levels	+	1.4 fc	3.8 fc	0.0 fc	N/A	N/A

QDOBA MEXICAN EATS
350 CAMINO DE LA REINA, STE 400
SAN DIEGO, CA 92108

LINGLE DESIGN GROUP INC
158 W. MAIN ST.
LENA, IL 61048
815.369.9155
1764 BLAKE ST.
DENVER, CO 80202
303.974.5873
WWW.LINGLEDESIGN.COM

PRELIMINARY NOT FOR CONSTRUCTION

DATES

RELEASE: -
P.M. UPDATES: -
SUBMITTAL DATE:
1: 03/17/2022
2: 05/11/2022
3: 06/09/2022
4: 12/09/2022
5: 03/17/2023
6: 04/19/2023
7: 06/15/2023
BID: -
CONSTRUCTION: -

REVISIONS

- -
- -
- -
- -
- -
- -
- -

SITE INFORMATION

QME #: 003039
ADDRESS:
8303 Parkway Drive
La Mesa, CA 91942
DRAWN BY: RG/KB
PROJECT #: 21-036
SCALE: AS NOTED

ARCHITECTURAL SITE PLAN

SD1.0

ATTACHMENT C

TRAFFIC COUNTS

Counts Unlimited, Inc.
PO Box 1178
Corona, CA 92878
(951) 268-6268
counts@countsunlimited.com

City of La Mesa
N/S: Jackson Drive
E/W: Parkway Drive
Weather: Clear

File Name : 01_LMA_Jackson_Parkway_AM
Site Code : 99922133
Start Date : 2/17/2022
Page No : 1

Groups Printed- Total Volume

	Jackson Drive Southbound				Parkway Drive Westbound				Jackson Drive Northbound				Driveway Eastbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
07:00 AM	3	54	0	57	36	0	7	43	8	31	15	54	0	0	1	1	155
07:15 AM	5	78	0	83	41	0	5	46	5	45	26	76	0	0	0	0	205
07:30 AM	7	127	0	134	40	0	7	47	15	79	10	104	0	1	0	1	286
07:45 AM	8	168	0	176	38	0	6	44	19	91	21	131	2	0	0	2	353
Total	23	427	0	450	155	0	25	180	47	246	72	365	2	1	1	4	999
08:00 AM	7	130	0	137	28	0	5	33	17	74	14	105	0	0	1	1	276
08:15 AM	9	82	0	91	39	0	7	46	22	85	41	148	1	1	1	3	288
08:30 AM	1	90	1	92	25	1	5	31	21	82	18	121	0	0	2	2	246
08:45 AM	1	102	0	103	23	0	3	26	12	77	23	112	0	2	1	3	244
Total	18	404	1	423	115	1	20	136	72	318	96	486	1	3	5	9	1054
Grand Total	41	831	1	873	270	1	45	316	119	564	168	851	3	4	6	13	2053
Apprch %	4.7	95.2	0.1		85.4	0.3	14.2		14	66.3	19.7		23.1	30.8	46.2		
Total %	2	40.5	0	42.5	13.2	0	2.2	15.4	5.8	27.5	8.2	41.5	0.1	0.2	0.3	0.6	

	Jackson Drive Southbound				Parkway Drive Westbound				Jackson Drive Northbound				Driveway Eastbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 AM to 08:45 AM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:30 AM																	
07:30 AM	7	127	0	134	**40**	0	**7**	**47**	15	79	10	104	0	**1**	0	1	286
07:45 AM	8	**168**	0	**176**	38	0	6	44	19	**91**	21	131	**2**	0	0	2	**353**
08:00 AM	7	130	0	137	28	0	5	33	17	74	14	105	0	0	**1**	1	276
08:15 AM	**9**	82	0	91	39	0	7	46	**22**	85	**41**	**148**	1	1	1	**3**	288
Total Volume	31	507	0	538	145	0	25	170	73	329	86	488	3	2	2	7	1203
% App. Total	5.8	94.2	0		85.3	0	14.7		15	67.4	17.6		42.9	28.6	28.6		
PHF	.861	.754	.000	.764	.906	.000	.893	.904	.830	.904	.524	.824	.375	.500	.500	.583	.852

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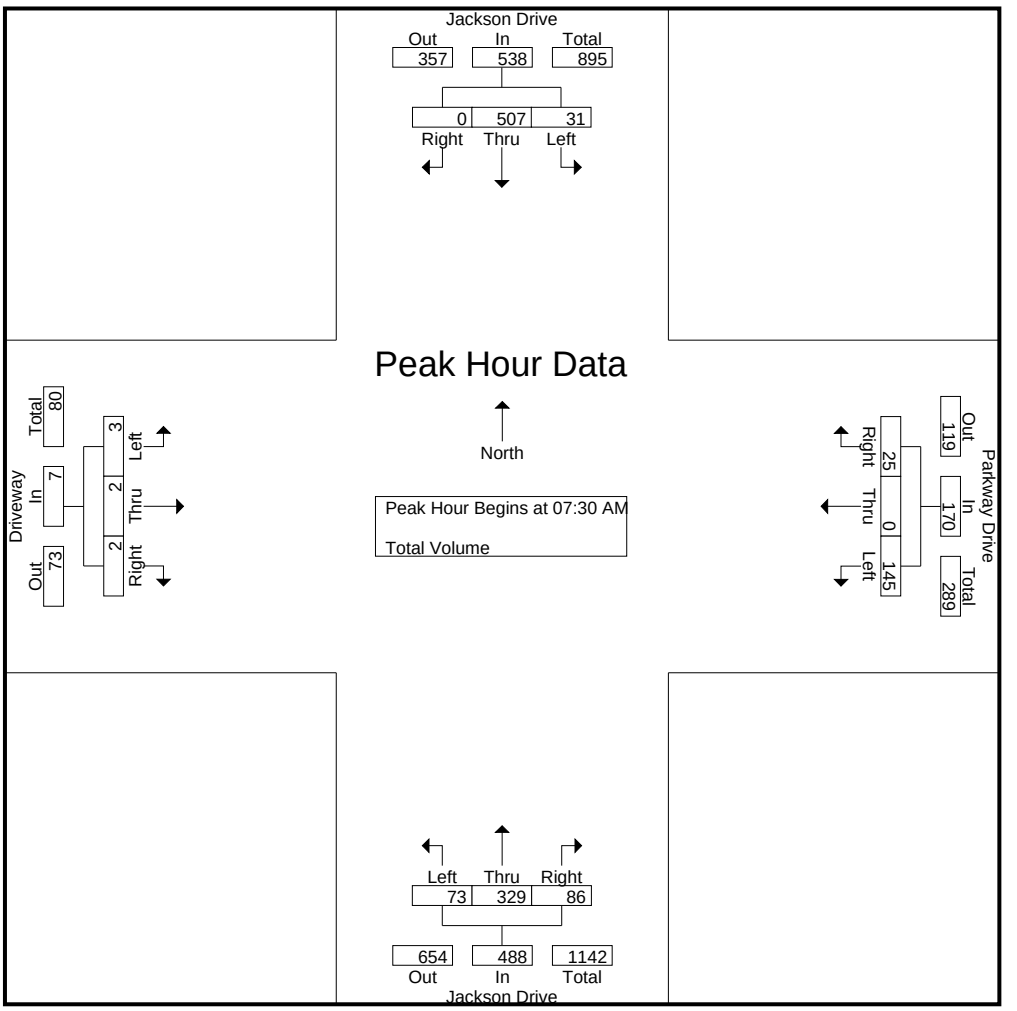
City of La Mesa
N/S: Jackson Drive
E/W: Parkway Drive
Weather: Clear

File Name : 01_LMA_Jackson_Parkway_AM
Site Code : 99922133
Start Date : 2/17/2022
Page No : 2



Peak Hour Analysis From 07:00 AM to 08:45 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM				07:00 AM				07:45 AM				08:00 AM			
+0 mins.	7	127	0	134	36	0	**7**	43	19	**91**	21	131	0	0	1	1
+15 mins.	8	**168**	0	**176**	**41**	0	5	46	17	74	14	105	**1**	1	1	**3**
+30 mins.	7	130	0	137	40	0	7	**47**	**22**	85	**41**	**148**	0	0	**2**	2
+45 mins.	**9**	82	0	91	38	0	6	44	21	82	18	121	0	**2**	1	3
Total Volume	31	507	0	538	155	0	25	180	79	332	94	505	1	3	5	9
% App. Total	5.8	94.2	0		86.1	0	13.9		15.6	65.7	18.6		11.1	33.3	55.6	
PHF	.861	.754	.000	.764	.945	.000	.893	.957	.898	.912	.573	.853	.250	.375	.625	.750

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City of La Mesa
N/S: Jackson Drive
E/W: Parkway Drive
Weather: Clear

File Name : 01_LMA_Jackson_Parkway_PM
Site Code : 99922133
Start Date : 2/17/2022
Page No : 1

Groups Printed- Total Volume

	Jackson Drive Southbound				Parkway Drive Westbound				Jackson Drive Northbound				Driveway Eastbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
04:00 PM	7	111	2	120	26	0	7	33	16	145	37	198	2	1	4	7	358
04:15 PM	2	107	0	109	27	0	4	31	20	133	40	193	2	1	1	4	337
04:30 PM	11	117	0	128	58	0	6	64	22	132	49	203	3	3	0	6	401
04:45 PM	20	115	0	135	38	0	11	49	19	123	38	180	1	0	2	3	367
Total	40	450	2	492	149	0	28	177	77	533	164	774	8	5	7	20	1463
05:00 PM	3	112	0	115	35	0	6	41	21	139	45	205	0	1	5	6	367
05:15 PM	4	118	0	122	33	0	9	42	25	141	50	216	3	1	1	5	385
05:30 PM	6	139	0	145	42	0	5	47	28	124	46	198	0	2	3	5	395
05:45 PM	14	120	0	134	55	0	13	68	33	125	54	212	4	0	1	5	419
Total	27	489	0	516	165	0	33	198	107	529	195	831	7	4	10	21	1566
Grand Total	67	939	2	1008	314	0	61	375	184	1062	359	1605	15	9	17	41	3029
Apprch %	6.6	93.2	0.2		83.7	0	16.3		11.5	66.2	22.4		36.6	22	41.5		
Total %	2.2	31	0.1	33.3	10.4	0	2	12.4	6.1	35.1	11.9	53	0.5	0.3	0.6	1.4	

	Jackson Drive Southbound				Parkway Drive Westbound				Jackson Drive Northbound				Driveway Eastbound				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 05:00 PM																	
05:00 PM	3	112	0	115	35	0	6	41	21	139	45	205	0	1	**5**	**6**	367
05:15 PM	4	118	0	122	33	0	9	42	25	**141**	50	**216**	3	1	1	5	385
05:30 PM	6	**139**	0	**145**	42	0	5	47	28	124	46	198	0	**2**	3	5	395
05:45 PM	**14**	120	0	134	**55**	0	**13**	**68**	**33**	125	**54**	212	**4**	0	1	5	**419**
Total Volume	27	489	0	516	165	0	33	198	107	529	195	831	7	4	10	21	1566
% App. Total	5.2	94.8	0		83.3	0	16.7		12.9	63.7	23.5		33.3	19	47.6		
PHF	.482	.879	.000	.890	.750	.000	.635	.728	.811	.938	.903	.962	.438	.500	.500	.875	.934

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City of La Mesa
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Weather: Clear

File Name : 01_LMA_Jackson_Parkway_PM
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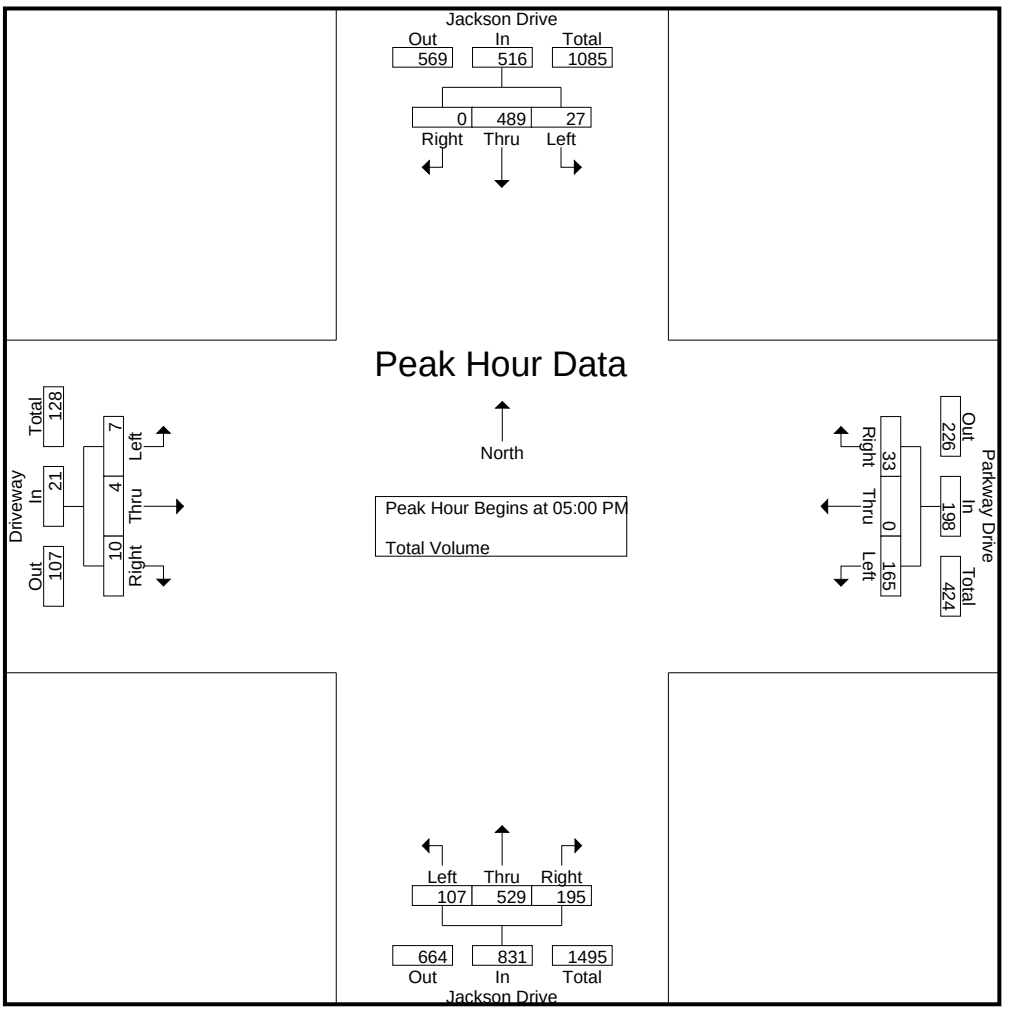

Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:45 PM				05:00 PM				05:00 PM				05:00 PM			
+0 mins.	**20**	115	0	135	35	0	6	41	21	139	45	205	0	1	**5**	**6**
+15 mins.	3	112	0	115	33	0	9	42	25	**141**	50	**216**	3	1	1	5
+30 mins.	4	118	0	122	42	0	5	47	28	124	46	198	0	**2**	3	5
+45 mins.	6	**139**	0	**145**	**55**	0	**13**	**68**	**33**	125	**54**	212	**4**	0	1	5
Total Volume	33	484	0	517	165	0	33	198	107	529	195	831	7	4	10	21
% App. Total	6.4	93.6	0		83.3	0	16.7		12.9	63.7	23.5		33.3	19	47.6	
PHF	.413	.871	.000	.891	.750	.000	.635	.728	.811	.938	.903	.962	.438	.500	.500	.875

Location: La Mesa
N/S: Jackson Drive
E/W: Parkway Drive

Date: 2/17/2022
Day: Thursday

PEDESTRIANS

	North Leg Jackson Drive Pedestrians	East Leg Parkway Drive Pedestrians	South Leg Jackson Drive Pedestrians	West Leg Parkway Drive Pedestrians	
7:00 AM	0	0	0	0	0
7:15 AM	0	4	1	2	7
7:30 AM	0	0	0	0	0
7:45 AM	2	0	0	4	6
8:00 AM	2	2	0	0	4
8:15 AM	2	0	1	1	4
8:30 AM	0	0	1	2	3
8:45 AM	0	0	0	0	0
TOTAL VOLUMES:	6	6	3	9	24

	North Leg Jackson Drive Pedestrians	East Leg Parkway Drive Pedestrians	South Leg Jackson Drive Pedestrians	West Leg Parkway Drive Pedestrians	
4:00 PM	1	1	1	1	4
4:15 PM	0	1	1	0	2
4:30 PM	0	0	0	0	0
4:45 PM	3	1	3	6	13
5:00 PM	3	3	3	6	15
5:15 PM	0	1	1	1	3
5:30 PM	1	3	0	3	7
5:45 PM	3	1	0	4	8
TOTAL VOLUMES:	11	11	9	21	52

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Location: La Mesa
N/S: Jackson Drive
E/W: Parkway Drive

Date: 2/17/2022
Day: Thursday

BICYCLES

	Southbound Jackson Drive			Westbound Parkway Drive			Northbound Jackson Drive			Eastbound Parkway Drive			
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
7:00 AM	0	0	0	0	0	0	0	0	0	0	1	0	1
7:15 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
7:30 AM	0	0	0	0	0	0	0	2	0	0	0	0	2
7:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
8:00 AM	0	0	0	0	0	0	0	1	0	0	0	0	1
8:15 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
8:30 AM	0	1	0	0	0	0	0	0	0	0	0	0	1
8:45 AM	0	0	0	0	0	0	0	0	0	0	0	0	0
TOTAL VOLUMES:	0	3	0	0	0	0	0	3	0	0	1	0	7

	Southbound Jackson Drive			Westbound Parkway Drive			Northbound Jackson Drive			Eastbound Parkway Drive			
	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	
4:00 PM	0	1	0	0	0	0	0	0	1	0	0	0	2
4:15 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
4:30 PM	0	0	0	0	0	0	0	2	0	0	0	0	2
4:45 PM	0	0	0	0	0	0	0	1	0	0	0	0	1
5:00 PM	0	0	0	0	0	0	0	1	0	0	0	0	1
5:15 PM	0	1	0	0	0	0	0	1	0	0	0	0	2
5:30 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
5:45 PM	0	0	0	0	0	0	0	0	0	0	0	0	0
TOTAL VOLUMES:	0	2	0	0	0	0	0	5	1	0	0	0	8

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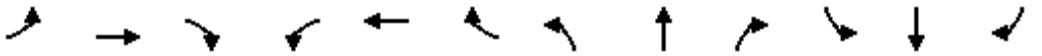
City of La Mesa
Parkway Drive
E/ Jackson Drive
24 Hour Directional Volume Count

LMAPAEJA
Site Code: 999-22133

Start Time	2/17/2022 Thu	Eastbound Morning	Eastbound Afternoon	Hour Totals Morning	Hour Totals Afternoon	Westbound Morning	Westbound Afternoon	Hour Totals Morning	Hour Totals Afternoon	Combined Totals Morning	Combined Totals Afternoon
12:00		2	21			4	24				
12:15		3	36			3	27				
12:30		1	24			2	24				
12:45		1	28	7	109	0	54	9	129	16	238
01:00		3	28			1	47				
01:15		2	26			1	35				
01:30		2	34			1	31				
01:45		5	38	12	126	2	29	5	142	17	268
02:00		1	32			1	37				
02:15		1	36			1	25				
02:30		0	26			0	36				
02:45		0	31	2	125	1	26	3	124	5	249
03:00		1	39			0	34				
03:15		0	45			2	35				
03:30		1	43			0	27				
03:45		2	46	4	173	1	43	3	139	7	312
04:00		0	38			3	25				
04:15		2	36			4	30				
04:30		8	**64**			4	57				
04:45		27	**55**	37	193	10	52	21	164	58	357
05:00		0	**44**			9	38				
05:15		3	**46**			6	34				
05:30		1	58			11	**47**				
05:45		15	53	19	201	32	**63**	58	182	77	383
06:00		22	45			29	**38**				
06:15		1	48			24	**46**				
06:30		4	44			19	37				
06:45		15	28	42	165	24	44	96	165	138	330
07:00		17	27			**44**	48				
07:15		23	32			**42**	31				
07:30		11	28			**46**	21				
07:45		32	18	83	105	**39**	18	171	118	254	223
08:00		22	23			31	24				
08:15		42	28			42	15				
08:30		15	18			24	10				
08:45		**31**	17	110	86	24	11	121	60	231	146
09:00		**18**	16			21	7				
09:15		**27**	18			28	13				
09:30		**42**	12			48	11				
09:45		22	11	109	57	22	12	119	43	228	100
10:00		19	12			25	11				
10:15		23	5			18	5				
10:30		18	6			39	15				
10:45		20	11	80	34	39	7	121	38	201	72
11:00		14	8			20	5				
11:15		21	6			19	7				
11:30		32	3			23	6				
11:45		48	3	115	20	32	2	94	20	209	40
Total		620	1394	620	1394	821	1324	821	1324	1441	2718
Combined Total		2014		2014		2145		2145		4159	
AM Peak	-	08:45	-	-	-	07:00	-	-	-	-	-
Vol.	-	118	-	-	-	171	-	-	-	-	-
P.H.F.		0.702				0.929					
PM Peak	-	-	04:30	-	-	-	05:30	-	-	-	-
Vol.	-	-	209	-	-	-	194	-	-	-	-
P.H.F.			0.816				0.770				
Percentage		30.8%	69.2%			38.3%	61.7%				
ADT/AADT		ADT 4,159		AADT 4,159							

ATTACHMENT D

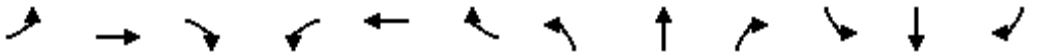
SYNCHRO HCM 6TH EDITION REPORTS



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	2	2	145	0	25	73	329	86	31	507	0
Future Volume (veh/h)	3	2	2	145	0	25	73	329	86	31	507	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	0.99		1.00	1.00		0.99	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	3	2	2	158	0	27	79	358	93	34	551	0
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	216	132	85	499	0	312	106	1141	507	57	1042	0
Arrive On Green	0.20	0.20	0.20	0.20	0.00	0.20	0.06	0.32	0.32	0.03	0.29	0.00
Sat Flow, veh/h	403	664	427	1556	0	1572	1781	3554	1580	1781	3647	0
Grp Volume(v), veh/h	7	0	0	158	0	27	79	358	93	34	551	0
Grp Sat Flow(s),veh/h/ln	1494	0	0	1556	0	1572	1781	1777	1580	1781	1777	0
Q Serve(g_s), s	0.0	0.0	0.0	0.0	0.0	0.5	1.7	2.9	1.6	0.7	4.9	0.0
Cycle Q Clear(g_c), s	3.0	0.0	0.0	3.0	0.0	0.5	1.7	2.9	1.6	0.7	4.9	0.0
Prop In Lane	0.43		0.29	1.00		1.00	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	433	0	0	499	0	312	106	1141	507	57	1042	0
V/C Ratio(X)	0.02	0.00	0.00	0.32	0.00	0.09	0.74	0.31	0.18	0.60	0.53	0.00
Avail Cap(c_a), veh/h	1760	0	0	1708	0	1659	1222	4219	1876	1222	4219	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	0.00	1.00	0.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	12.2	0.0	0.0	13.4	0.0	12.4	17.5	9.7	9.3	18.1	11.2	0.0
Incr Delay (d2), s/veh	0.0	0.0	0.0	0.4	0.0	0.1	9.8	0.2	0.2	9.8	0.4	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.0	0.0	0.0	1.0	0.0	0.2	0.9	0.8	0.4	0.4	1.5	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	12.2	0.0	0.0	13.7	0.0	12.5	27.4	9.9	9.5	27.9	11.6	0.0
LnGrp LOS	B	A	A	B	A	B	C	A	A	C	B	A
Approach Vol, veh/h		7			185			530			585	
Approach Delay, s/veh		12.2			13.5			12.4			12.6	
Approach LOS		B			B			B			B	

Timer - Assigned Phs	1	2		4	5	6		8				
Phs Duration (G+Y+Rc), s	6.2	18.2		13.5	7.3	17.1		13.5				
Change Period (Y+Rc), s	5.0	6.0		6.0	5.0	6.0		6.0				
Max Green Setting (Gmax), s	26.0	45.0		40.0	26.0	45.0		40.0				
Max Q Clear Time (g_c+I1), s	2.7	4.9		5.0	3.7	6.9		5.0				
Green Ext Time (p_c), s	0.1	2.8		0.0	0.2	4.0		1.0				

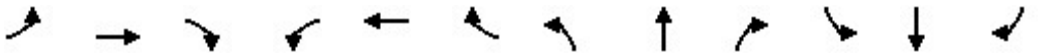
Intersection Summary			
HCM 6th Ctrl Delay		12.6	
HCM 6th LOS		B	



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	7	4	10	165	0	33	107	529	195	27	489	0
Future Volume (veh/h)	7	4	10	165	0	33	107	529	195	27	489	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	0.99		0.99	1.00		0.99	1.00		0.97	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	8	4	11	179	0	36	116	575	212	29	532	0
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	184	101	151	502	0	326	155	1222	527	49	1010	0
Arrive On Green	0.21	0.21	0.21	0.21	0.00	0.21	0.09	0.34	0.34	0.03	0.28	0.00
Sat Flow, veh/h	305	486	726	1556	0	1569	1781	3554	1534	1781	3647	0
Grp Volume(v), veh/h	23	0	0	179	0	36	116	575	212	29	532	0
Grp Sat Flow(s),veh/h/ln	1517	0	0	1556	0	1569	1781	1777	1534	1781	1777	0
Q Serve(g_s), s	0.0	0.0	0.0	0.0	0.0	0.8	2.6	5.1	4.3	0.7	5.1	0.0
Cycle Q Clear(g_c), s	3.6	0.0	0.0	3.6	0.0	0.8	2.6	5.1	4.3	0.7	5.1	0.0
Prop In Lane	0.35		0.48	1.00		1.00	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	435	0	0	502	0	326	155	1222	527	49	1010	0
V/C Ratio(X)	0.05	0.00	0.00	0.36	0.00	0.11	0.75	0.47	0.40	0.59	0.53	0.00
Avail Cap(c_a), veh/h	1636	0	0	1591	0	1554	1147	3959	1709	1147	3959	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	0.00	1.00	0.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	12.8	0.0	0.0	14.1	0.0	13.0	18.0	10.4	10.1	19.4	12.2	0.0
Incr Delay (d2), s/veh	0.0	0.0	0.0	0.4	0.0	0.1	7.0	0.3	0.5	10.9	0.4	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.2	0.0	0.0	1.2	0.0	0.2	1.2	1.5	1.1	0.4	1.6	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	12.9	0.0	0.0	14.5	0.0	13.1	25.0	10.7	10.6	30.3	12.6	0.0
LnGrp LOS	B	A	A	B	A	B	C	B	B	C	B	A
Approach Vol, veh/h		23			215			903			561	
Approach Delay, s/veh		12.9			14.3			12.5			13.5	
Approach LOS		B			B			B			B	

Timer - Assigned Phs	1	2		4	5	6		8				
Phs Duration (G+Y+Rc), s	6.1	19.9		14.4	8.5	17.5		14.4				
Change Period (Y+Rc), s	5.0	6.0		6.0	5.0	6.0		6.0				
Max Green Setting (Gmax), s	26.0	45.0		40.0	26.0	45.0		40.0				
Max Q Clear Time (g_c+I1), s	2.7	7.1		5.6	4.6	7.1		5.6				
Green Ext Time (p_c), s	0.0	5.1		0.1	0.3	3.8		1.1				

Intersection Summary			
HCM 6th Ctrl Delay		13.1	
HCM 6th LOS		B	



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	3	2	2	169	0	44	73	320	111	49	499	0
Future Volume (veh/h)	3	2	2	169	0	44	73	320	111	49	499	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	0.99		1.00	1.00		0.99	1.00		1.00	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	3	2	2	184	0	48	79	348	121	53	542	0
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	211	130	83	515	0	327	106	1075	478	80	1024	0
Arrive On Green	0.21	0.21	0.21	0.21	0.00	0.21	0.06	0.30	0.30	0.05	0.29	0.00
Sat Flow, veh/h	369	626	398	1573	0	1571	1781	3554	1580	1781	3647	0
Grp Volume(v), veh/h	7	0	0	184	0	48	79	348	121	53	542	0
Grp Sat Flow(s),veh/h/ln	1393	0	0	1573	0	1571	1781	1777	1580	1781	1777	0
Q Serve(g_s), s	0.0	0.0	0.0	0.0	0.0	1.0	1.7	2.9	2.2	1.1	4.9	0.0
Cycle Q Clear(g_c), s	3.5	0.0	0.0	3.5	0.0	1.0	1.7	2.9	2.2	1.1	4.9	0.0
Prop In Lane	0.43		0.29	1.00		1.00	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	424	0	0	515	0	327	106	1075	478	80	1024	0
V/C Ratio(X)	0.02	0.00	0.00	0.36	0.00	0.15	0.75	0.32	0.25	0.66	0.53	0.00
Avail Cap(c_a), veh/h	1711	0	0	1698	0	1644	1211	4182	1859	1211	4182	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	0.00	1.00	0.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	12.1	0.0	0.0	13.4	0.0	12.4	17.7	10.3	10.1	18.0	11.4	0.0
Incr Delay (d2), s/veh	0.0	0.0	0.0	0.4	0.0	0.2	10.0	0.2	0.3	8.9	0.4	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.0	0.0	0.0	1.1	0.0	0.3	0.9	0.9	0.6	0.6	1.5	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	12.1	0.0	0.0	13.8	0.0	12.6	27.7	10.5	10.3	26.9	11.9	0.0
LnGrp LOS	B	A	A	B	A	B	C	B	B	C	B	A
Approach Vol, veh/h		7			232			548			595	
Approach Delay, s/veh		12.1			13.5			12.9			13.2	
Approach LOS		B			B			B			B	

Timer - Assigned Phs	1	2		4	5	6		8				
Phs Duration (G+Y+Rc), s	6.7	17.6		14.0	7.3	17.0		14.0				
Change Period (Y+Rc), s	5.0	6.0		6.0	5.0	6.0		6.0				
Max Green Setting (Gmax), s	26.0	45.0		40.0	26.0	45.0		40.0				
Max Q Clear Time (g_c+I1), s	3.1	4.9		5.5	3.7	6.9		5.5				
Green Ext Time (p_c), s	0.1	2.8		0.0	0.2	3.9		1.2				

Intersection Summary			
HCM 6th Ctrl Delay		13.1	
HCM 6th LOS		B	

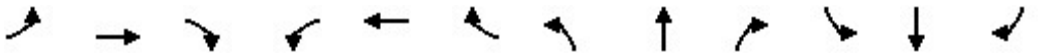
Intersection	
Int Delay, s/veh	1.2

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	119	43	0	170	43	0
Future Vol, veh/h	119	43	0	170	43	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	129	47	0	185	47	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	176	0	338	153
Stage 1	-	-	-	-	153	-
Stage 2	-	-	-	-	185	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1400	-	658	893
Stage 1	-	-	-	-	875	-
Stage 2	-	-	-	-	847	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1400	-	658	893
Mov Cap-2 Maneuver	-	-	-	-	658	-
Stage 1	-	-	-	-	875	-
Stage 2	-	-	-	-	847	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0	10.9
HCM LOS			B

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	658	-	-	1400	-
HCM Lane V/C Ratio	0.071	-	-	-	-
HCM Control Delay (s)	10.9	-	-	0	-
HCM Lane LOS	B	-	-	A	-
HCM 95th %tile Q(veh)	0.2	-	-	0	-



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Volume (veh/h)	7	4	10	189	0	52	107	520	220	45	481	0
Future Volume (veh/h)	7	4	10	189	0	52	107	520	220	45	481	0
Initial Q (Qb), veh	0	0	0	0	0	0	0	0	0	0	0	0
Ped-Bike Adj(A_pbT)	0.99		1.00	1.00		0.99	1.00		0.97	1.00		1.00
Parking Bus, Adj	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Work Zone On Approach		No			No			No			No	
Adj Sat Flow, veh/h/ln	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870	1870
Adj Flow Rate, veh/h	8	4	11	205	0	57	116	565	239	49	523	0
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92	0.92
Percent Heavy Veh, %	2	2	2	2	2	2	2	2	2	2	2	2
Cap, veh/h	161	94	129	477	0	383	155	1131	487	73	968	0
Arrive On Green	0.24	0.24	0.24	0.24	0.00	0.24	0.09	0.32	0.32	0.04	0.27	0.00
Sat Flow, veh/h	194	384	530	1268	0	1571	1781	3554	1532	1781	3647	0
Grp Volume(v), veh/h	23	0	0	205	0	57	116	565	239	49	523	0
Grp Sat Flow(s),veh/h/ln	1108	0	0	1268	0	1571	1781	1777	1532	1781	1777	0
Q Serve(g_s), s	0.1	0.0	0.0	0.1	0.0	1.2	2.7	5.5	5.4	1.2	5.4	0.0
Cycle Q Clear(g_c), s	6.7	0.0	0.0	6.7	0.0	1.2	2.7	5.5	5.4	1.2	5.4	0.0
Prop In Lane	0.35		0.48	1.00		1.00	1.00		1.00	1.00		0.00
Lane Grp Cap(c), veh/h	383	0	0	477	0	383	155	1131	487	73	968	0
V/C Ratio(X)	0.06	0.00	0.00	0.43	0.00	0.15	0.75	0.50	0.49	0.67	0.54	0.00
Avail Cap(c_a), veh/h	1436	0	0	1440	0	1468	1082	3735	1610	1082	3735	0
HCM Platoon Ratio	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Upstream Filter(I)	1.00	0.00	0.00	1.00	0.00	1.00	1.00	1.00	1.00	1.00	1.00	0.00
Uniform Delay (d), s/veh	12.5	0.0	0.0	14.8	0.0	12.7	19.1	11.8	11.8	20.2	13.3	0.0
Incr Delay (d2), s/veh	0.1	0.0	0.0	0.6	0.0	0.2	7.1	0.3	0.8	10.1	0.5	0.0
Initial Q Delay(d3),s/veh	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
%ile BackOfQ(50%),veh/ln	0.2	0.0	0.0	1.5	0.0	0.4	1.3	1.7	1.5	0.6	1.8	0.0
Unsig. Movement Delay, s/veh												
LnGrp Delay(d),s/veh	12.6	0.0	0.0	15.4	0.0	12.9	26.2	12.2	12.6	30.3	13.8	0.0
LnGrp LOS	B	A	A	B	A	B	C	B	B	C	B	A
Approach Vol, veh/h		23			262			920			572	
Approach Delay, s/veh		12.6			14.9			14.0			15.2	
Approach LOS		B			B			B			B	

Timer - Assigned Phs	1	2		4	5	6		8				
Phs Duration (G+Y+Rc), s	6.8	19.6		16.5	8.7	17.7		16.5				
Change Period (Y+Rc), s	5.0	6.0		6.0	5.0	6.0		6.0				
Max Green Setting (Gmax), s	26.0	45.0		40.0	26.0	45.0		40.0				
Max Q Clear Time (g_c+I1), s	3.2	7.5		8.7	4.7	7.4		8.7				
Green Ext Time (p_c), s	0.1	5.1		0.1	0.3	3.8		1.4				

Intersection Summary			
HCM 6th Ctrl Delay		14.5	
HCM 6th LOS		B	

Intersection	
Int Delay, s/veh	1

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	226	43	0	198	43	0
Future Vol, veh/h	226	43	0	198	43	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	-	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	246	47	0	215	47	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	293	0	485	270
Stage 1	-	-	-	-	270	-
Stage 2	-	-	-	-	215	-
Critical Hdwy	-	-	4.12	-	6.42	6.22
Critical Hdwy Stg 1	-	-	-	-	5.42	-
Critical Hdwy Stg 2	-	-	-	-	5.42	-
Follow-up Hdwy	-	-	2.218	-	3.518	3.318
Pot Cap-1 Maneuver	-	-	1269	-	541	769
Stage 1	-	-	-	-	775	-
Stage 2	-	-	-	-	821	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	1269	-	541	769
Mov Cap-2 Maneuver	-	-	-	-	541	-
Stage 1	-	-	-	-	775	-
Stage 2	-	-	-	-	821	-

Approach	EB	WB	NB
HCM Control Delay, s	0	0	12.3
HCM LOS			B

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	541	-	-	1269	-
HCM Lane V/C Ratio	0.086	-	-	-	-
HCM Control Delay (s)	12.3	-	-	0	-
HCM Lane LOS	B	-	-	A	-
HCM 95th %tile Q(veh)	0.3	-	-	0	-

ATTACHMENT E

DRIVEWAY CORNER SIGHT DISTANCE TRIANGLES

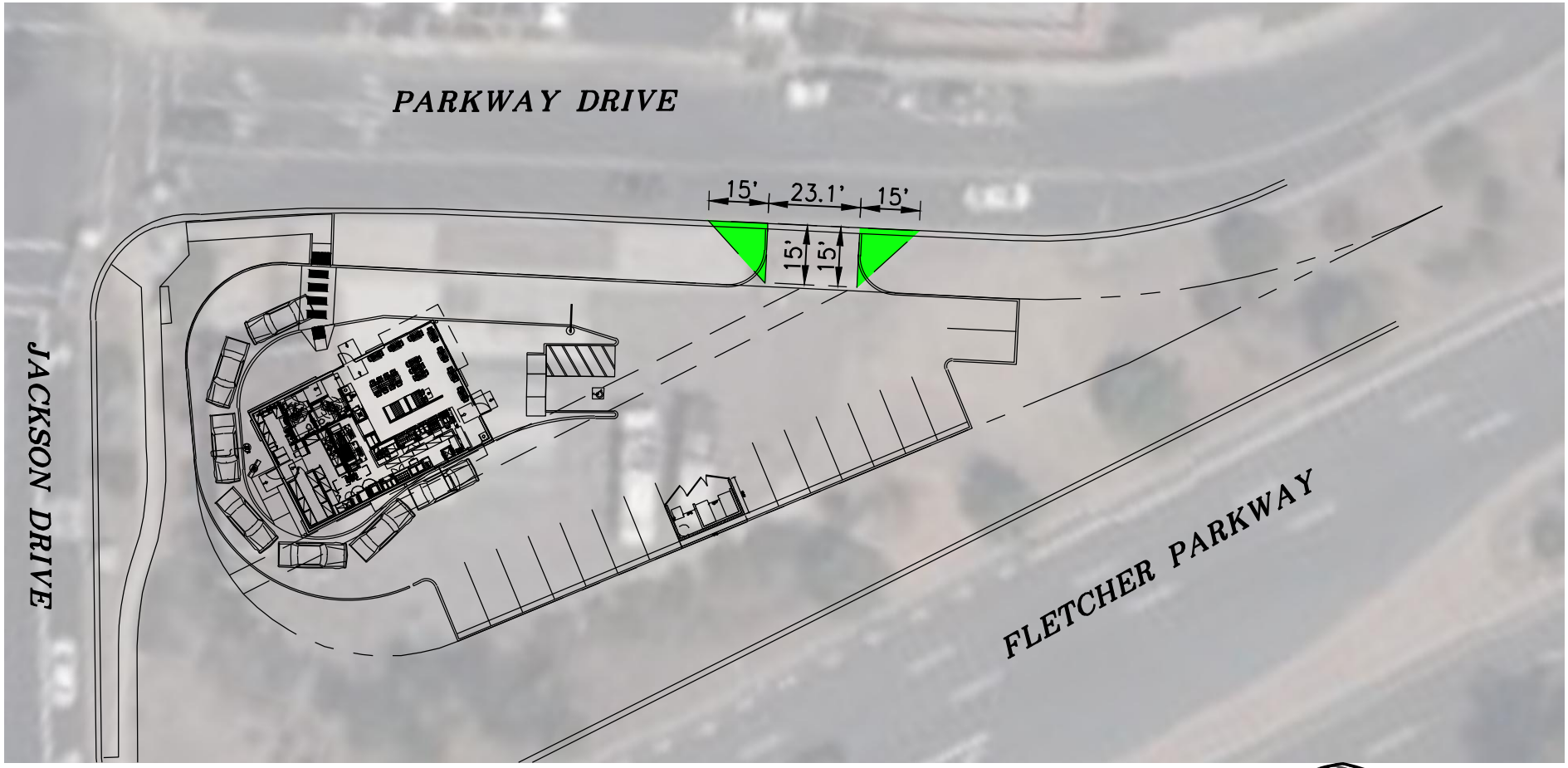
CORNER SIGHT DISTANCE (CSD) TRIANGLES

QDOBA LA MESA

CITY OF LA MESA

LA MESA **CALIFORNIA**

APRIL, 2023



100' 50' 0 100'

SCALE: 1" = 100'

VISIBLE AREA

LINE OF SIGHT

WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
3301 C St, Bldg. 100-B Tel 916.341.7760
Sacramento, CA 95816 Fax 916.341.7767

J:\4000-s\4152001_Qdoba_La_Mesa\Traffic\Exhibits\Qdoba_Proj_Dwy_Sight_Dist.dwg 5/3/2023 3:44 PM Taylor Roper

ATTACHMENT F

TURN RADII ANALYSIS

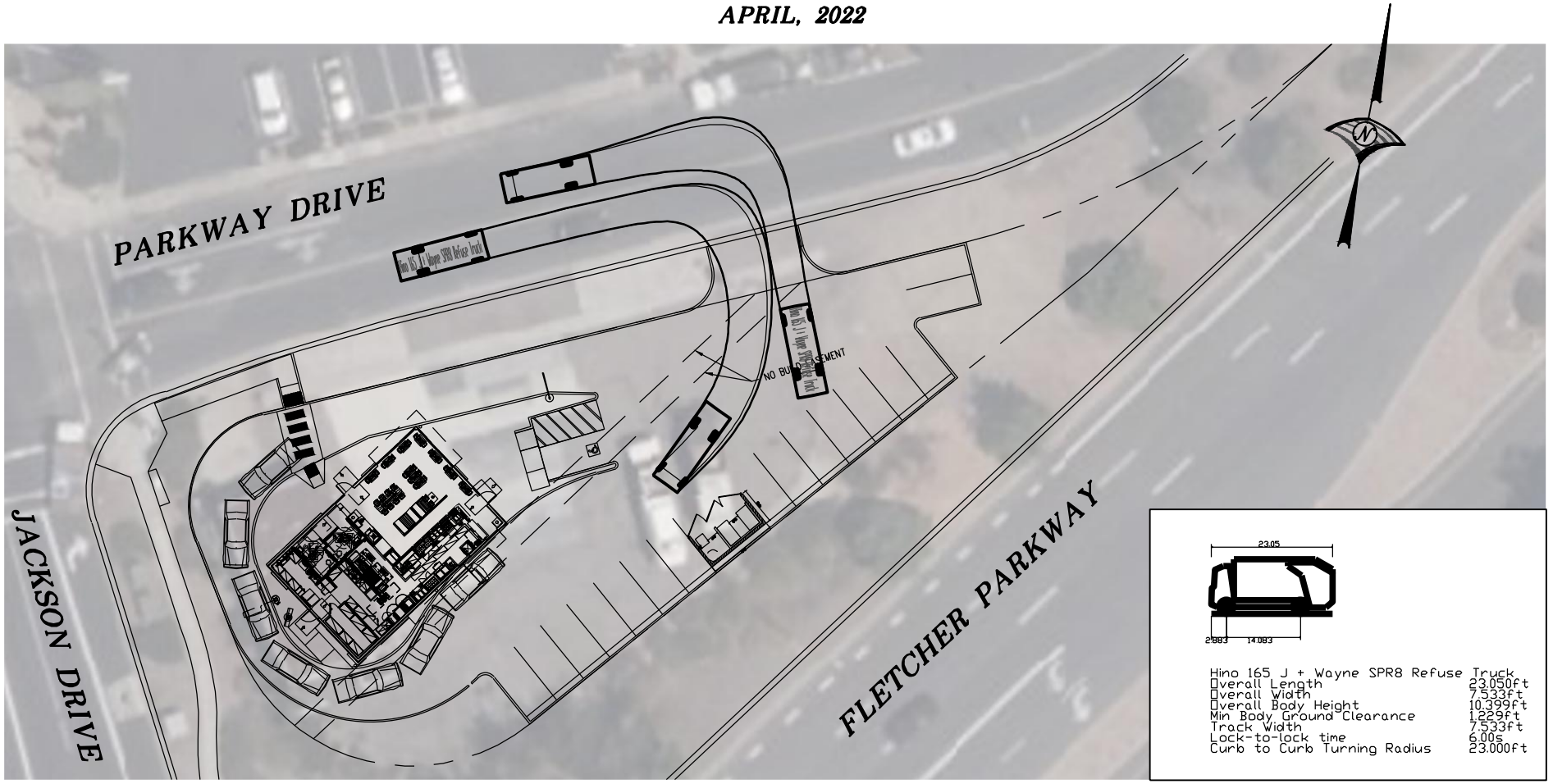
TRUCK TURN TEMPLATE

QDOBA LA MESA

CITY OF LA MESA

LA MESA **CALIFORNIA**

APRIL, 2022



Hino 165 J + Wayne SPR8 Refuse Truck	
Overall Length	23.050ft
Overall Width	7.533ft
Overall Body Height	10.399ft
Min Body Ground Clearance	1.229ft
Track Width	7.533ft
Lock-to-lock time	6.00s
Curb to Curb Turning Radius	23.000ft

40' 20' 0 40'

SCALE: 1" = 40'

WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
3301 C St, Bldg. 100-B Tel 916.341.7760
Sacramento, CA 95816 Fax 916.341.7767

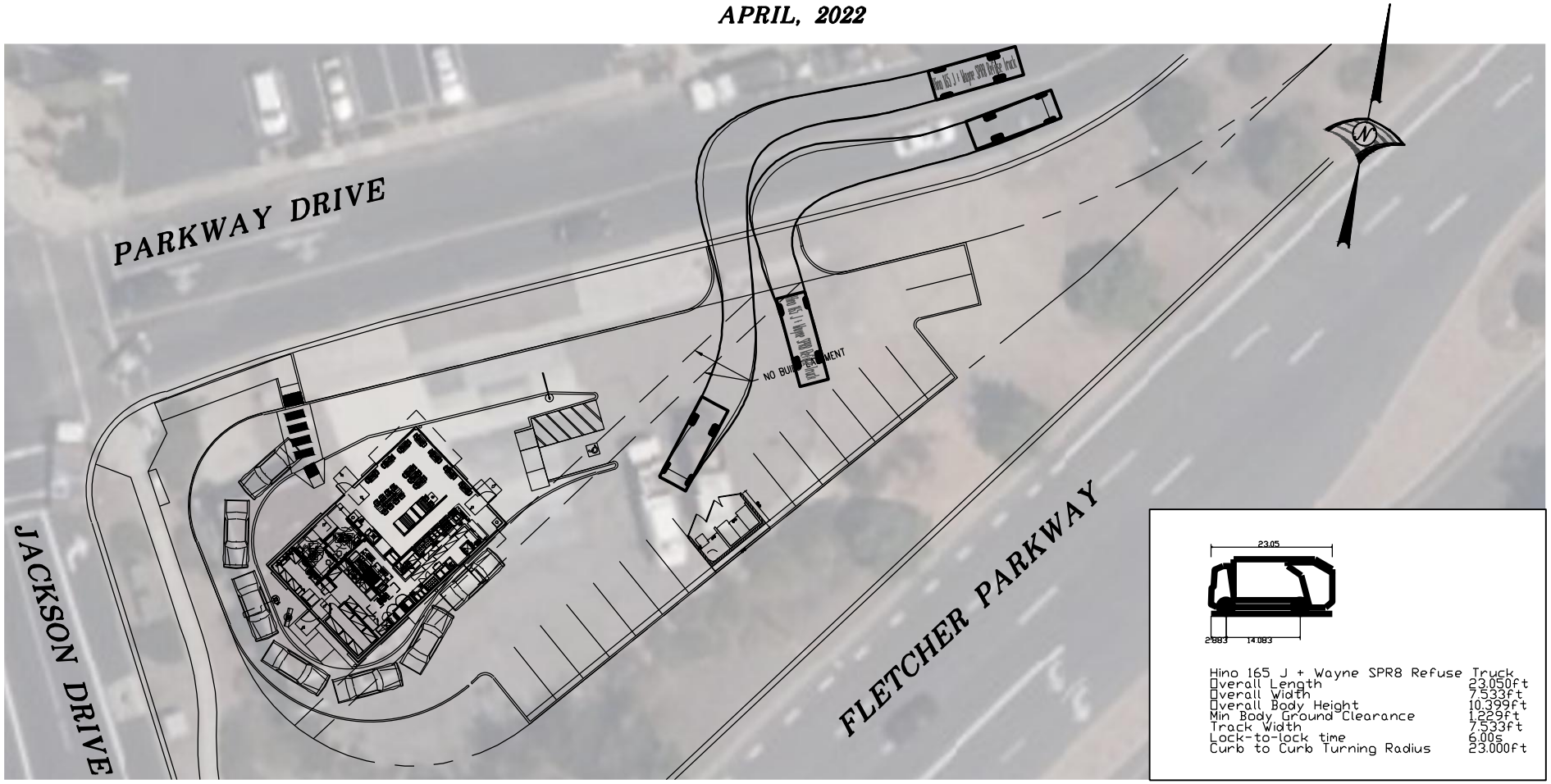
TRUCK TURN TEMPLATE

QDOBA LA MESA

CITY OF LA MESA

LA MESA **CALIFORNIA**

APRIL, 2022



Hino 165 J + Wayne SPR8 Refuse Truck	
Overall Length	23.050ft
Overall Width	7.533ft
Overall Body Height	10.399ft
Min Body Ground Clearance	1.229ft
Track Width	7.533ft
Lock-to-lock time	6.00s
Curb to Curb Turning Radius	23.000ft

40' 20' 0 40'

SCALE: 1" = 40'

WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
3301 C St, Bldg. 100-B Tel 916.341.7760
Sacramento, CA 95816 Fax 916.341.7767

ATTACHMENT G

DRIVE-THROUGH QUEUEING DATA

DRIVE THRU SURVEY

LOCATION: Chick-Fil-A, 8200 Parkway Drive
CITY: La Mesa, CA

DAY: 2/17/2022
DATE: Thursday

TIME	PickUp Window To Order Board	Order Board to DT Entrance	DT Entrance into Street	**TOTAL**
11:00	5	2	0	**7**
11:05	5	1	0	**6**
11:10	8	6	0	**14**
11:15	9	7	1	**17**
11:20	8	6	2	**16**
11:25	10	6	0	**16**
11:30	9	7	2	**18**
11:35	10	7	2	**19**
11:40	7	3	0	**10**
11:45	6	3	0	**9**
11:50	8	4	0	**12**
11:55	8	5	0	**13**
12:00	9	4	0	**13**
12:05	10	5	0	**15**
12:10	9	4	0	**13**
12:15	8	3	1	**12**
12:20	10	7	1	**18**
12:25	10	4	0	**14**
12:30	10	8	7	**25**
12:35	9	8	3	**20**
12:40	10	8	6	**24**
12:45	10	8	10	**28**
12:50	8	8	11	**27**
12:55	10	8	5	**23**
13:00	9	8	6	**23**

Counts Unlimited, Inc.
PO Box 1178
Corona, CA 92878
951-268-6268

DRIVE THRU SURVEY

LOCATION: Vallarta Express, 5341 Jackson Drive
CITY: La Mesa, CA

DAY: 2/17/2022
DATE: Thursday

TIME	PickUp Window To Order Board	Order Board to DT Entrance	DT Entrance into Street	**TOTAL**
11:00	0	0	0	**0**
11:05	0	0	0	**0**
11:10	1	0	0	**1**
11:15	2	0	0	**2**
11:20	0	0	0	**0**
11:25	3	0	0	**3**
11:30	1	0	0	**1**
11:35	1	1	0	**2**
11:40	3	0	0	**3**
11:45	0	0	0	**0**
11:50	0	0	0	**0**
11:55	0	0	0	**0**
12:00	2	1	0	**3**
12:05	4	2	0	**6**
12:10	4	3	0	**7**
12:15	2	1	0	**3**
12:20	4	2	0	**6**
12:25	4	3	0	**7**
12:30	3	0	0	**3**
12:35	4	1	0	**5**
12:40	4	3	0	**7**
12:45	3	1	0	**4**
12:50	1	0	0	**1**
12:55	1	0	0	**1**
13:00	1	1	0	**2**

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DRIVE THRU SURVEY

LOCATION: Starbucks, 6140 Lake Murray Blvd
CITY: La Mesa, CA

DAY: 2/17/2022
DATE: Thursday

TIME	PickUp Window To Order Board	Order Board to DT Entrance	DT Entrance into Street	**TOTAL**
7:00	2	2	0	**4**
7:05	1	3	0	**4**
7:10	1	3	0	**4**
7:15	2	1	0	**3**
7:20	1	3	0	**4**
7:25	3	3	0	**6**
7:30	3	0	0	**3**
7:35	3	4	1	**8**
7:40	2	4	2	**8**
7:45	4	4	0	**8**
7:50	2	4	3	**9**
7:55	5	4	3	**12**
8:00	5	4	1	**10**
8:05	5	3	2	**10**
8:10	6	3	3	**12**
8:15	5	3	0	**8**
8:20	3	3	0	**6**
8:25	3	3	3	**9**
8:30	3	2	0	**5**
8:35	4	4	0	**8**
8:40	4	3	3	**10**
8:45	3	4	0	**7**
8:50	3	2	0	**5**
8:55	2	2	0	**4**
9:00	4	2	0	**6**

Counts Unlimited, Inc.
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951-268-6268

ATTACHMENT H

PROJECT DRIVE-THROUGH QUEUEING

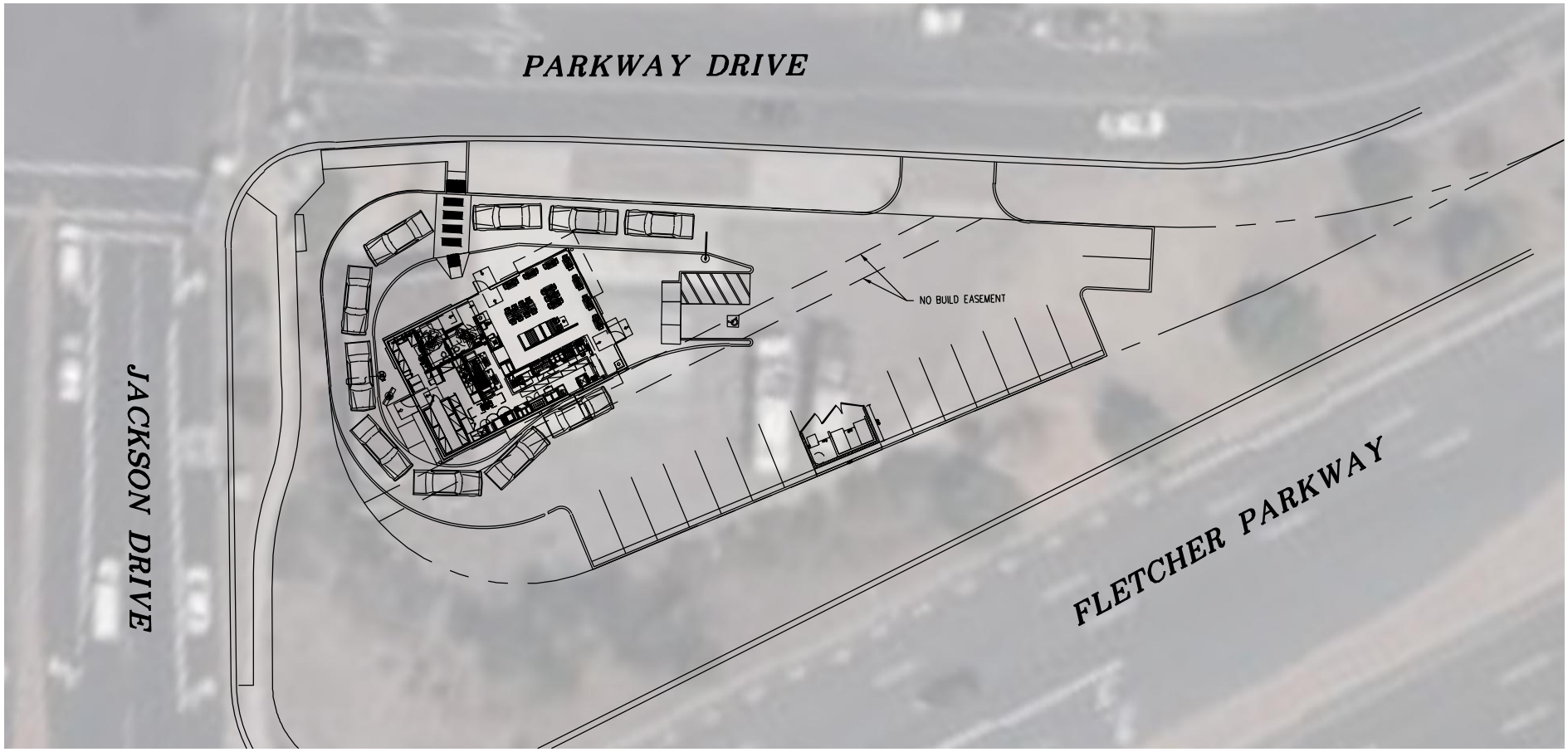
DRIVE-THROUGH QUEUEING

QDOBA LA MESA

CITY OF LA MESA

LA MESA **CALIFORNIA**

APRIL, 2022



40' 20' 0 40'

SCALE: 1" = 40'

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Sacramento, CA 95816 Fax 916.341.7767