

TRANSPORTATION IMPACT STUDY

FOR

JUNIPER RIDGE SUBDIVISION

34011 & 34017 NW 9TH AVENUE

LA CENTER, WASHINGTON



1/31/2025

PREPARED BY

KELLY ENGINEERING

January 2025

TRANSPORTATION IMPACT STUDY

Juniper Ridge Subdivision

City of La Center, Washington

January 31, 2025

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TRANSPORTATION IMPACT STUDY

JUNIPER RIDGE SUBDIVISION

January 31, 2025

INTRODUCTION

A transportation impact study (TIS) for the Juniper Ridge Subdivision was conducted to determine the potential traffic related impacts of the development to the surrounding roadway system. The development will consist of a 67 lot subdivision. Two existing homes will be demolished. The site is located at 34011 and 34017 NW 9th Avenue (Tax Lots 258944-000 and 258945-000) in La Center, Washington. The zoning designation for the 24.94 acre site is LDR-7.5 (Low Density Residential).

Land uses within the vicinity of the site consist of single family homes. A vicinity map, aerial photograph, existing conditions map and preliminary plat are shown in Figures 1a, 1b, 1c and 1d.

Roadway Characteristics

The site access will be onto Pacific Highway through W F Place and W D Avenue. Pacific Highway has sidewalks and one travel lane in each direction. There are no bike lanes. The roadway is classified as a Major Arterial. The posted speed limit is 25 mph.

The study area intersections are controlled by stop signs on the minor street approaches. The W 5th Street/Pacific Highway intersection is an all way stop sign controlled intersection and the W 4th Street/Pacific Highway intersection is controlled by a roundabout.

Traffic Volumes

The traffic counts in this report were conducted from 7:00 to 9:00 am and 4:00 to 6:00 pm during May 2024 and January 2025. The traffic counts were conducted to determine the peak hours. The peak hour at an intersection is the one hour time period when traffic on the adjacent streets are the highest and congestion is most likely to occur. The existing traffic volumes are shown in Figures 3a and 3b. The raw traffic count data is included in Appendix A.

Trip Generation/Distribution

The Juniper Ridge Subdivision will generate approximately 551 new trips per day. A trip is a one directional vehicle movement. 39 new trips will occur during the AM peak hour and 51 new trips will occur during the PM peak hour, ITE Trip Generation Manual, 11th edition. Credits were given for two existing homes to be demolished. The trip generation rates are shown in Table 1.

Table 1
Site Traffic Generation

Land Use	ITE code	Dwelling Units	Daily Trips	AM Peak Hour Trips	PM Peak Hour Trips
<i>Proposed</i> Single Family Detached Homes	210	39	368	27 (in-7, out-20)	37 (in-23, out-14)
<i>Proposed</i> Single Family Attached Homes	215	28	202	13 (in-4, out-9)	16 (in-9, out-7)
<i>Total</i>		67	570	40 (in-11, out-29)	53 (in-32, out-21)
<i>Existing</i> Single Family Detached Homes	210	2	19	1 (in-0, out-1)	2 (in-1, out-1)
TOTAL			551	39 (in-11, out-28)	51 (in-31, out-20)

The directional distribution of traffic generated by the development was assigned to the study area intersections. The distribution was based on the existing traffic volumes and previous traffic studies conducted in the area. The site traffic distribution and assignment diagrams are shown in Figures 6a and 6b.

Year 2028 Traffic Volumes

The year 2028 traffic volumes included a 2.0 percent per year compounded growth factor over the existing traffic volumes and in-process traffic. In-process traffic is traffic from developments that have been approved, but are not generating full build out traffic volumes. The in-process traffic was obtained from the City of La Center and is shown in Figures 4a, 4b and Appendix C. The in-process traffic for the Minit Management development was obtained from Charbonneau Engineering LLC. The in-process traffic included traffic from the Minit Management development, La Center Retail Mix, Aspen Avenue Subdivision, Asa's View Subdivision, Larsen Drive Subdivision and Vineyard Vista Subdivision.

The year 2028 traffic volumes without the project are shown in Figures 5a and 5b. The year 2028 traffic volumes with the project are shown in Figures 7a and 7b.

Peak Hour Traffic Operations

The scope of the TIS was based on correspondence with representatives from the City of La Center. Based on the correspondence an analysis was conducted at the following intersections during the weekday AM and PM peak hours:

- (1) Pacific Highway & W D Avenue
- (2) Pacific Highway & W 10th Street
- (3) Pacific Highway & W 5th Street
- (4) Pacific Highway & W 4th Street
- (5) La Center Road & Timmen Road
- (6) La Center Road & Paradise Park Road

The study area intersections were analyzed to determine existing, year 2028 without and year 2028 with project conditions. The assumption was made that the Juniper Ridge Subdivision will be built out and occupied within a three year time period.

The intersection operational analysis was conducted using the procedures in the 2010 Highway Capacity Manual. These procedures describe the operation of an intersection in terms of its level of service (LOS). The LOS criteria ranges from "A", which indicates little, if any, delay to "F", which indicates that vehicles experience very long delays. The LOS criteria with the corresponding delay in seconds per vehicle is shown in Table 2. The capacity analysis summary is shown in Table 3 on page 4.

Table 2
Level of Service Criteria

Level of Service (LOS)	A	B	C	D	E	F
<i>Unsignalized intersections</i>						
Average Delay (seconds per vehicle)	≤10	>10 - 15	>15 - 25	>25 - 35	>35 - 50	>50

Table 3
Capacity Analysis Summary

	AM Peak Hour		PM Peak Hour	
	LOS	Delay (sec/veh)	LOS	Delay (sec/veh)
<i>Pacific Highway & W D Avenue</i>				
Existing	B	10.8	B	12.6
Year 2028 w/o Project	B	11.5	B	14.1
Year 2028 with Project	B	12.1	B	15.0
<i>Pacific Highway & W 10th Street</i>				
Existing	B	11.2	C	15.3
Year 2028 w/o Project	B	10.5	C	15.9
Year 2028 with Project	B	10.7	C	16.6
<i>Pacific Highway & W 5th Street</i>				
Existing	B	13.1	C	19.3
Year 2028 w/o Project	B	14.3	C	24.2
Year 2028 with Project	C	15.0	D	25.5
<i>Pacific Highway & W 4th Street</i>				
Existing	A	12.9	A	4.5
Year 2028 w/o Project	C	22.2	A	6.8
Year 2028 with Project	C	24.9	A	7.2
<i>La Center Road & Timmen Road</i>				
Existing	C	18.7	C	19.7
Year 2028 w/o Project	D	27.6	E	46.8
Year 2028 with Project	D	28.8	E	49.4
<i>La Center Road & Paradise Park Road</i>				
Existing	D	25.4	E	45.4
Year 2028 w/o Project	E	46.1	F	154.7
Year 2028 with Project	E	48.7	F	215.5

The City of La Center has adopted LOS “E” as the minimum acceptable performance at city intersections for stop controlled intersections. Based on the results of the capacity analysis this LOS will be met with build out of the Juniper Ridge Subdivision with the exception of the NW Paradise Park Road/NW La Center Road intersection. This intersection is projected to operate at LOS “F” during the PM peak hour. The LOS is attributed to build out of the Minit Management development and recently approved projects in the area. The LOS computer printouts are included in Appendix D.

Pedestrian/Bicycle/Transit Considerations

Minimal pedestrian and no bicycle activities were observed during field observations within the vicinity of the site. There are no existing or planned bike lanes. The site is not served by public transit service.

Sight Distance

Sight distance was measured at the intersection of Pacific Highway at W D. Avenue. The measured intersection sight distance was over 280 feet when looking towards the west and east. Based on the criteria in AASHTO, A Policy on Geometric Design of Highways and Streets, 2011 and the posted speed limit of 25 mph on Pacific Highway the recommended intersection sight distance is 280 feet. Therefore, the sight distance requirement is met.

Turn Lanes

A left turn lane improves safety and increases the capacity of the roadway by reducing the speed differential between the through and left turning vehicles. No additional turn lanes are required as based on the WSDOT guidelines.

Transportation Improvements

Staff from the City of La Center have indicated discussions about a roundabout at the Paradise Park Road/La Center Road intersection. A roundabout at the Timmen Road/La Center Road intersection was also mentioned and is TIF eligible.

Traffic Signal Warrant Analysis

A traffic signal warrant analysis using the tables and charts from the 2009 Manual on Uniform Traffic Control Devices (MUTCD) was conducted at the NW Paradise Park Road/NW La Center Road intersection. This intersection is projected to operate at LOS “F” with build out of the Minit Management development and other recently approved projects in the area. The signal warrant analysis was based on the year 2028 traffic conditions with project. Based on the traffic signal warrant analysis a traffic signal is justified at the intersection. The signal warrant analysis is shown in Table 4.

Table 4
Traffic Signal Warrant Analysis
Paradise Park Road/La Center Road, Year 2028 with Project Conditions, PM Peak hour

MUTCD Traffic Signal Warrant	Required Volumes (Veh./Hr.)		Projected Volumes (Veh./Hr.)		Warrant Met
	Major Street	Minor Street	Major Street	Minor Street	
1. Condition A – Minimum Vehicular Volume (1)	500	200	1637 (1)	147 (1)	NO
2. Condition B – Interruption of Continuous Traffic (1)	750	100	1637 (1)	147 (1)	YES
3. Peak Hour	Figure 4C-3. Warrant 3, (MUTCD)				YES

(1) Warrant met if 1A or 1B is met.

Collision Data

Collision data was obtained from the Washington State Department of Transportation (WSDOT) for the most recent three years of available data. Based on the available data the calculated accident rates do not exceed 1.0 accidents per MEV (million entering vehicles) that usually identifies an intersection with a high accident rate. The collision data is shown in Table 5 and Appendix B.

Table 5
Collision Data

Intersection	Number of Collisions	Collision Type			Rate*
		Rear End	Angle	Other	
Pacific Highway & W D Ave.	1	1			0.2
Pacific Highway & W 10 th St.	1			1	0.9
Pacific Highway & W. 5 th St.	1				0.1
Pacific Highway & W. 4 th St.	2			2	0.1
NW La Center Rd. & NW Timmen Rd.	4		2	2	0.3
NW La Center Rd. & Paradise Park Rd.	1			1	0.1

* accident rate per MEV (million entering vehicles)

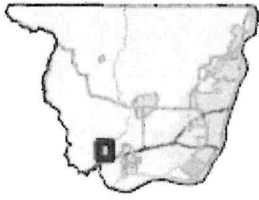
CONCLUSIONS AND RECOMMENDATIONS

The Juniper Ridge Subdivision is anticipated to generate 40 trips during the AM peak hour and 53 trips during the PM peak hour. A trip is a one-directional vehicle movement. This is based on a development consisting of 67 single family homes.

All of the study area intersections are projected to operate at acceptable levels in the year 2028 with the exception of the NW Paradise Park Road/NW La Center Road intersection. This intersection is projected to operate at LOS "F" during the PM peak hour for vehicles approaching NW La Center Road from the north. This will occur with build out of the Minit Management development and other recently approved projects in the area. The failing condition would be mitigated by installing a roundabout or traffic signal.

The NW Paradise Park Road/NW La Center Road and NW Timmen Road/NW La Center Road intersections are both under consideration to be reconstructed as roundabouts. However, justification for a roundabout is currently met at only the NW Paradise Park Road/NW La Center Road intersection.

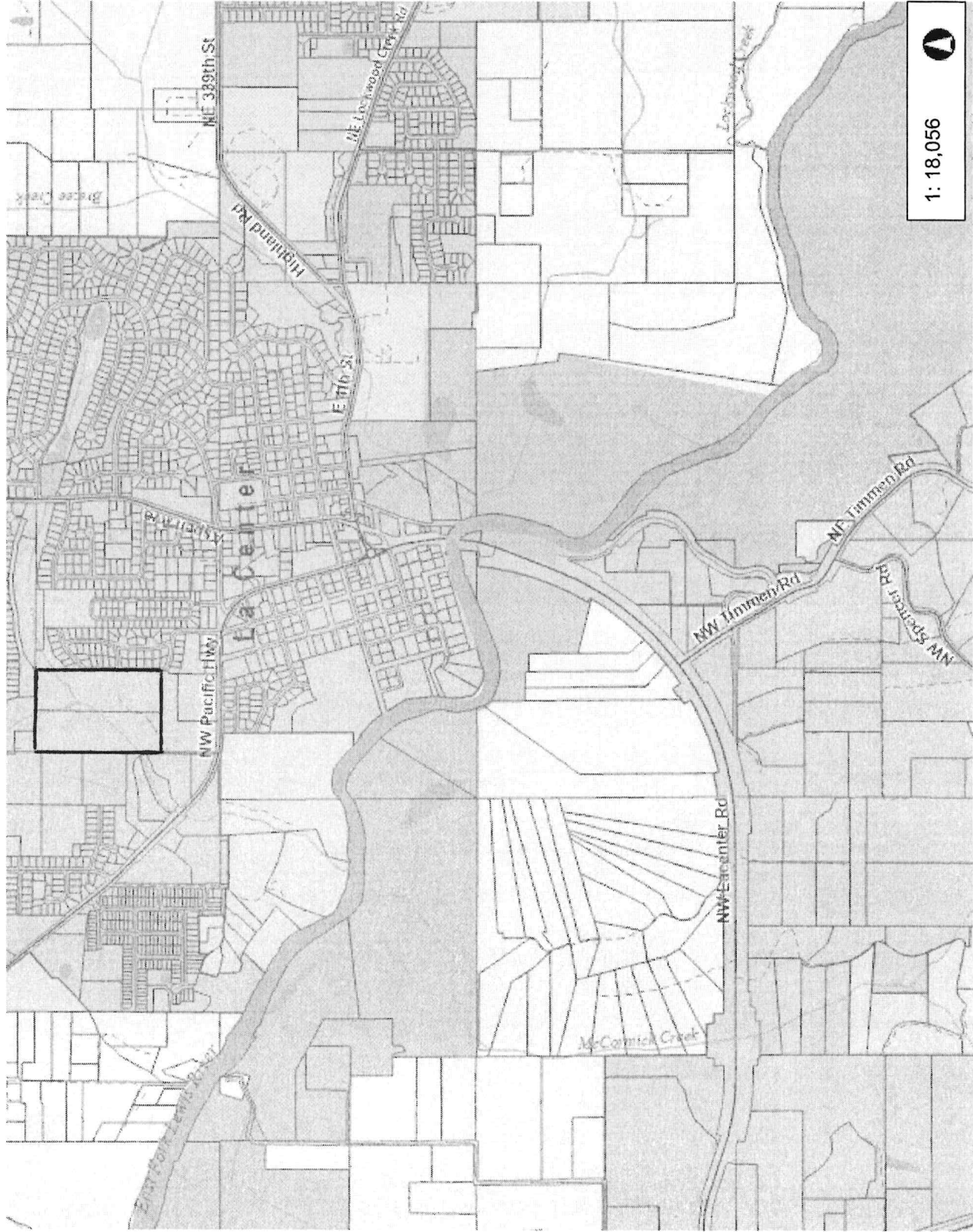
No additional transportation improvements or traffic control devices were identified to accommodate the development.



Legend

□ Taxlots

Notes:



1:18,056

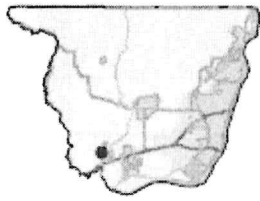


This map was generated by Clark County's "MapsOnline" website. Clark County does not warrant the accuracy, reliability or timeliness of any information on this map, and shall not be held liable for losses caused by using this information. Taxlot (i.e., parcel) boundaries cannot be used to determine the location of property lines on the ground.

3,009.3 0 1,504.67 3,009.3 Feet

WGS 1984 Web_Mercator_Auxiliary_Sphere
Clark County, WA. GIS - <http://gis.clark.wa.gov>

FIGURE 1a



Legend

- Building Footprints
- Taxlots

Notes:



1: 4,514



752.3 0 376.17 752.3 Feet

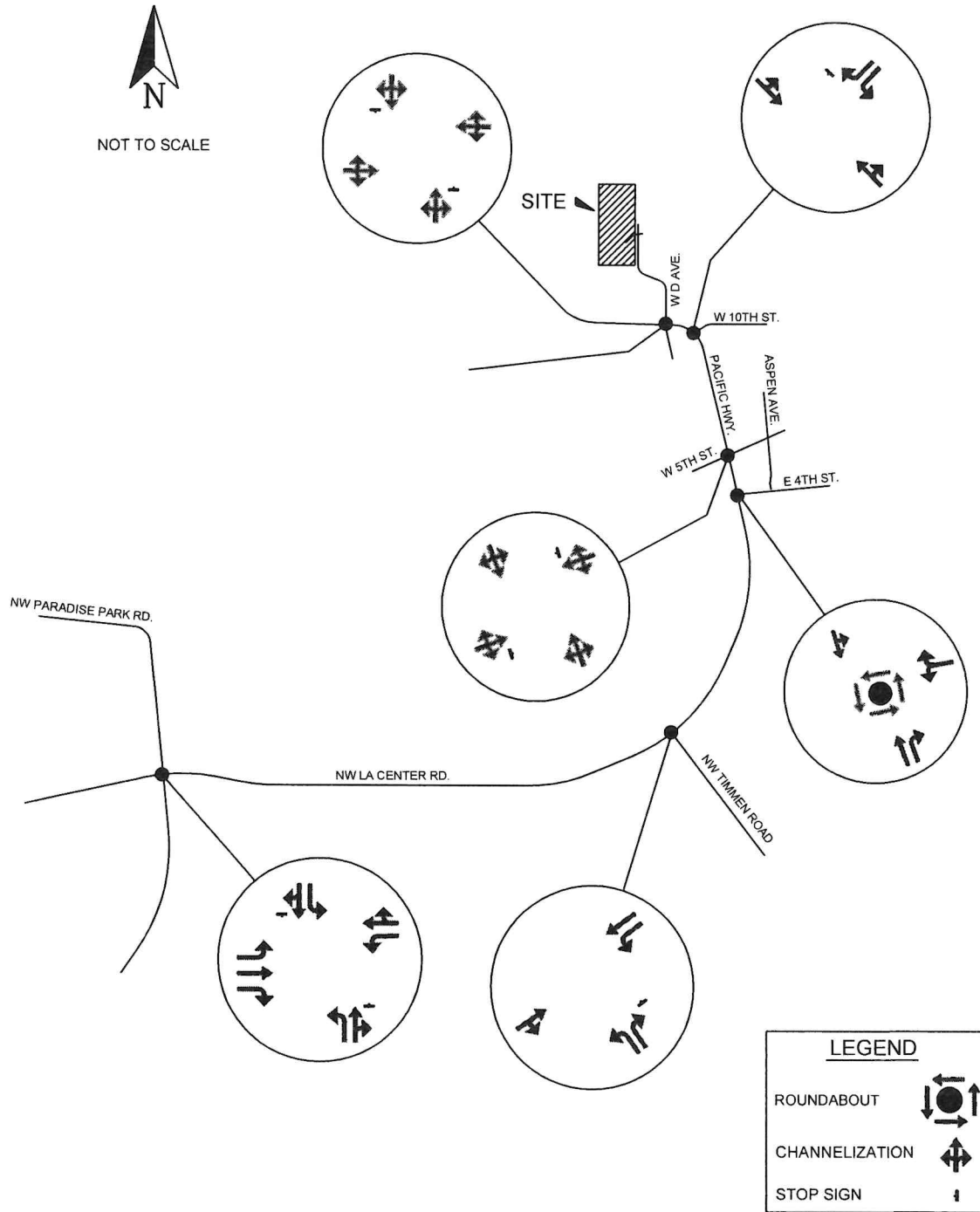
This map was generated by Clark County's "MapsOnline" website. Clark County does not warrant the accuracy, reliability or timeliness of any information on this map, and shall not be held liable for losses caused by using this information. Taxlot (i.e., parcel) boundaries cannot be used to determine the location of property lines on the ground.

WGS_1984_Web_Mercator_Auxiliary_Sphere
Clark County, WA, GIS - <http://gis.clark.wa.gov>

FIGURE 1b

FIGURE 1c

FIGURE 1d



EXISTING CONDITIONS

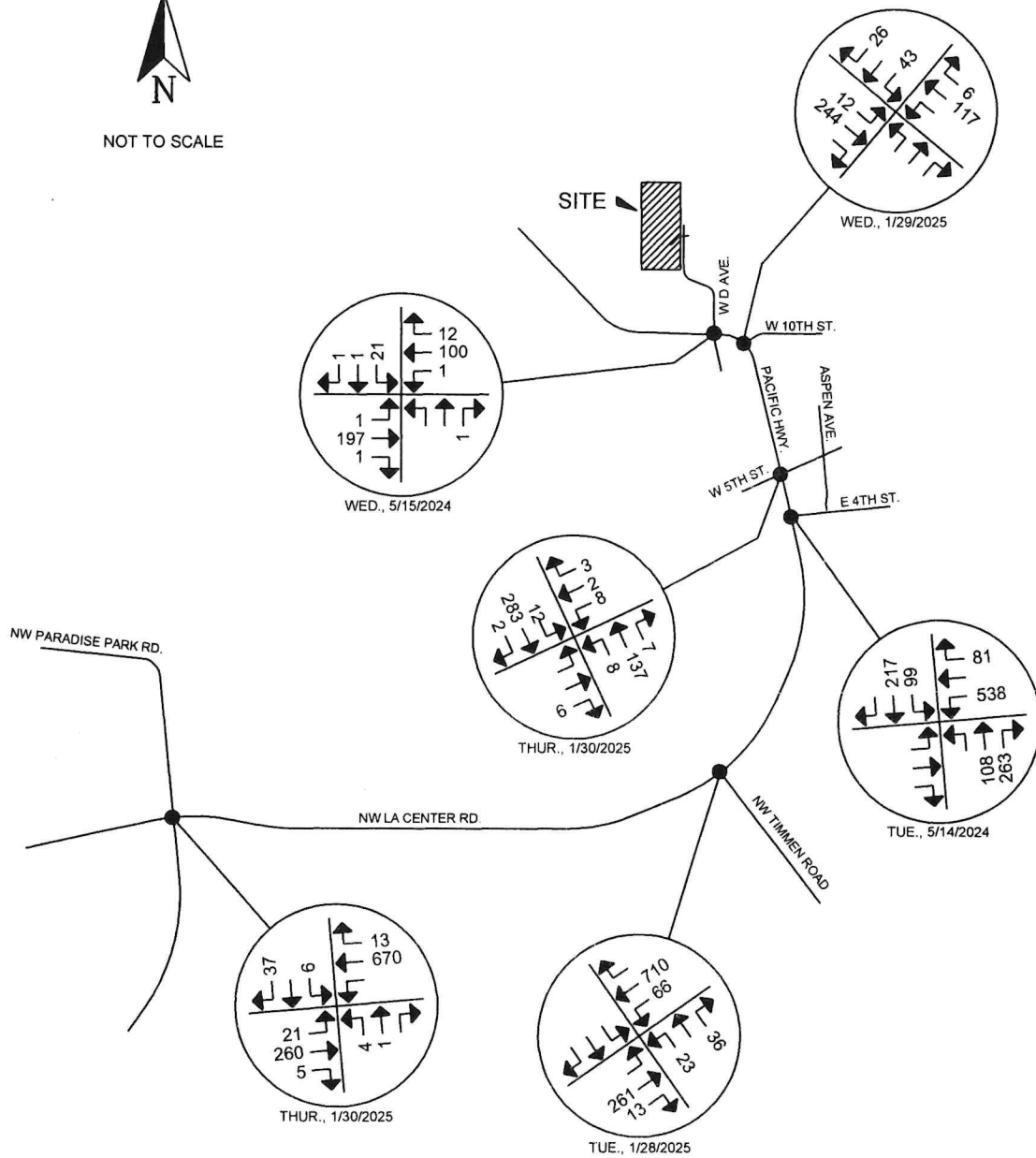
JUNIPER RIDGE SUBDIVISION

FIGURE 2
LANE CONFIGURATIONS

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NOT TO SCALE



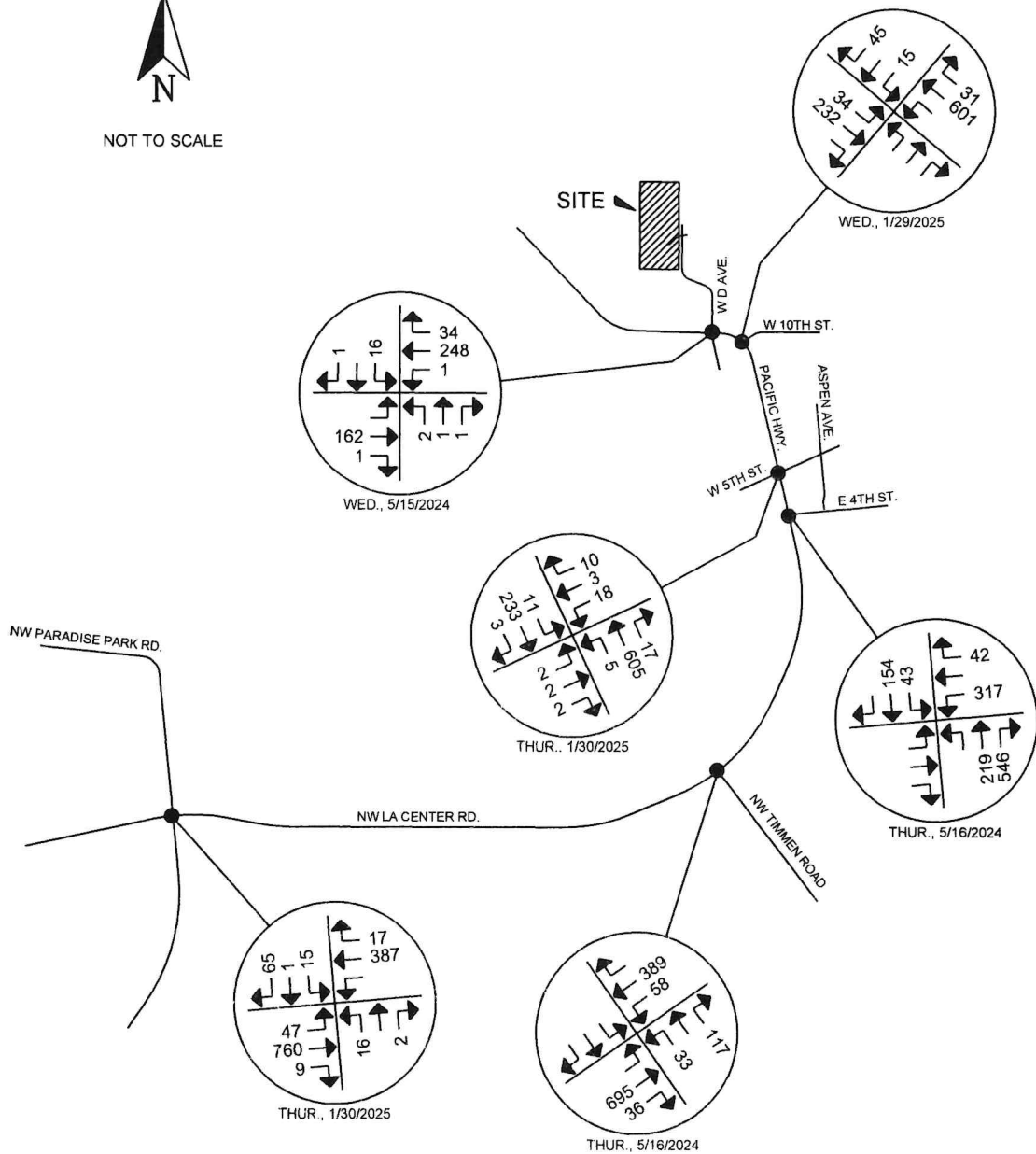
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FIGURE 3a
EXISTING TRAFFIC VOLUMES
AM PEAK HOUR

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Phone: 360-433-7530



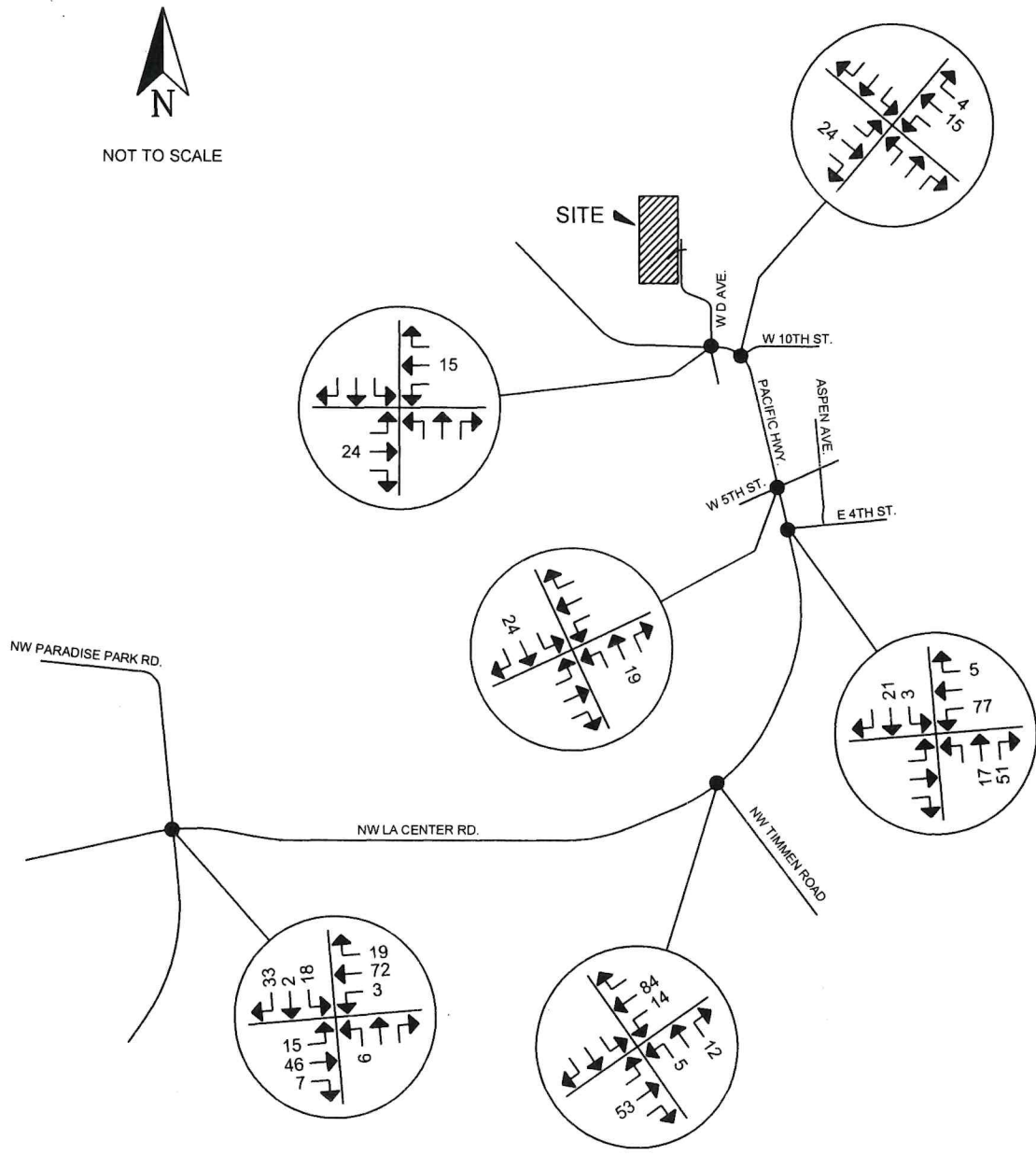
NOT TO SCALE



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FIGURE 3b
EXISTING TRAFFIC VOLUMES
PM PEAK HOUR

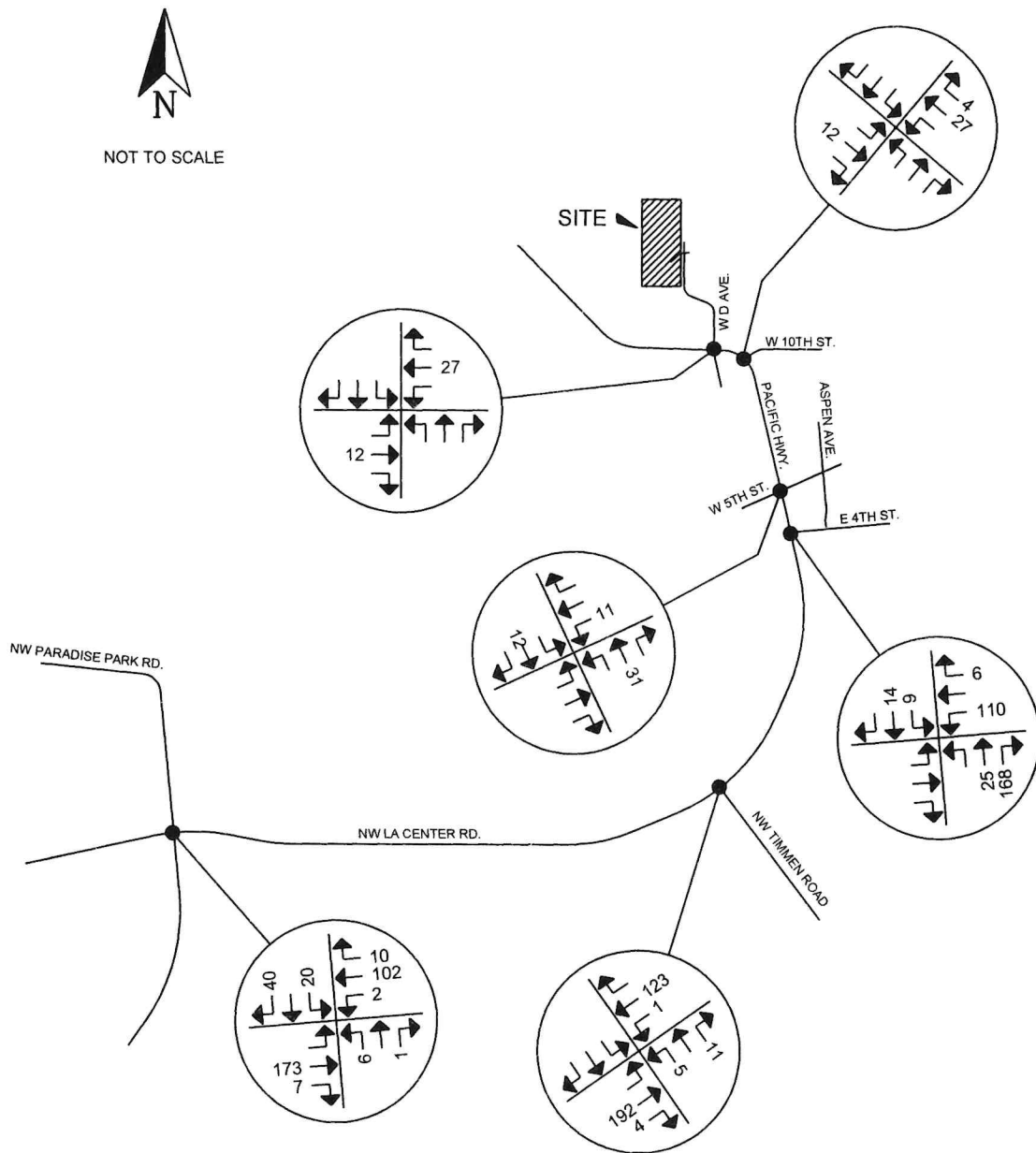
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FIGURE 4a
IN-PROCESS TRAFFIC
AM PEAK HOUR

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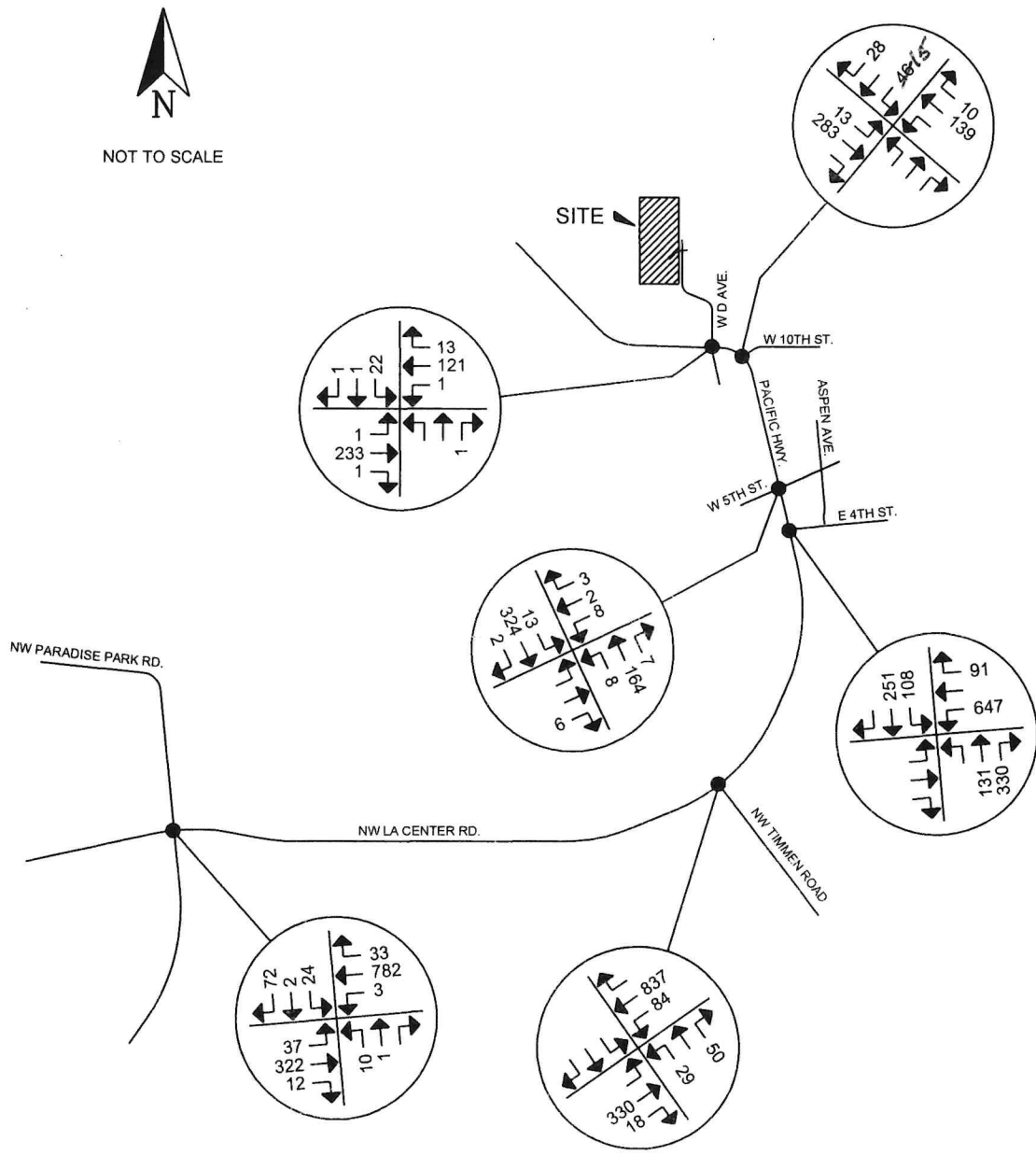
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FIGURE 4b
IN-PROCESS TRAFFIC
PM PEAK HOUR

KELLY ENGINEERING

1805 NE 94th St. No. 19, Vancouver, WA 98665

Phone: 360-433-7530



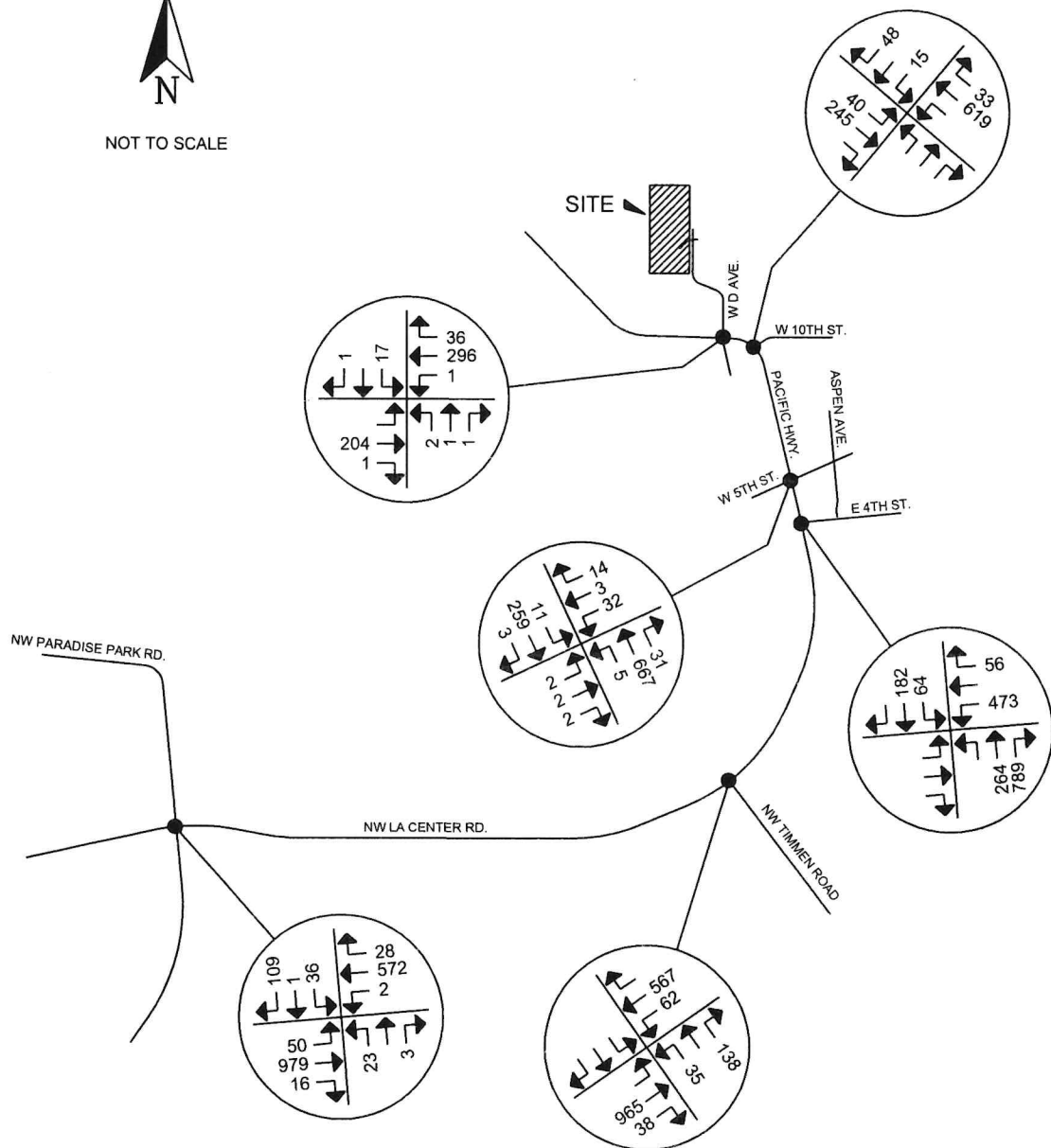
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FIGURE 5a
YEAR 2028 TRAFFIC VOLUMES
W/O PROJECT, AM PEAK HOUR

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 Phone: 360-433-7530



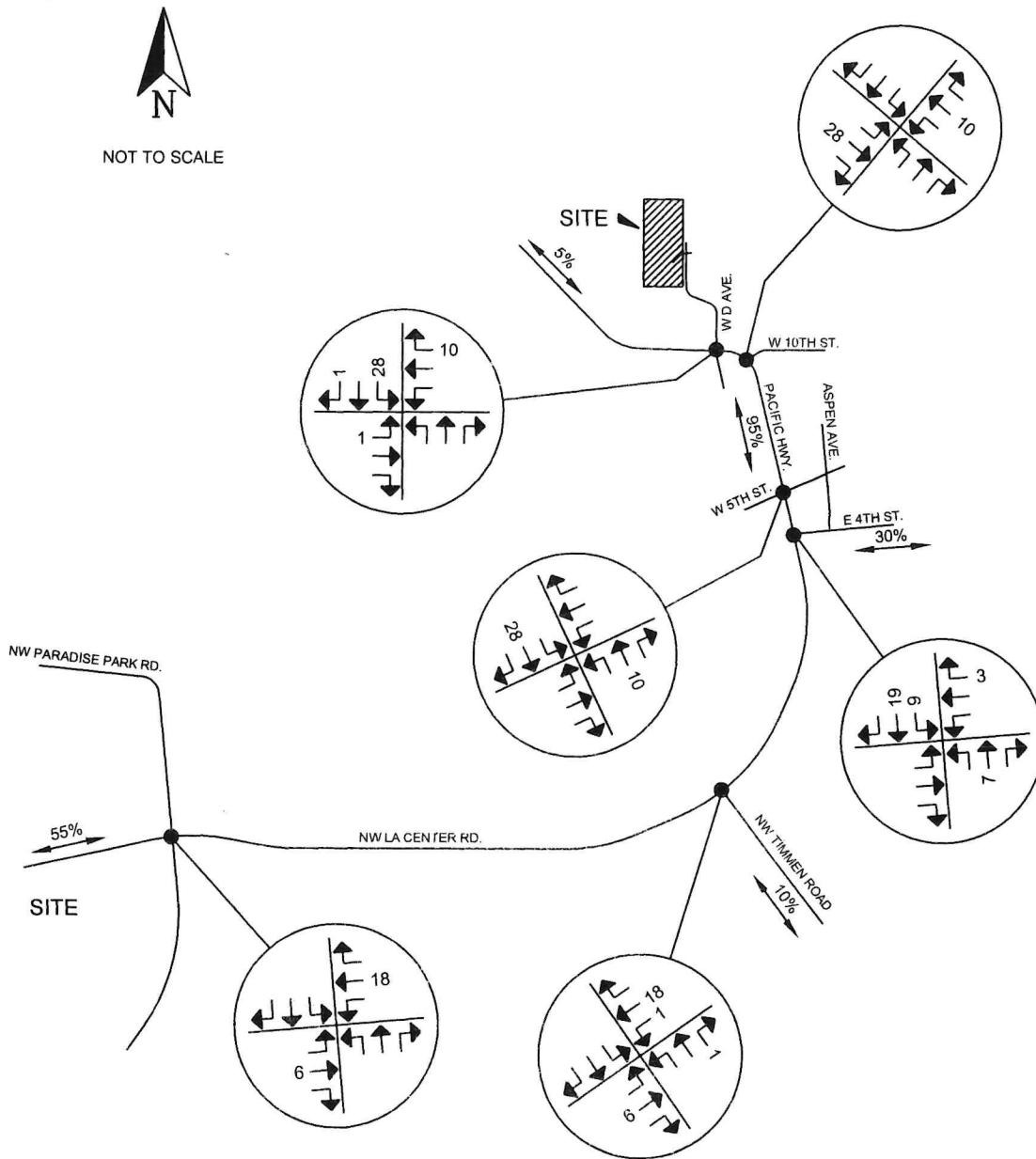
NOT TO SCALE



JUNIPER RIDGE SUBDIVISION

FIGURE 5b
YEAR 2028 TRAFFIC VOLUMES
W/O PROJECT, PM PEAK HOUR

KELLY ENGINEERING
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Phone: 360-433-7530

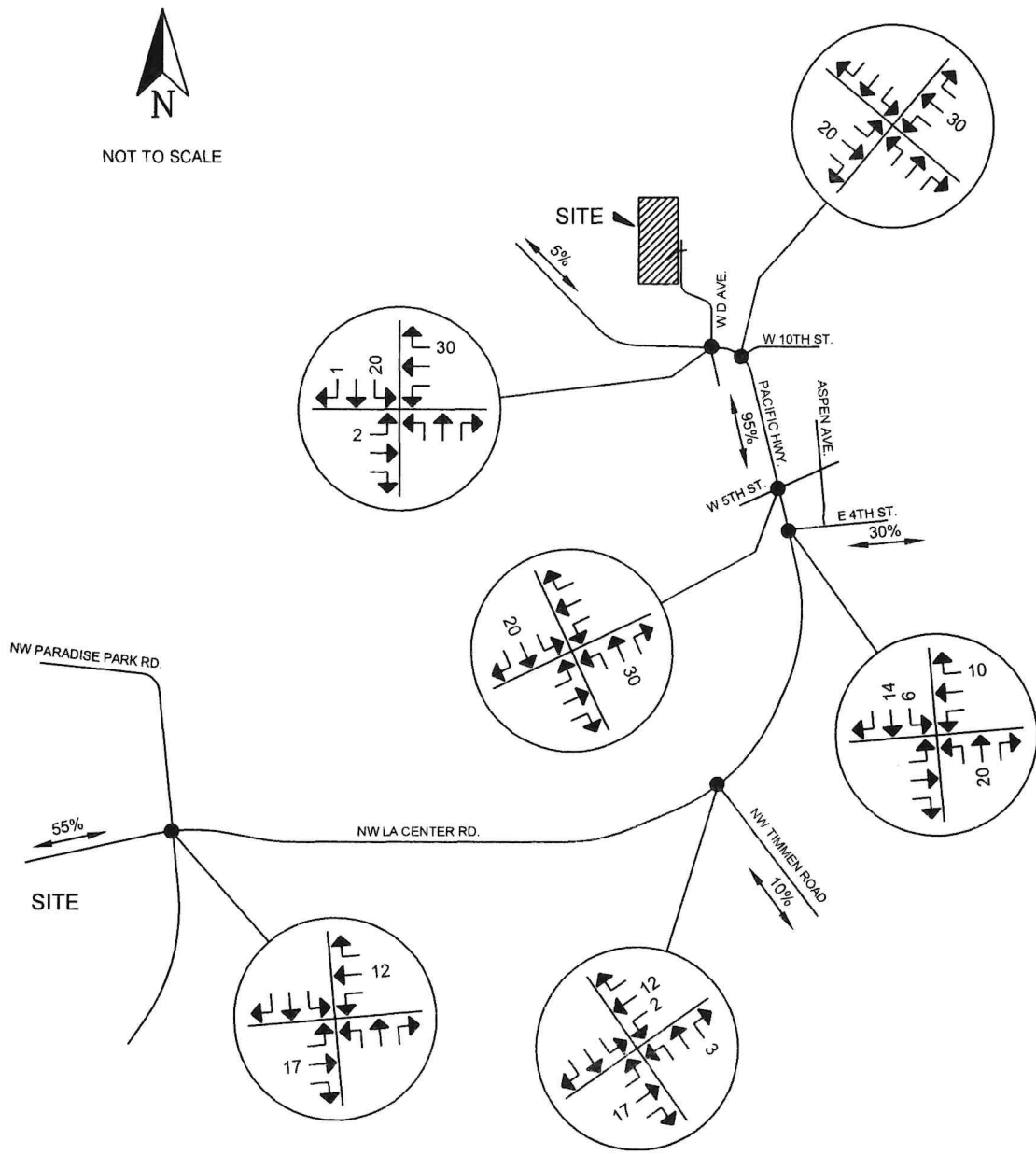


AM PEAK HOUR SITE TRIPS
IN-11, OUT-29

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FIGURE 6a
**SITE TRAFFIC DISTRIBUTION/
ASSIGNMENT, AM PEAK HOUR**

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Phone: 360-433-7530

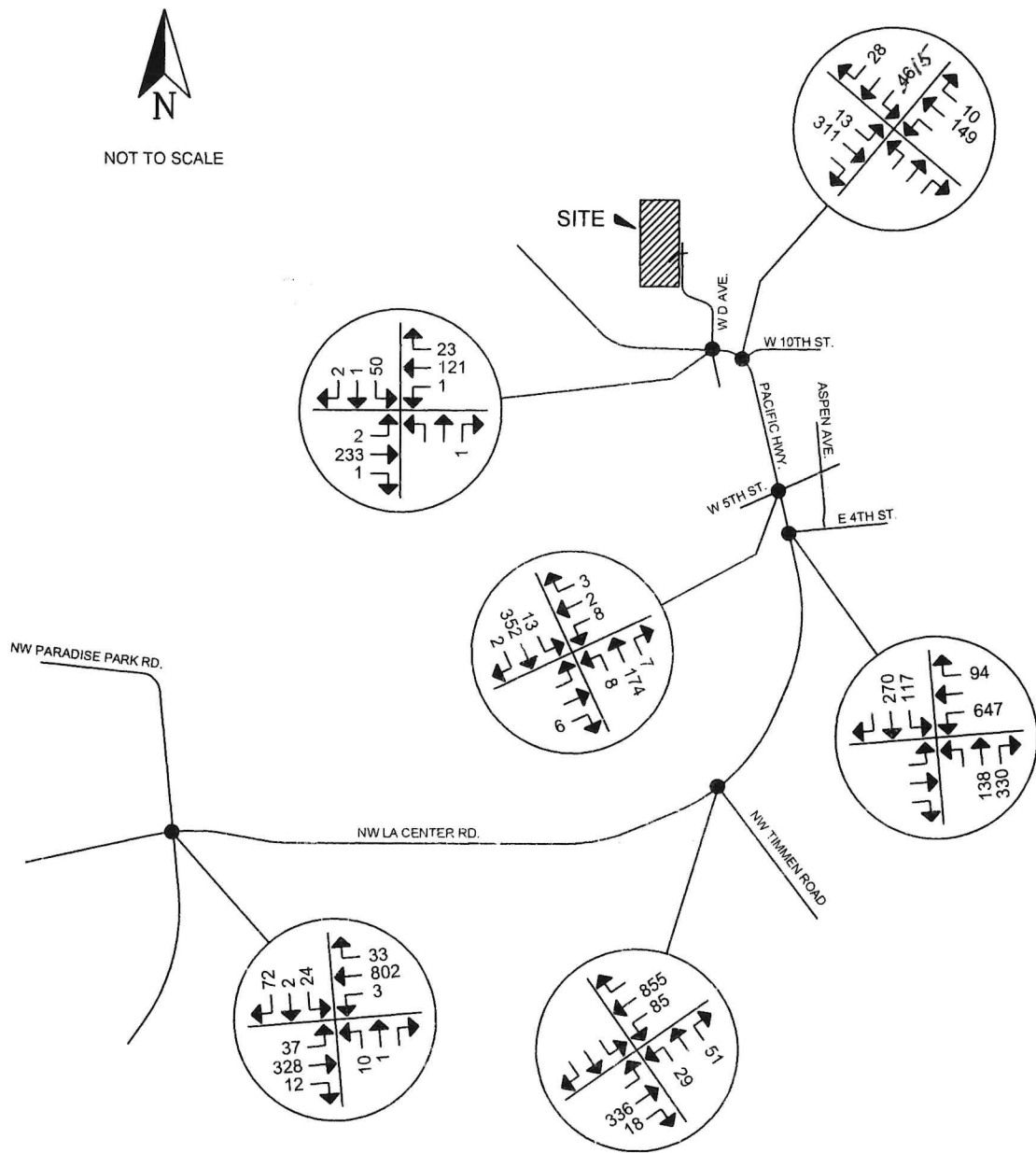


PM PEAK HOUR SITE TRIPS
IN-32, OUT-21

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FIGURE 6b
**SITE TRAFFIC DISTRIBUTION/
ASSIGNMENT, PM PEAK HOUR**

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Phone: 360-433-7530



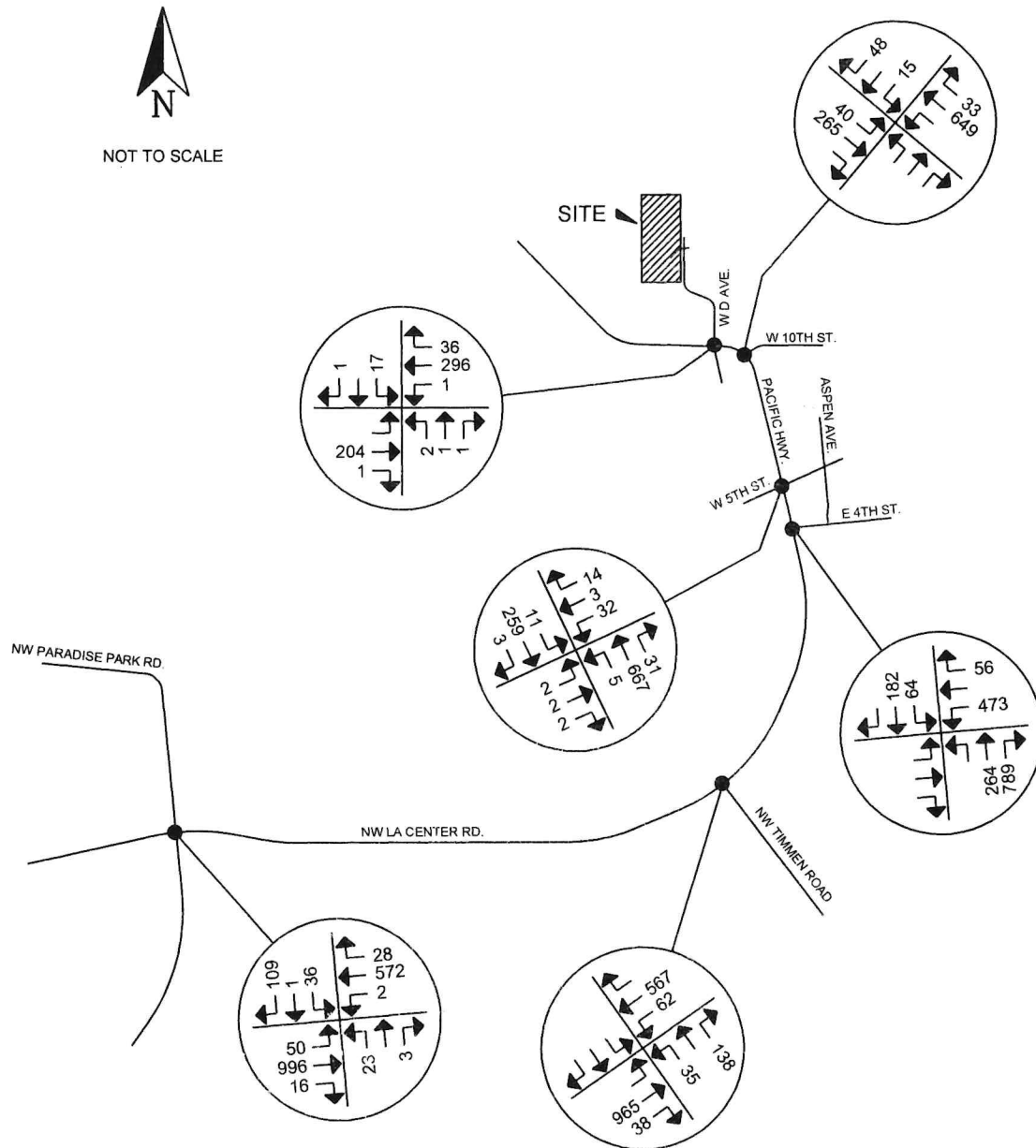
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FIGURE 7a
YEAR 2028 TRAFFIC VOLUMES
WITH PROJECT, AM PEAK HOUR

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Phone: 360-433-7530



JUNIPER RIDGE SUBDIVISION

FIGURE 7b
YEAR 2028 TRAFFIC VOLUMES
WITH PROJECCT, PM PEAK HOUR

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 Phone: 360-433-7530

APPENDIX A
RAW TRAFFIC COUNT DATA



(303) 216-2439
www.alltrafficdata.net

Location: 1 W D AVE & NW PACIFIC HWY AM

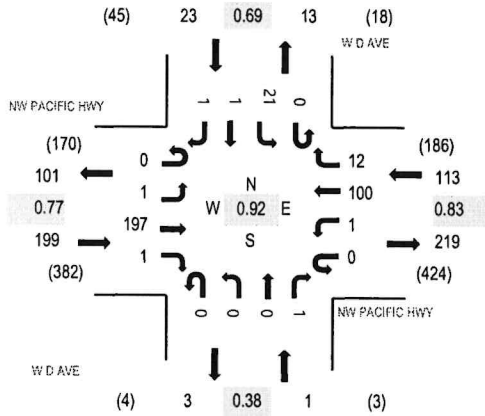
Date: Wednesday, May 15, 2024

Peak Hour: 08:00 AM - 09:00 AM

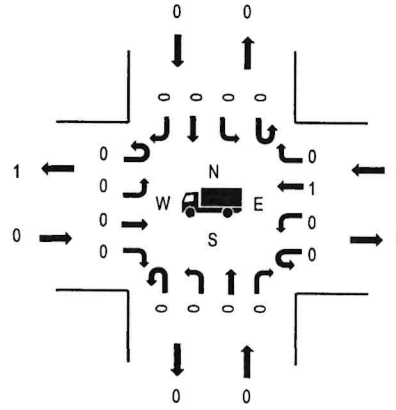
Peak 15-Minutes: 08:15 AM - 08:30 AM

Peak Hour

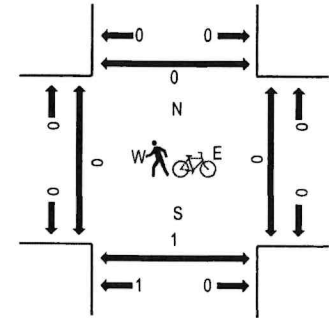
Motorized Vehicles



Heavy Vehicles



Pedestrians/Bicycles in Crosswalk



Note: Total study counts contained in parentheses.

	HV%	PHF
EB	0.0%	0.77
WB	0.9%	0.83
NB	0.0%	0.38
SB	0.0%	0.69
All	0.3%	0.92

Traffic Counts - Motorized Vehicles

Interval Start Time	NW PACIFIC HWY Eastbound				NW PACIFIC HWY Westbound				W D AVE Northbound				W D AVE Southbound				Total	Rolling Hour
	U-Turn	Left	Thru	Right	U-Turn	Left	Thru	Right	U-Turn	Left	Thru	Right	U-Turn	Left	Thru	Right		
7:00 AM	0	0	53	0	0	0	14	2	0	0	0	0	0	6	0	0	75	280
7:15 AM	0	0	46	0	0	0	13	0	0	0	0	2	0	7	0	0	68	285
7:30 AM	0	1	41	0	0	1	23	0	0	0	0	0	0	3	0	0	69	308
7:45 AM	0	0	42	0	0	0	18	2	0	0	0	0	0	5	0	1	68	329
8:00 AM	0	0	44	0	0	0	22	4	0	0	0	1	0	7	1	1	80	336
8:15 AM	0	1	64	1	0	0	17	3	0	0	0	0	0	5	0	0	91	
8:30 AM	0	0	52	0	0	1	30	2	0	0	0	0	0	5	0	0	90	
8:45 AM	0	0	37	0	0	0	31	3	0	0	0	0	0	4	0	0	75	
Count Total	0	2	379	1	0	2	168	16	0	0	0	3	0	42	1	2	616	
Peak Hour	0	1	197	1	0	1	100	12	0	0	0	1	0	21	1	1	336	

Traffic Counts - Heavy Vehicles, Bicycles on Road, and Pedestrians/Bicycles in Crosswalk

Interval Start Time	Heavy Vehicles					Interval Start Time	Bicycles on Roadway					Interval Start Time	Pedestrians/Bicycles on Crosswalk				
	EB	NB	WB	SB	Total		EB	NB	WB	SB	Total		EB	NB	WB	SB	Total
7:00 AM	0	0	0	0	0	7:00 AM	0	0	0	0	0	7:00 AM	0	2	0	0	2
7:15 AM	0	0	0	0	0	7:15 AM	0	0	0	0	0	7:15 AM	0	0	0	0	0
7:30 AM	0	0	0	0	0	7:30 AM	0	0	0	0	0	7:30 AM	0	1	0	2	3
7:45 AM	0	0	0	0	0	7:45 AM	0	0	0	0	0	7:45 AM	0	0	0	0	0
8:00 AM	0	0	1	0	1	8:00 AM	0	0	0	0	0	8:00 AM	0	0	0	0	0
8:15 AM	0	0	0	0	0	8:15 AM	0	0	1	0	1	8:15 AM	0	0	0	0	0
8:30 AM	0	0	0	0	0	8:30 AM	0	0	0	0	0	8:30 AM	0	1	0	0	1
8:45 AM	0	0	0	0	0	8:45 AM	0	0	0	0	0	8:45 AM	0	0	0	0	0
Count Total	0	0	1	0	1	Count Total	0	0	1	0	1	Count Total	0	4	0	2	6
Peak Hour	0	0	1	0	1	Peak Hour	0	0	1	0	1	Peak Hour	0	1	0	0	1



(303) 216-2439
www.alltrafficdata.net

Location: 1 W D AVE & NW PACIFIC HWY PM

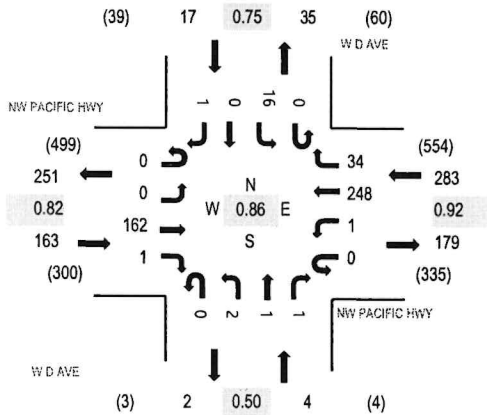
Date: Wednesday, May 15, 2024

Peak Hour: 04:45 PM - 05:45 PM

Peak 15-Minutes: 05:15 PM - 05:30 PM

Peak Hour

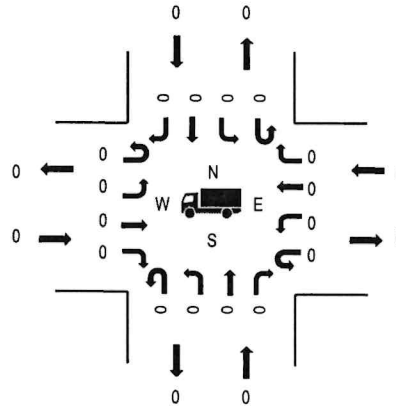
Motorized Vehicles



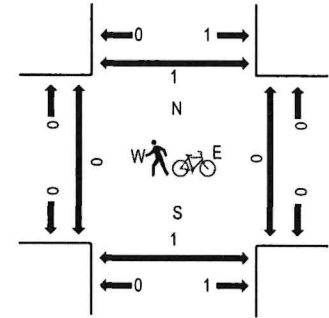
Note: Total study counts contained in parentheses.

	HV%	PHF
EB	0.0%	0.82
WB	0.0%	0.92
NB	0.0%	0.50
SB	0.0%	0.75
All	0.0%	0.86

Heavy Vehicles



Pedestrians/Bicycles in Crosswalk



Traffic Counts - Motorized Vehicles

Interval Start Time	NW PACIFIC HWY Eastbound				NW PACIFIC HWY Westbound				W D AVE Northbound				W D AVE Southbound				Total	Rolling Hour
	U-Turn	Left	Thru	Right	U-Turn	Left	Thru	Right	U-Turn	Left	Thru	Right	U-Turn	Left	Thru	Right		
4:00 PM	0	0	39	0	0	0	62	1	0	0	0	0	0	5	0	0	107	446
4:15 PM	0	0	28	1	1	0	58	11	0	0	0	0	0	5	0	0	104	433
4:30 PM	0	1	29	0	0	0	60	8	0	0	0	0	0	6	0	1	105	464
4:45 PM	0	0	50	0	0	0	68	9	0	0	0	0	0	3	0	0	130	467
5:00 PM	0	0	29	0	0	0	53	6	0	0	0	1	0	5	0	0	94	451
5:15 PM	0	0	49	1	0	0	65	12	0	1	1	0	0	5	0	1	135	
5:30 PM	0	0	34	0	0	1	62	7	0	1	0	0	0	3	0	0	108	
5:45 PM	0	1	38	0	0	0	67	3	0	0	0	0	0	5	0	0	114	
Count Total	0	2	296	2	1	1	495	57	0	2	1	1	0	37	0	2	897	
Peak Hour	0	0	162	1	0	1	248	34	0	2	1	1	0	16	0	1	467	

Traffic Counts - Heavy Vehicles, Bicycles on Road, and Pedestrians/Bicycles in Crosswalk

Interval Start Time	Heavy Vehicles					Interval Start Time	Bicycles on Roadway					Interval Start Time	Pedestrians/Bicycles on Crosswalk				
	EB	NB	WB	SB	Total		EB	NB	WB	SB	Total		EB	NB	WB	SB	Total
4:00 PM	0	0	0	0	0	4:00 PM	0	0	0	3	3	4:00 PM	0	0	0	0	0
4:15 PM	0	0	0	0	0	4:15 PM	0	0	0	2	2	4:15 PM	0	0	0	0	0
4:30 PM	1	0	0	0	1	4:30 PM	1	0	1	0	2	4:30 PM	0	0	0	0	0
4:45 PM	0	0	0	0	0	4:45 PM	0	0	1	0	1	4:45 PM	0	0	0	0	0
5:00 PM	0	0	0	0	0	5:00 PM	0	0	0	0	0	5:00 PM	0	0	0	0	0
5:15 PM	0	0	0	0	0	5:15 PM	0	0	0	0	0	5:15 PM	0	1	0	1	2
5:30 PM	0	0	0	0	0	5:30 PM	0	0	0	0	0	5:30 PM	0	0	0	0	0
5:45 PM	0	0	0	0	0	5:45 PM	0	0	0	0	0	5:45 PM	0	2	2	0	4
Count Total	1	0	0	0	1	Count Total	1	0	2	5	8	Count Total	0	3	2	1	6
Peak Hour	0	0	0	0	0	Peak Hour	0	0	1	0	1	Peak Hour	0	1	0	1	2

INTERSECTION TURN MOVEMENT SURVEY

NW PACIFIC HWY. & W 10TH STREET

DATE OF COUNT: 1/29/2025, 07:00-09:00
 DAY OF WEEK: WED.
 WEATHER: CLOUDY
 COUNTER: DSK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
07:00-07:05	2	7	0	2	0	1	0	11	0	0	0	0	26
07:05-07:10	3	15	0	2	0	1	0	6	1	0	0	0	28
07:10-07:15	0	18	0	2	0	1	0	7	0	0	0	0	28
07:15-07:20	1	25	0	3	0	0	0	10	0	0	0	0	39
07:20-07:25	2	24	0	7	0	0	0	11	0	0	0	0	44
07:25-07:30	2	33	0	5	0	2	0	12	1	0	0	0	55
07:30-07:35	1	28	0	7	0	5	0	11	0	0	0	0	52
07:35-07:40	1	28	0	2	0	2	0	13	0	0	0	0	36
07:40-07:45	0	24	0	2	0	3	0	9	1	0	0	0	39
07:45-07:50	1	12	0	1	0	4	0	10	0	0	0	0	28
07:50-07:55	0	13	0	3	0	2	0	12	0	0	0	0	30
07:55-08:00	0	13	0	6	0	2	0	9	0	0	0	0	30
08:00-08:05	1	11	0	3	0	4	0	7	3	0	0	0	29
08:05-08:10	0	14	0	2	0	3	0	7	0	0	0	0	26
08:10-08:15	2	15	0	1	0	3	0	8	1	0	0	0	30
08:15-08:20	1	24	0	1	0	4	0	10	0	0	0	0	40
08:20-08:25	1	17	0	3	0	2	0	9	0	0	0	0	32
08:25-08:30	3	17	0	2	0	2	0	7	0	0	0	0	31
08:30-08:35	1	30	0	3	0	2	0	14	4	0	0	0	54
08:35-08:40	3	19	0	2	0	1	0	15	1	0	0	0	41
08:40-08:45	2	19	0	1	0	2	0	12	0	0	0	0	36
08:45-08:50	2	12	0	3	0	6	0	10	0	0	0	0	33
08:50-08:55	2	15	0	4	0	3	0	10	1	0	0	0	35
08:55-09:00	1	10	0	3	0	3	0	2	0	0	0	0	19
Peak Hour Total	12	244	0	43	0	26	0	117	6	0	0	0	448
% Trucks	8	3	0	2	0	0	0	0	0	0	0	0	
Peds	0	0	0	0	0	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 07:20-08:20

PHF Intersection: 0.74

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY

NW PACIFIC HWY. & W 10TH ST.

DATE OF COUNT: 1/29/2025, 16:00-18:00
 DAY OF WEEK: WED.
 WEATHER: CLOUDY
 COUNTER: DSK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
16:00-16:05	3	13	0	2	0	3	0	45	2	0	0	0	68
16:05-16:10	3	15	0	1	0	3	0	46	0	0	0	0	68
16:10-16:15	4	23	0	2	0	5	0	62	2	0	0	0	98
16:15-16:20	3	20	0	1	0	7	0	51	3	0	0	0	85
16:20-16:25	2	21	0	1	0	1	0	42	3	0	0	0	70
16:25-16:30	4	18	0	1	0	1	0	43	2	0	0	0	69
16:30-16:35	3	18	0	0	0	5	0	56	4	0	0	0	86
16:35-16:40	2	18	0	0	0	3	0	60	4	0	0	0	87
16:40-16:45	2	17	0	3	0	6	0	62	4	0	0	0	94
16:45-16:50	2	16	0	0	0	4	0	45	2	0	0	0	69
16:50-16:55	2	11	0	2	0	4	0	45	2	0	0	0	66
16:55-17:00	3	22	0	0	0	5	0	45	3	0	0	0	78
17:00-17:05	2	26	0	2	0	2	0	37	1	0	0	0	70
17:05-17:10	5	22	0	3	0	2	0	53	1	0	0	0	86
17:10-17:15	2	12	0	3	0	3	0	44	3	0	0	0	67
17:15-17:20	6	17	0	3	0	3	0	30	2	0	0	0	61
17:20-17:25	4	21	0	0	0	3	0	47	2	0	0	0	77
17:25-17:30	4	20	0	1	0	4	0	45	2	0	0	0	76
17:30-17:35	0	17	0	1	0	4	0	43	4	0	0	0	69
17:35-17:40	1	19	0	2	0	4	0	32	3	0	0	0	61
17:40-17:45	1	18	0	0	0	5	0	40	1	0	0	0	65
17:45-17:50	2	30	0	1	0	3	0	38	1	0	0	0	75
17:50-17:55	2	18	0	0	0	2	0	39	2	0	0	0	63
17:55-18:00	2	18	0	1	0	1	0	44	1	0	0	0	82
Peak Hour Total 34	232	0	15	0	45	0	601	31	0	0	0	0	958
% Trucks	1	0	0	0	0	0	0	1	3	0	0	0	
Peds	0	6	0	0	0	0	0	0	0	0	2	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 16:10-17:10

PHF Intersection: 0.97

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY

NW PACIFIC HWY. & W 5TH ST.

DATE OF COUNT: 1/30/2025, 07:00-09:00
 DAY OF WEEK: THUR.
 WEATHER: CLOUDY
 COUNTER: DSK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
07:00-07:05	0	9	1	0	0	0	0	7	0	0	0	1	18
07:05-07:10	0	17	0	3	0	0	2	11	0	0	0	0	33
07:10-07:15	1	25	0	1	0	0	1	10	1	0	0	0	39
07:15-07:20	2	20	0	2	0	0	2	9	0	0	0	0	35
07:20-07:25	0	32	0	0	1	0	1	12	2	0	0	1	49
07:25-07:30	1	33	0	0	0	1	0	17	1	0	0	0	53
07:30-07:35	1	33	1	0	0	0	1	10	0	0	0	1	47
07:35-07:40	2	35	0	0	0	0	0	11	0	0	0	0	48
07:40-07:45	3	18	0	1	0	0	0	15	0	0	0	1	38
07:45-07:50	1	13	1	0	0	0	0	10	1	0	0	0	26
07:50-07:55	1	21	0	1	0	1	0	13	2	0	0	2	41
07:55-08:00	0	15	0	0	0	0	1	13	0	0	0	0	29
08:00-08:05	0	21	0	0	1	1	0	6	0	0	0	1	30
08:05-08:10	0	17	0	0	1	0	0	7	0	0	0	2	27
08:10-08:15	0	17	1	0	0	0	0	11	1	0	0	0	30
08:15-08:20	2	23	0	1	0	0	1	10	0	0	0	2	39
08:20-08:25	2	17	0	0	0	0	0	17	0	0	0	0	36
08:25-08:30	3	24	0	0	1	0	0	10	1	0	0	0	39
08:30-08:35	3	25	0	0	1	1	0	9	1	0	0	0	40
08:35-08:40	0	30	1	1	0	0	1	13	0	0	0	1	47
08:40-08:45	0	23	1	0	0	0	0	17	0	0	0	0	41
08:45-08:50	1	16	0	1	0	0	0	16	0	0	0	0	34
08:50-08:55	0	16	0	0	0	0	1	8	0	0	0	0	25
08:55-09:00	0	17	0	0	1	0	0	12	0	0	0	1	31
Peak Hour Total	12	283	2	8	2	3	8	137	7	0	0	6	468
% Trucks	17	3	50	3	1	0	0	10	3	0	1	0	
Peds	0	0	0	0	0	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 07:05-08:05

PHF Intersection: 0.78

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY **NW PACIFIC HWY. & W 5TH ST.**

DATE OF COUNT: 1/30/2025, 16:00-18:00
DAY OF WEEK: THUR.
WEATHER: CLOUDY
COUNTER: KAK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
16:00-16:05	1	17	0	4	0	0	2	47	1	0	0	1	73
16:05-16:10	1	17	0	3	2	2	1	47	1	0	0	0	74
16:10-16:15	3	20	0	3	0	1	0	60	2	0	0	0	89
16:15-16:20	0	20	0	4	0	1	0	45	3	0	1	0	74
16:20-16:25	2	19	0	1	0	2	0	56	1	0	0	0	81
16:25-16:30	0	21	0	1	0	0	0	53	1	1	0	0	77
16:30-16:35	0	17	0	0	0	0	0	50	0	0	0	1	68
16:35-16:40	0	20	1	0	1	1	0	51	2	0	0	0	76
16:40-16:45	0	24	0	2	0	0	3	46	2	0	0	0	77
16:45-16:50	2	16	1	0	0	0	0	45	3	1	1	0	69
16:50-16:55	3	17	1	1	0	1	1	50	1	0	0	0	75
16:55-17:00	0	18	0	0	0	2	0	52	0	0	0	1	73
17:00-17:05	0	24	0	3	0	0	0	50	1	0	0	0	78
17:05-17:10	2	24	0	2	0	1	0	42	1	1	0	0	73
17:10-17:15	0	25	0	1	0	0	0	39	0	0	1	0	66
17:15-17:20	0	20	0	3	0	2	1	55	2	0	0	0	83
17:20-17:25	2	19	0	0	0	1	0	50	0	0	0	0	72
17:25-17:30	0	20	0	0	0	1	0	37	0	0	1	0	59
17:30-17:35	1	20	0	1	0	0	2	40	1	0	0	0	65
17:35-17:40	2	23	0	0	0	0	0	39	0	0	0	2	66
17:40-17:45	0	17	0	0	0	0	0	50	1	0	0	0	68
17:45-17:50	3	31	0	1	0	1	1	48	0	0	0	0	85
17:50-17:55	2	18	0	0	0	0	0	49	0	0	0	0	69
17:55-18:00	0	18	0	1	0	0	0	41	1	0	0	0	61
Peak Hour Total	11	233	3	18	3	10	5	605	17	2	2	2	911
% Trucks	1	6	0	0	0	0	0	1	0	0	0	0	
Peds	0	2	0	0	0	0	0	3	0	0	2	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 16:05-17:05
PHF Intersection: 0.93

KELLY ENGINEERING

ROUNDAABOUT TURN MOVEMENT SURVEY **W 4TH STREET & PACIFIC HIGHWAY**

DATE OF COUNT: 5/14/2024, 07:00-09:00
DAY OF WEEK: TUE.
WEATHER: SUNNY
COUNTER: KAK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
07:00-07:05	1	17	0	30	0	1	0	12	8	0	0	0	69
07:05-07:10	2	11	0	36	0	1	0	11	7	0	0	0	68
07:10-07:15	3	15	0	43	0	1	0	11	10	0	0	0	83
07:15-07:20	4	16	0	45	0	0	0	7	7	0	0	0	79
07:20-07:25	2	14	0	52	0	1	0	5	27	0	0	0	101
07:25-07:30	4	21	0	53	0	4	0	8	30	0	0	0	120
07:30-07:35	7	22	0	33	0	2	0	7	10	0	0	0	81
07:35-07:40	5	25	0	42	0	3	0	12	24	0	0	0	111
07:40-07:45	7	23	0	41	0	3	0	12	29	0	0	0	115
07:45-07:50	20	12	0	35	0	3	0	8	23	0	0	0	101
07:50-07:55	15	15	0	41	0	14	0	9	33	0	0	0	127
07:55-08:00	10	15	0	41	0	16	0	6	32	0	0	0	120
08:00-08:05	10	16	0	52	0	15	0	12	20	0	0	0	125
08:05-08:10	7	23	0	55	0	11	0	14	16	0	0	0	126
08:10-08:15	8	15	0	48	0	9	0	8	12	0	0	0	100
08:15-08:20	9	11	0	28	0	5	0	9	15	0	0	0	77
08:20-08:25	3	7	0	21	0	4	0	9	10	0	0	0	54
08:25-08:30	1	9	0	33	0	0	0	7	13	0	0	0	63
08:30-08:35	2	6	0	27	0	1	0	7	19	0	0	0	62
08:35-08:40	1	8	0	23	0	2	0	8	13	0	0	0	82
08:40-08:45	4	7	0	21	0	3	0	10	16	0	0	0	61
08:45-08:50	5	9	0	21	0	4	0	9	15	0	0	0	63
08:50-08:55	6	10	0	24	0	5	0	10	10	0	0	0	65
08:55-09:00	7	11	0	22	0	3	0	9	11	0	0	0	96
Peak Hour Total	99	217	0	538	0	81	0	108	263	0	0	0	1306
% Trucks	2	0	0	0	0	0	0	1	3	0	0	3	
Peds	0	0	0	0	0	0	0	1	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 07:15-08:15
PHF Roundabout: 0.88

KELLY ENGINEERING

ROUNDAABOUT TURN MOVEMENT SURVEY **W 4TH STREET & PACIFIC HIGHWAY**

DATE OF COUNT: 5/16/2024, 16:00-18:00
 DAY OF WEEK: THUR.
 WEATHER: CLOUDY
 COUNTER: KAK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
16:00-16:05	2	10	0	30	0	7	0	12	38	0	0	0	99
16:05-16:10	0	11	0	34	0	5	0	16	50	0	0	0	116
16:15-16:20	0	17	0	27	0	3	0	17	38	0	0	0	102
16:10-16:15	2	9	0	24	0	2	0	14	38	0	0	0	89
16:20-16:25	2	10	0	19	0	1	0	16	34	0	0	0	82
16:25-16:30	5	10	0	20	0	3	0	11	38	0	0	0	87
16:30-16:35	3	8	0	21	0	6	0	18	35	0	0	0	91
16:35-16:40	5	15	0	34	0	7	0	21	50	0	0	0	132
16:40-16:45	3	16	0	33	0	3	0	16	37	0	0	0	108
16:45-16:50	3	7	0	33	0	5	0	22	46	0	0	0	116
16:50-16:55	3	7	0	21	0	5	0	20	46	0	0	0	102
16:55-17:00	4	16	0	20	0	6	0	14	45	0	0	0	105
17:00-17:05	5	12	0	18	0	0	0	12	51	0	0	0	98
17:05-17:10	6	15	0	23	0	2	0	22	40	0	0	0	108
17:10-17:15	5	10	0	41	0	5	0	15	42	0	0	0	118
17:15-17:20	3	15	0	24	0	2	0	20	50	0	0	0	114
17:20-17:25	1	15	0	25	0	0	0	20	46	0	0	0	107
17:25-17:30	2	14	0	24	0	2	0	18	48	0	0	0	108
17:30-17:35	3	12	0	21	0	5	0	19	45	0	0	0	105
17:35-17:40	3	9	0	30	0	4	0	17	45	0	0	0	108
17:40-17:45	1	8	0	22	0	0	0	15	47	0	0	0	93
17:45-17:50	2	9	0	24	0	4	0	14	37	0	0	0	90
17:50-17:55	1	9	0	23	0	2	0	14	35	0	0	0	84
17:55-18:00	1	10	0	20	0	3	0	14	35	0	0	0	83
Peak Hour Total	43	154	0	317	0	42	0	219	546	0	0	0	1321
% Trucks	0	1	0	0	0	0	0	0	0	0	0	0	
Peds	0	0	0	0	5	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 16:35-17:35
 PHF Roundabout: 0.93

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY NW TIMMEN ROAD & NW LA CENTER ROAD

DATE OF COUNT: 1/28/2025, 07:00-09:00
DAY OF WEEK: TUE.
WEATHER: CLOUDY
COUNTER: KAK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
07:00-07:05	0	0	0	6	45	0	2	0	2	0	15	0	70
07:05-07:10	0	0	0	2	53	0	3	0	3	0	14	1	76
07:10-07:15	0	0	0	4	58	0	1	0	2	0	23	1	89
07:15-07:20	0	0	0	7	48	0	0	0	2	0	33	3	93
07:20-07:25	0	0	0	5	64	0	4	0	3	0	27	1	104
07:25-07:30	0	0	0	4	64	0	0	0	5	0	19	3	95
07:30-07:35	0	0	0	2	62	0	3	0	1	0	16	2	86
07:35-07:40	0	0	0	9	72	0	2	0	2	0	23	1	109
07:40-07:45	0	0	0	5	66	0	3	0	7	0	30	0	111
07:45-07:50	0	0	0	9	67	0	2	0	3	0	16	0	97
07:50-07:55	0	0	0	6	59	0	3	0	4	0	20	0	92
07:55-08:00	0	0	0	7	52	0	0	0	2	0	25	1	87
08:00-08:05	0	0	0	3	37	0	0	0	1	0	26	1	68
08:05-08:10	0	0	0	8	42	0	2	0	4	0	17	0	73
08:10-08:15	0	0	0	3	27	0	2	0	5	0	23	0	60
08:15-08:20	0	0	0	2	36	0	0	0	4	0	29	1	72
08:20-08:25	0	0	0	4	43	0	0	0	3	0	26	2	78
08:25-08:30	0	0	0	2	33	0	3	0	4	0	22	0	64
08:30-08:35	0	0	0	5	45	0	1	0	4	0	18	0	73
08:35-08:40	0	0	0	5	50	0	2	0	4	0	21	1	83
08:40-08:45	0	0	0	3	39	0	0	0	3	0	19	0	64
08:45-08:50	0	0	0	4	42	0	0	0	2	0	20	2	70
08:50-08:55	0	0	0	2	27	0	1	0	1	0	19	0	50
08:55-09:00	0	0	0	4	38	0	2	0	3	0	21	1	69
Peak Hour Total	0	0	0	66	710	0	23	0	36	0	261	13	1109
% Trucks	0	0	0	0	0	0	0	0	3	0	2	15	
Peds	0	0	0	0	0	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 07:00-08:00

PHF Intersection: 0.87

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY **NW TIMMEN ROAD & NW LA CENTER ROAD**

DATE OF COUNT: 5/16/2024, 16:00-18:00
 DAY OF WEEK: THUR.
 WEATHER: SUNNY
 COUNTER: DSK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
16:00-16:05	0	0	0	5	32	0	1	0	5	0	44	3	90
16:05-16:10	0	0	0	1	31	0	0	0	7	0	45	1	85
16:10-16:15	0	0	0	3	35	0	2	0	7	0	47	3	97
16:15-16:20	0	0	0	5	45	0	3	0	3	0	47	3	106
16:20-16:25	0	0	0	5	30	0	2	0	7	0	57	3	104
16:25-16:30	0	0	0	4	27	0	2	0	6	0	42	4	83
16:30-16:35	0	0	0	5	22	0	2	0	14	0	49	2	92
16:35-16:40	0	0	0	5	23	0	5	0	11	0	55	2	101
16:40-16:45	0	0	0	4	31	0	3	0	11	0	44	2	95
16:45-16:50	0	0	0	1	34	0	3	0	10	0	50	2	97
16:50-16:55	0	0	0	5	25	0	3	0	6	0	37	4	80
16:55-17:00	0	0	0	6	26	0	2	0	7	0	60	3	104
17:00-17:05	0	0	0	6	30	0	2	0	12	0	65	3	118
17:05-17:10	0	0	0	7	35	0	4	0	11	0	64	7	128
17:10-17:15	0	0	0	5	31	0	3	0	7	0	62	3	111
17:15-17:20	0	0	0	5	44	0	4	0	15	0	62	3	133
17:20-17:25	0	0	0	4	28	0	2	0	6	0	50	3	93
17:25-17:30	0	0	0	3	37	0	2	0	6	0	55	2	105
17:30-17:35	0	0	0	3	35	0	2	0	17	0	65	2	124
17:35-17:40	0	0	0	4	35	0	3	0	6	0	47	3	98
17:40-17:45	0	0	0	3	29	0	3	0	10	0	58	2	105
17:45-17:50	0	0	0	7	24	0	4	0	13	0	55	3	106
17:50-17:55	0	0	0	5	35	0	2	0	7	0	52	2	103
17:55-18:00	0	0	0	2	30	0	1	0	9	0	49	4	95
Peak Hour Total	0	0	0	58	389	0	33	0	117	0	695	36	1328
% Trucks	0	0	0	0	0	0	6	0	0	0	0	1	
Peds	0	0	0	0	2	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 16:55-17:55
 PHF Intersection: 0.89

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY PARADISE PARK ROAD & NW LA CENTER ROAD

DATE OF COUNT: 1/30/2025, 07:00-09:00
DAY OF WEEK: THUR.
WEATHER: CLOUDY
COUNTER: KAK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
07:00-07:05	2	0	5	0	41	2	2	0	0	0	15	0	67
07:05-07:10	2	0	3	0	45	0	0	0	0	1	14	0	65
07:10-07:15	5	0	1	0	34	0	0	0	0	3	27	1	71
07:15-07:20	0	0	5	0	68	0	0	0	0	3	22	0	98
07:20-07:25	1	0	3	0	56	0	0	0	0	2	15	0	77
07:25-07:30	0	0	2	0	69	3	0	0	0	2	21	0	97
07:30-07:35	0	0	4	0	57	1	0	0	0	2	20	0	84
07:35-07:40	0	0	4	0	61	2	0	0	0	0	13	2	82
07:40-07:45	1	0	2	0	63	1	0	0	0	0	28	1	96
07:45-07:50	0	0	1	0	55	0	0	0	0	1	19	0	76
07:50-07:55	1	0	6	0	68	0	1	0	0	3	24	0	103
07:55-08:00	0	0	3	0	42	3	2	0	0	4	24	0	78
08:00-08:05	0	0	1	0	36	2	0	1	0	1	26	0	67
08:05-08:10	0	0	4	0	43	1	1	0	0	2	22	1	74
08:10-08:15	3	0	2	0	52	0	0	0	0	1	26	1	85
08:15-08:20	1	0	3	1	35	1	1	0	0	2	32	2	78
08:20-08:25	0	0	3	0	37	0	2	1	0	2	28	1	74
08:25-08:30	0	0	1	0	29	1	1	2	0	1	29	3	67
08:30-08:35	0	0	4	0	40	2	0	1	0	4	27	0	78
08:35-08:40	0	1	4	0	40	1	1	0	0	4	27	0	78
08:40-08:45	0	0	2	0	29	0	0	0	0	2	19	0	52
08:45-08:50	1	0	1	0	31	2	0	0	0	2	20	2	59
08:50-08:55	0	0	3	0	33	1	0	0	0	3	19	0	59
08:55-09:00	0	0	2	0	38	0	0	0	0	2	24	1	57
Peak Hour Total	6	0	37	0	670	13	4	1	0	21	260	5	1017
% Trucks	100	0	22	0	0	8	0	0	0	0	1	0	
Peds	0	0	0	0	0	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 07:15-08:15

PHF Intersection: 0.92

KELLY ENGINEERING

INTERSECTION TURN MOVEMENT SURVEY PARADISE PARK ROAD & NW LA CENTER ROAD

DATE OF COUNT: 1/30/2025 16:00-18:00
DAY OF WEEK: THUR.
WEATHER: CLOUDY
COUNTER: DSK

Time Period From – To	FROM NORTH			FROM EAST			FROM SOUTH			FROM WEST			TOTAL
	L	T	R	L	T	R	L	T	R	L	T	R	
16:00-16:05	3	0	2	0	22	4	0	0	1	3	62	2	99
16:05-16:10	3	0	4	0	27	3	0	1	0	5	61	3	107
16:10-16:15	0	0	7	0	41	4	1	0	2	7	45	2	109
16:15-16:20	0	0	3	0	36	3	4	1	1	6	54	1	109
16:20-16:25	2	0	7	0	24	1	0	0	0	6	64	0	104
16:25-16:30	3	0	4	0	38	3	1	0	0	10	57	0	116
16:30-16:35	1	0	7	0	30	1	1	0	0	2	61	1	104
16:35-16:40	1	0	4	0	37	2	2	0	0	5	53	0	104
16:40-16:45	1	0	8	0	35	2	1	0	2	3	71	1	124
16:45-16:50	3	0	6	0	25	2	1	0	0	5	67	2	111
16:50-16:55	1	0	7	0	29	1	2	0	0	3	78	0	121
16:55-17:00	0	0	1	0	31	1	0	0	0	3	43	0	79
17:00-17:05	2	0	6	0	32	0	2	0	0	4	78	0	124
17:05-17:10	1	0	4	0	35	3	3	0	0	1	57	3	107
17:10-17:15	0	0	4	0	38	1	2	0	0	2	63	1	111
17:15-17:20	0	1	7	0	33	0	1	0	0	3	68	1	114
17:20-17:25	1	0	7	0	27	0	1	0	0	3	58	0	97
17:25-17:30	2	0	0	0	39	1	0	0	0	0	75	0	117
17:30-17:35	1	0	5	0	27	2	0	0	0	3	55	1	94
17:35-17:40	2	0	5	0	27	0	1	0	0	1	64	2	102
17:40-17:45	0	0	4	0	25	0	1	0	0	2	43	0	75
17:45-17:50	0	0	4	0	24	1	0	0	0	4	45	0	78
17:50-17:55	2	0	3	0	26	2	2	0	0	3	50	2	90
17:55-18:00	1	0	2	0	29	0	1	0	0	1	44	2	80
Peak Hour Total	15	1	65	0	387	17	16	0	2	47	760	9	1319
% Trucks	0	0	2	0	0	0	6	0	50	49	0	11	
Peds	0	0	0	0	0	0	0	0	0	0	0	0	
Bikes	0	0	0	0	0	0	0	0	0	0	0	0	

PEAK HOUR: 16:20-17:20

PHF Intersection: 0.93

KELLY ENGINEERING

APPENDIX B
COLLISION DATA

**OFFICER REPORTED CRASHES THAT OCCURRED at OR in the vicinity of MULTIPLE INTERSECTIONS IN THE CITY OF LA CENTER
01/01/2019 - 12/31/2023**

Under 23 U.S. Code § 148 and 23 U.S. Code § 407, safety data, reports, surveys, schedules, lists compiled or collected for the purpose of identifying, evaluating, or planning the safety enhancement of potential crash sites, hazardous roadway conditions, or railway-highway crossings are not subject to discovery or admitted into evidence in a Federal or State court proceeding or considered for other purposes in any action for damages arising from any occurrence at a location mentioned or addressed in such reports, surveys, schedules, lists, or data.

JURISDICTION	COUNTY	CITY	PRIMARY TRAFFICWAY	BLOCK NUMBER	INTERSECTING TRAFFICWAY	DIST FROM REF POINT	MI or FT	COMP DIR FROM REF POINT	REFERENCE POINT NAME	A / B
City Street	Clark	La Center	NW LA CENTER RD	2798	NW PARADISE PARK RD					
City Street	Clark	La Center	NW LA CENTER RD	32088	NW TIMMEN RD					
City Street	Clark	La Center	NW LA CENTER RD	32088	NW TIMMEN RD					
City Street	Clark	La Center	NW LA CENTER RD	32088	NW TIMMEN RD					
City Street	Clark	La Center	NW LA CENTER RD	32088	NW TIMMEN RD					
City Street	Clark	La Center	NW LA CENTER RD	32100		0.19	M	NE	NW TIMMEN RD	
City Street	Clark	La Center	NW LA CENTER RD	32100		0.15	M	NE	NW TIMMEN RD	
City Street	Clark	La Center	NW LA CENTER RD	32100		0.1	M	NE	NW TIMMEN RD	
City Street	Clark	La Center	NW PACIFIC HWY	0	W 10TH ST					
City Street	Clark	La Center	NW PACIFIC HWY	200	W 5TH ST					
City Street	Clark	La Center	NW PACIFIC HWY	0	W D AVE					
City Street	Clark	La Center	NW TIMMEN RD	31986	NW LA CENTER RD					
City Street	Clark	La Center	NW TIMMEN RD	31800		349	F	NW	NW LACENTER RD	
City Street	Clark	La Center	W 4TH ST		NW PACIFIC HWY					
City Street	Clark	La Center	W 4TH ST	0	NW PACIFIC HWY					

SR ONLY HISTORY / SUSPENSE IND	REPORT NUMBER	DATE	TIME	MOST SEVERE INJURY TYPE	# IN J	# F A T	# V E H I C L E S	# P E R S O N S	VEHICLE 1 TYPE
No	EB57965	08/14/2021	14:27	No Apparent Injury	0	0	2	0	Passenger Car
No	EE06989	10/07/2023	02:19	Suspected Minor Injury	1	0	2	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	EB92925	11/20/2021	15:30	No Apparent Injury	0	0	2	0	Passenger Car
No	EB98726	12/09/2021	13:23	No Apparent Injury	0	0	1	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	ED04764	10/21/2022	12:36	Suspected Minor Injury	1	0	2	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	EB67460	08/27/2021	16:55	Possible Injury	2	0	2	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	EC07977	12/30/2021	07:35	No Apparent Injury	0	0	1	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	EB79085	10/03/2021	05:55	No Apparent Injury	0	0	1	0	Passenger Car
No	EA27195	03/30/2020	01:00	No Apparent Injury	0	0	1	0	Passenger Car
No	EE07804	08/09/2023	20:29	No Apparent Injury	0	0	2	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	E918933	04/13/2019	17:50	No Apparent Injury	0	0	2	0	Passenger Car
No	EC15297	12/18/2021	23:24	Suspected Minor Injury	1	0	1	0	Pickup, Panel Truck or Vanette under 10,000 lb
No	EB32270	05/18/2021	18:33	Possible Injury	1	0	1	0	Passenger Car
No	ED06718	11/19/2022	20:09	No Apparent Injury	0	0	1	0	Truck Tractor & Semi-Trailer
No	E996098	12/14/2019	18:21	No Apparent Injury	0	0	2	0	Passenger Car

VEHICLE 2 TYPE	JUNCTION RELATIONSHIP	WEATHER	ROADWAY SURFACE CONDITION	LIGHTING CONDITION
Pickup, Panel Truck or Vanette under 10,000 lb	At Intersection and Related	Overcast	Dry	Daylight
Motorcycle	At Intersection and Related	Clear or Partly Cloudy	Dry	Dark-Street Lights On
Pickup, Panel Truck or Vanette under 10,000 lb	At Driveway within Major Intersection	Clear	Dry	Daylight
	At Intersection and Not Related	Overcast	Wet	Daylight
Passenger Car	At Intersection and Related	Raining	Wet	Daylight
Pickup, Panel Truck or Vanette under 10,000 lb	Not at Intersection and Not Related	Clear	Dry	Daylight
	Not at Intersection and Not Related	Snowing	Ice	Daylight
	Not at Intersection and Not Related	Fog or Smog or Smoke	Wet	Dark-No Street Lights
	At Intersection and Not Related	Raining	Wet	Dark-Street Lights On
Passenger Car	At Intersection and Related	Clear	Dry	Daylight
Pickup, Panel Truck or Vanette under 10,000 lb	At Intersection and Related	Raining	Wet	Daylight
	At Intersection and Related	Snowing	Wet	Dark-Street Lights On
	Not at Intersection and Not Related	Overcast	Wet	Daylight
	Circulating Roundabout	Clear	Dry	Dark-Street Lights On
Not Stated	Circulating Roundabout	Fog or Smog or Smoke	Wet	Dark-Street Lights On

FIRST COLLISION TYPE / OBJECT STRUCK	VEHICLE 1 ACTION	VEHICLE 2 ACTION	VEHICLE 1 COMPASS DIRECTION FROM	VEHICLE 1 COMPASS DIRECTION TO
From opposite direction - one left turn - one straight	Going Straight Ahead	Making Left Turn	West	East
Entering at angle	Making Left Turn	Going Straight Ahead	South	West
Entering at angle	Going Straight Ahead	Making Right Turn	Southwest	Northeast
Vehicle Strikes Deer	Going Straight Ahead		Southwest	Northeast
From same direction - both going straight - both moving - rear-end	Slowing	Going Straight Ahead	West	East
From same direction - both going straight - both moving - rear-end	Going Straight Ahead	Slowing	North	South
Vehicle overturned	Going Straight Ahead		Northeast	Southwest
Earth Bank or Ledge	Going Straight Ahead		West	Northeast
Tree or Stump (stationary)	Going Straight Ahead		Northwest	Southeast
From same direction - one right turn - one straight	Making Right Turn	Overtaking and Passing	South	East
From same direction - both going straight - one stopped - rear-end	Going Straight Ahead	Stopped for Traffic	West	East
Guardrail - Through, Over or Under	Going Straight Ahead		Southeast	Northwest
Utility Pole	Going Straight Ahead		South	North
Retaining Wall (concrete, rock, brick, etc.)	Making Left Turn		South	West
From opposite direction - all others	Making Right Turn	Going Wrong Way on Divided Hwy	South	Northeast

VEHICLE 2 COMPASS DIRECTION FROM	VEHICLE 2 COMPASS DIRECTION TO	MV DRIVER CONTRIBUTING CIRCUMSTANCE 1 (UNIT 1)	MV DRIVER CONTRIBUTING CIRCUMSTANCE 2 (UNIT 1)	MV DRIVER CONTRIBUTING CIRCUMSTANCE 3 (UNIT 1)
East	South	None		
West	East	Did Not Grant RW to Vehicle		
Northwest	Southwest	None		
		None		
West	East	None		
North	South	Unknown Distraction		
		None		
		Apparently Asleep or Fatigued		
		Operating Defective Equipment		
South	North	None		
Vehicle Stopped	Vehicle Stopped	Exceeding Reas. Safe Speed	Follow Too Closely	
		Under Influence of Alcohol	Operating Handheld Cell Phone	Disregard Traffic Sign and Signals
		Exceeding Reas. Safe Speed		
		None		
		None		

MV DRIVER CONTRIBUTING CIRCUMSTANCE 1 (UNIT 2)	MV DRIVER CONTRIBUTING CIRCUMSTANCE 2 (UNIT 2)	MV DRIVER CONTRIBUTING CIRCUMSTANCE 3 (UNIT 2)	FIRST IMPACT LOCATION (City, County & Misc Trafficways - 2010 forward)	WA STATE PLANE SOUTH - X 2010 - FORWARD	WA STATE PLANE SOUTH - Y 2010 - FORWARD
Did Not Grant RW to Vehicle			Lane of Primary Trafficway	1079903.93	197214.91
None			Lane of Primary Trafficway	1085769.12	197298.37
Unknown Distraction			Lane of Primary Trafficway	1085769.12	197298.37
			Lane of Primary Trafficway	1085769.12	197298.37
Other Distractions	Follow Too Closely		Lane of Primary Trafficway	1085769.12	197298.37
None			Lane of Primary Trafficway	1086465.11	198011.62
			Past the Outside Shoulder of Primary Trafficway	1086345.15	197851.64
			Past the Outside Shoulder of Primary Trafficway	1086145.39	197632.52
			Past the Outside Shoulder of Primary Trafficway	1086370.04	201862.37
None			Lane of Primary Trafficway	1086841.84	200676.72
None			Lane of Primary Trafficway	1086224.03	201921.26
			Other Location (City/County/Misc. Trafficway)	1085769.12	197298.37
			Past the Outside Shoulder of Primary Trafficway	1086523.78	195931.49
			Median Shoulder of Primary Trafficway	1086951.62	200418.8
Other Contributing Circ Not Listed			Lane of Primary Trafficway	1087021.99	200383.21

APPENDIX C
IN-PROCESS TRAFFIC



MEMORANDUM

Date: March 2, 2020

To: Mike Odren, RLA
Associate Principal
Olson Engineering, Inc.
222 East Evergreen Blvd
Vancouver WA 98660

From: Frank Charbonneau, PE, PTOE

Subject: Trip Generation Assessment
Minit Management Development
NW Paradise Park Road, La Center

FL2024

This memo will serve as the trip generation assessment documenting the number of vehicular trips that will be produced by the proposed Minit Management development. The four acre site at address #2814 NW 319th Street is located in the northeast quadrant of NW La Center Road and the I-5 northbound on-ramp.

The development project will demolish the existing convenience store and gas station facilities and construct several new buildings consisting of 11,600 square feet of general retail, fast foot restaurant with drive-through totaling 2,800 square feet, convenience market with coffee drive-through totaling 4,510 square feet, and a 101 unit hotel. Parking on the site for 184 spaces will be provided, including eight ADA parking stalls. A copy of the project's site plan is attached to this memo.

The site will be served by three driveway accesses connecting to the perimeter road (NW Paradise Park Road) on the property's north and east sides. The nearest major intersections include NW La Center Road at the I-5 northbound off-ramp which is configured as a round-about and NW Paradise Park Road at NW La Center Road. This intersection is controlled by stop signing on the northbound Paradise Park Road approach and on the southbound Paradise Road approach.

The City of La Center issued a pre-application conference report (2019-018-PAC) dated June 11, 2019 documenting the application's process and requirements. The staff report detailed that the development agreement between the City and Minit Management LLC dated March 2016 vested a total of 199 PM peak hour trips for the site. As a result it was necessary to submit a trip generation assessment to verify the trip projection.

The number of trips were calculated based on the proposed building uses and sizes. Trip credits were applied for the existing facilities that will be demolished including the convenience market and gas station and a cardlock fueling station. The trip calculations were determined for the weekday average daily traffic (ADT) and the weekday AM and PM peak hours.

Table 3 presents the net trip generation results (proposed site trips – existing site trips) for the development project. When the new facility is developed it is projected that the site will generate a net of 76 trips in the AM peak hour 52 trips in the PM peak hour. The ADT is projected to increase by 946 trips per day.

Table 3 Net New Trips

Site Uses	Weekday Peak Hour						Weekday ADT
	AM Peak Hour			PM Peak Hour			
	Total	Enter	Exit	Total	Enter	Exit	
Proposed Site ¹	144	78	66	120	60	60	4,326
Existing Site ²	-68	-34	-34	-68	-33	-35	3,380
Net New Trips ³	76	44	32	52	27	25	946

¹ Refer to Table 2.

² Refer to Table 1.

³ Net New Trips = Proposed Site Trips - Existing Site Trips.

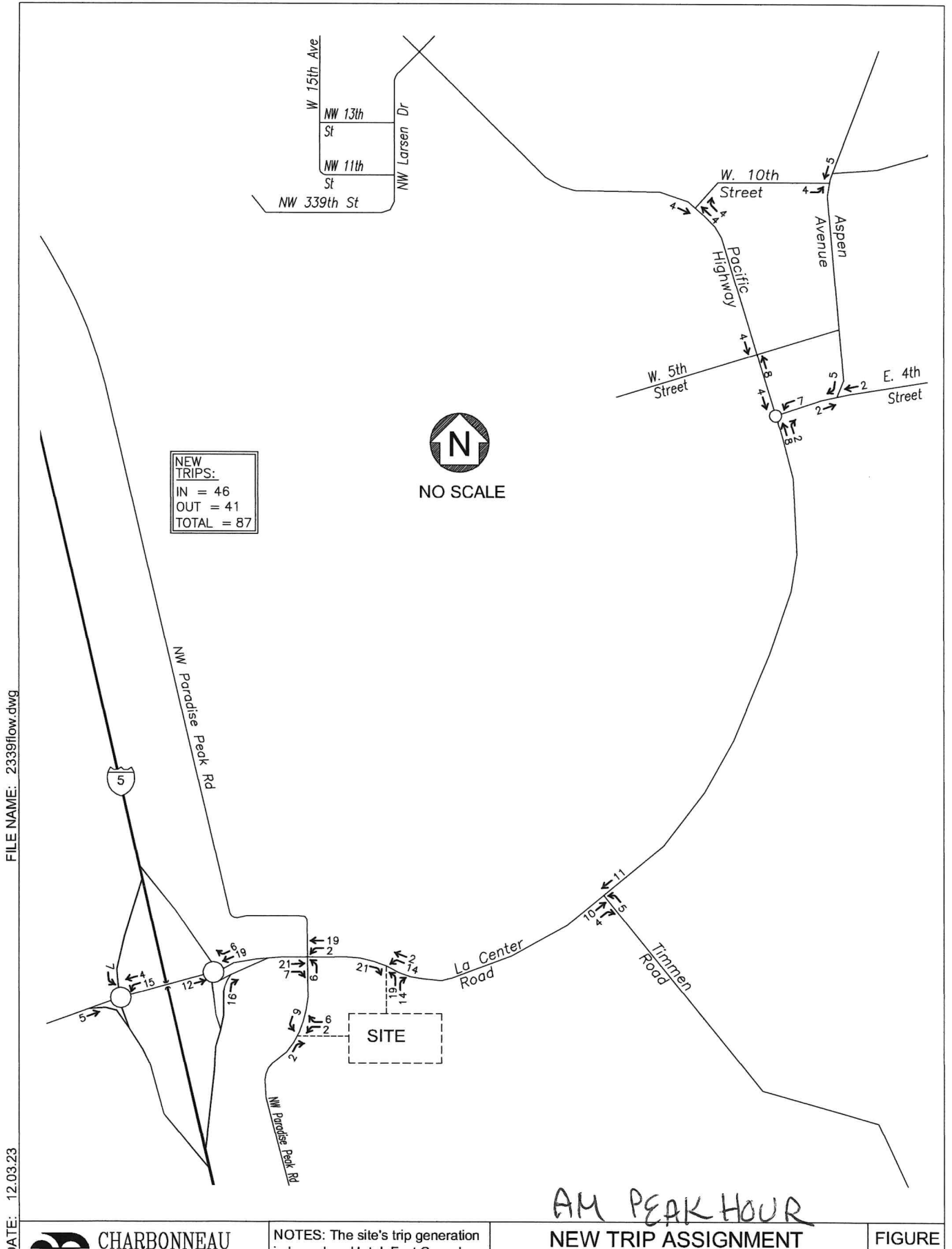
It is recommended that the City of La Center support the proposed development without the application of traffic impact fees as the projected number of site trips falls below the vested number of peak hour trips (199 trips) identified in the City's development agreement with Minit Management.

If you should need any additional traffic engineering support on this project or if there are any further questions, please contact Frank Charbonneau, PE, PTOE at 503.293.1118 or email Frank@CharbonneauEngineer.com.

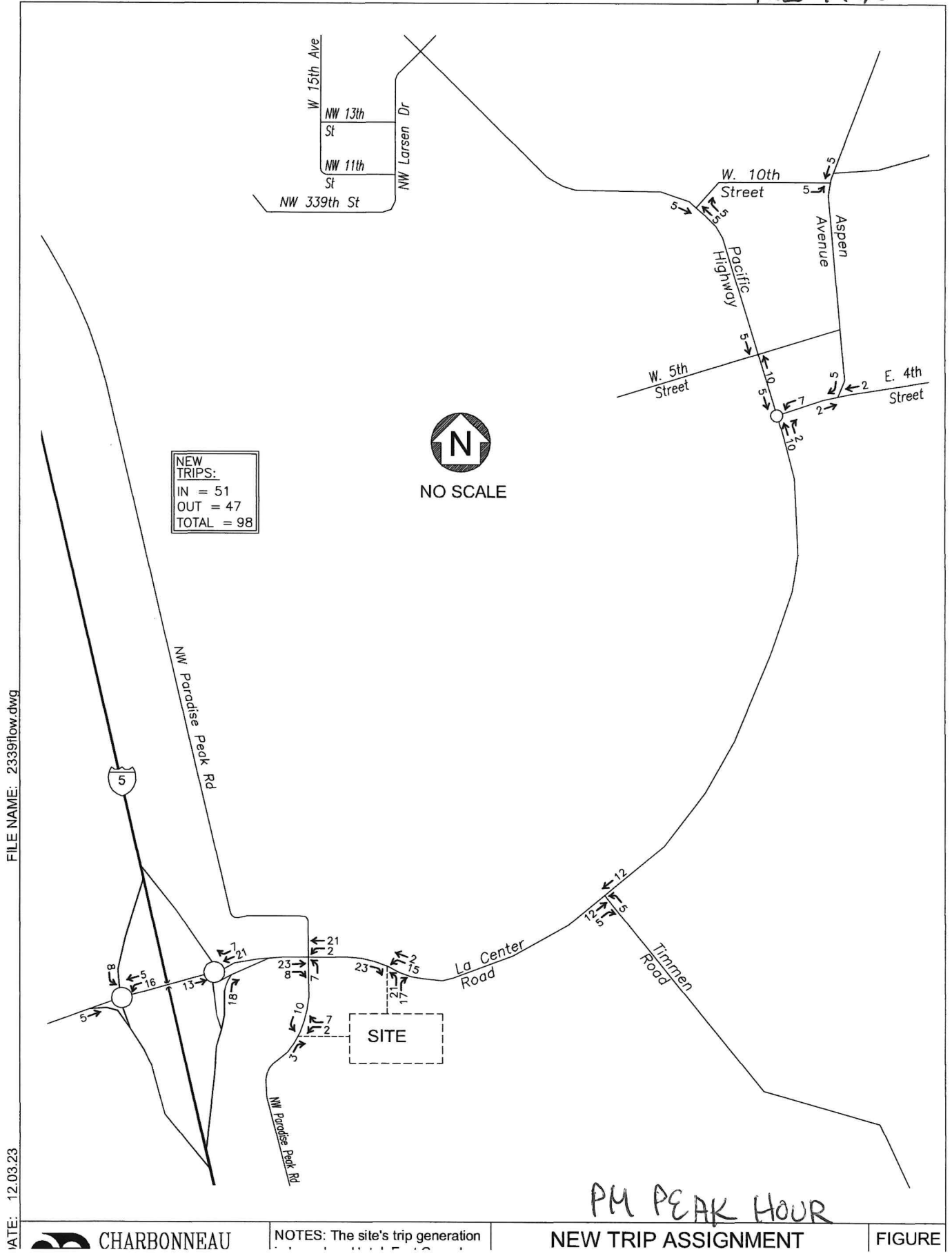
Attachment

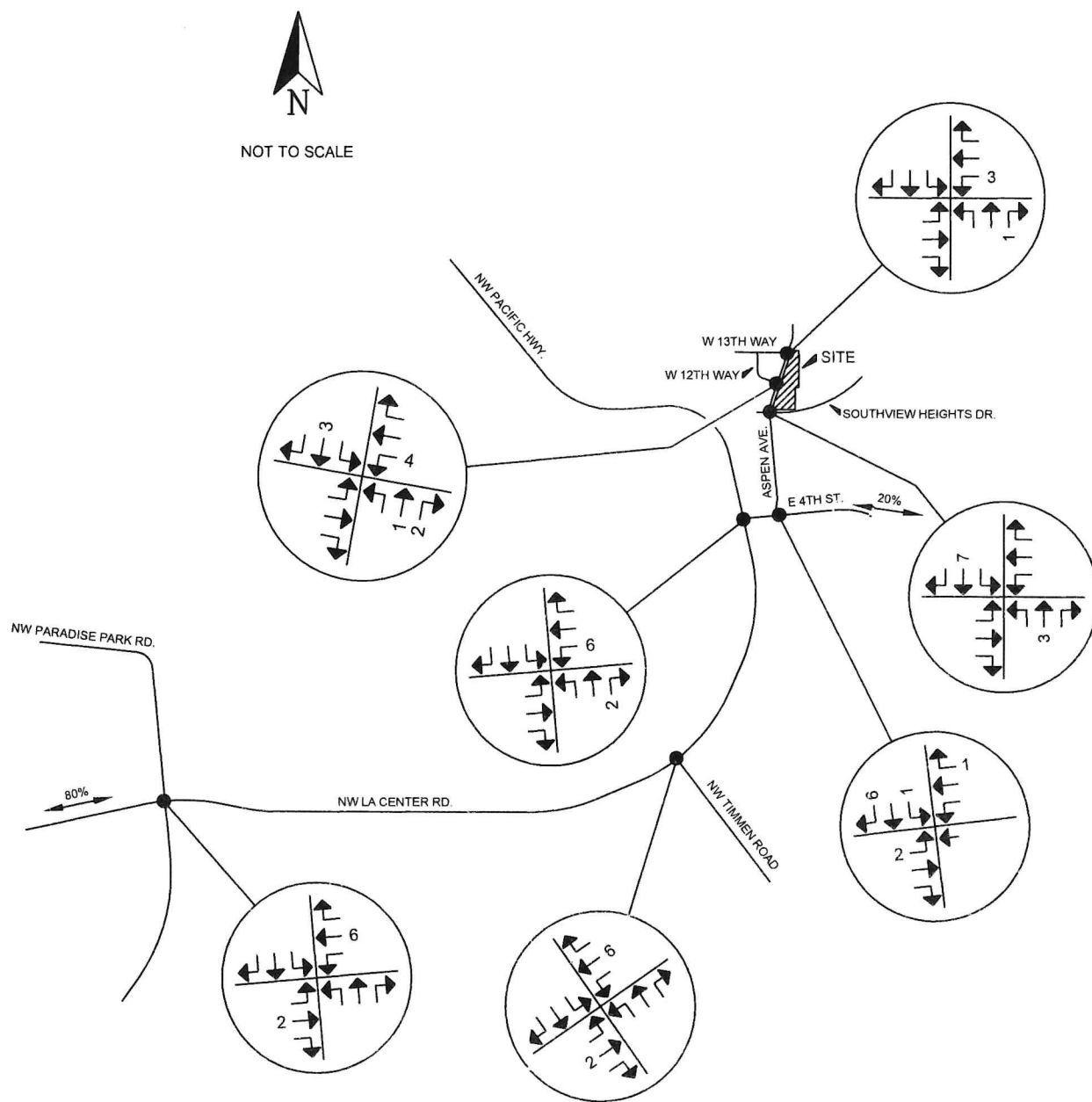
- Site Plan

LA CENTER RETAIL MIX



LA CENTER RETAIL MIX





AM PEAK HOUR SITE TRIPS
IN-3, OUT-7

ASPEN AVENUE SUBDIVISION

FIGURE 6a
**SITE TRAFFIC DISTRIBUTION/
ASSIGNMENT, AM PEAK HOUR**

KELLY ENGINEERING
1805 NE 94th St. No. 19, Vancouver, WA 98665
Phone: 360-433-7530

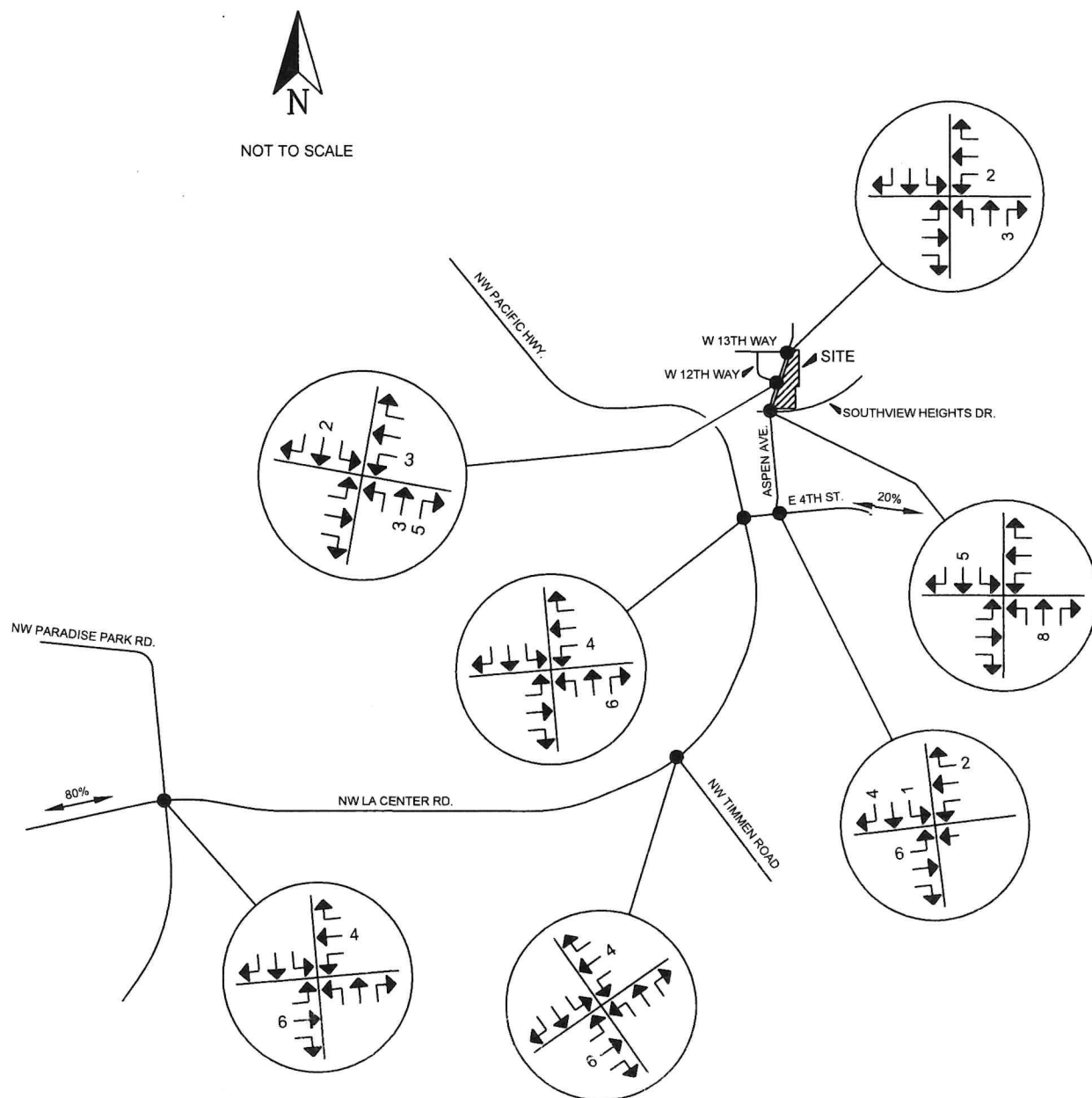
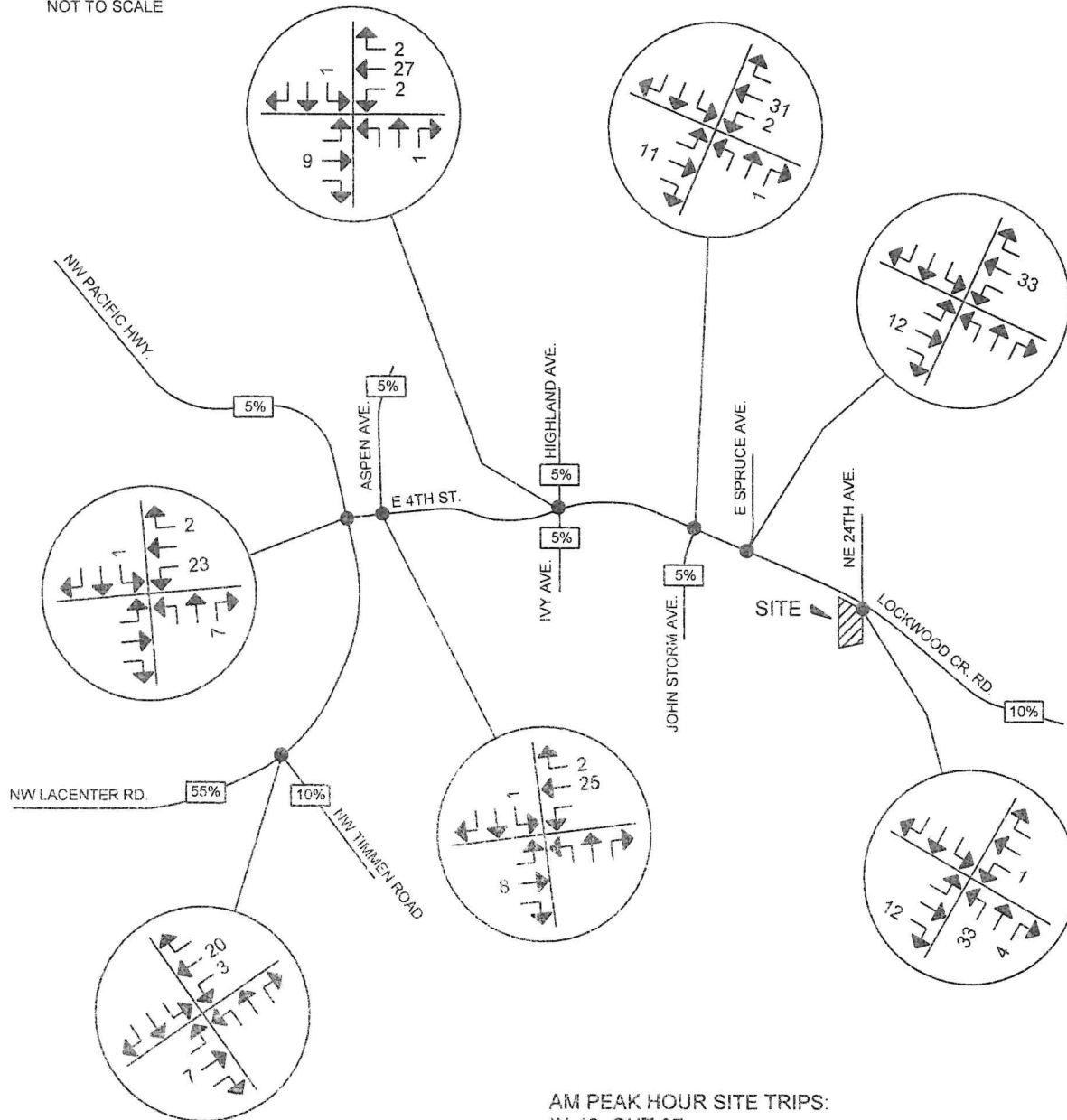


FIGURE 6b
**SITE TRAFFIC DISTRIBUTION/
 ASSIGNMENT, PM PEAK HOUR**

KELLY ENGINEERING
 1805 NE 94th St. No. 19, Vancouver, WA 98665
 Phone: 360-433-7530



NOT TO SCALE



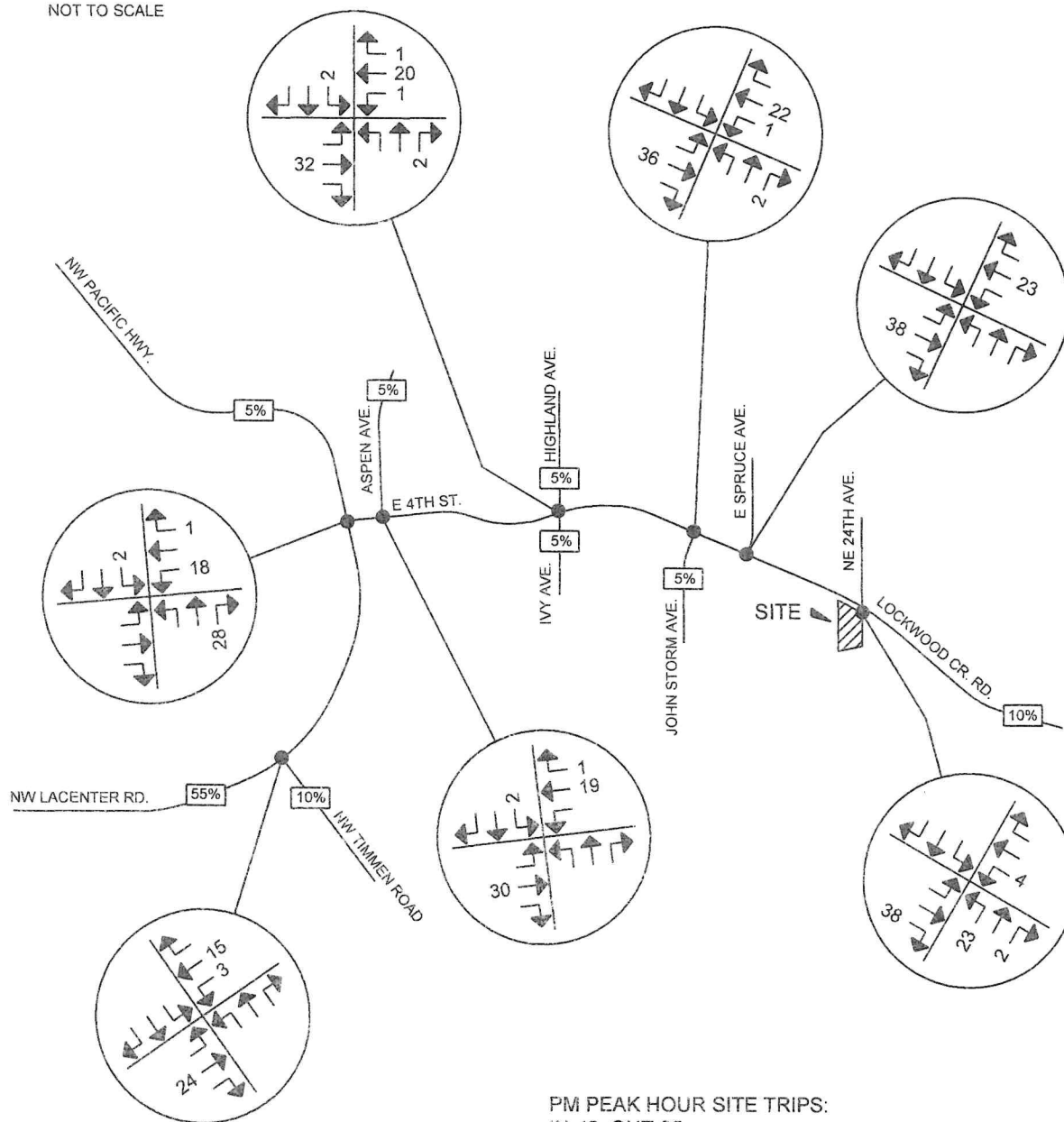
ASA'S VIEW SUBDIVISION

FIGURE 7a
SITE TRAFFIC DISTRIBUTION/ASSIGNMENT
AM PEAK HOUR

KELLY ENGINEERING
1805 NE 94th St. No. 19, Vancouver, WA 98665
Phone: 360-433-7530



NOT TO SCALE



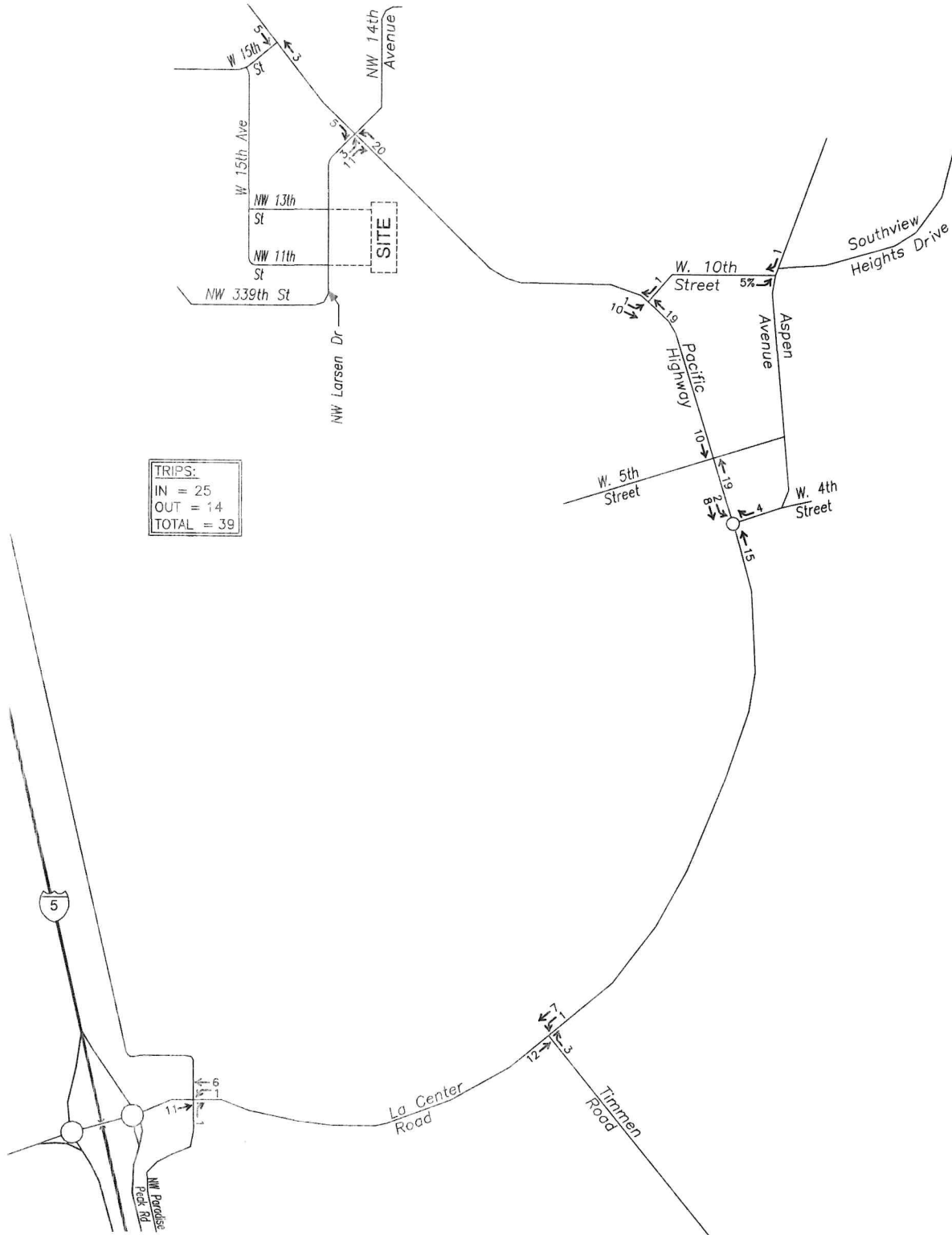
ASA'S VIEW SUBDIVISION

FIGURE 7b
SITE TRAFFIC DISTRIBUTION/ASSIGNMENT
PM PEAK HOUR

KELLY ENGINEERING
1805 NE 94th St. No. 19, Vancouver, WA 98665
Phone: 360-433-7530

FILE NAME: 2327flow.dwg

PLOT DATE: 11.28.23



CHARBONNEAU
ENGINEERING LLC

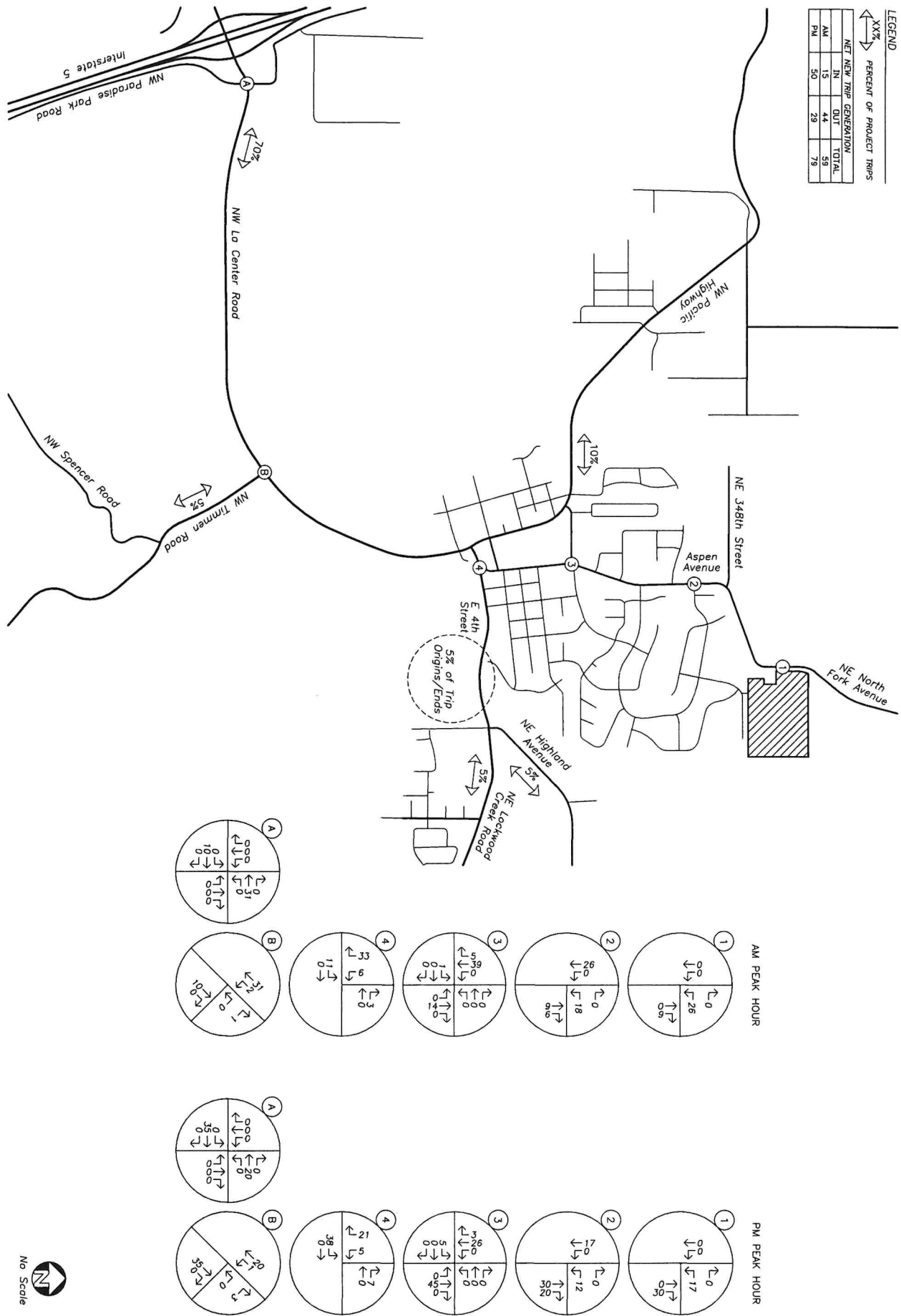
PROJECT: 23-27

NOTES: The site's trip generation
is based on Single-Family
Detached Housing (ITE 210) trip
rates.

TRIP ASSIGNMENT
PM PEAK HOUR
LARSEN DRIVE SUBDIVISION

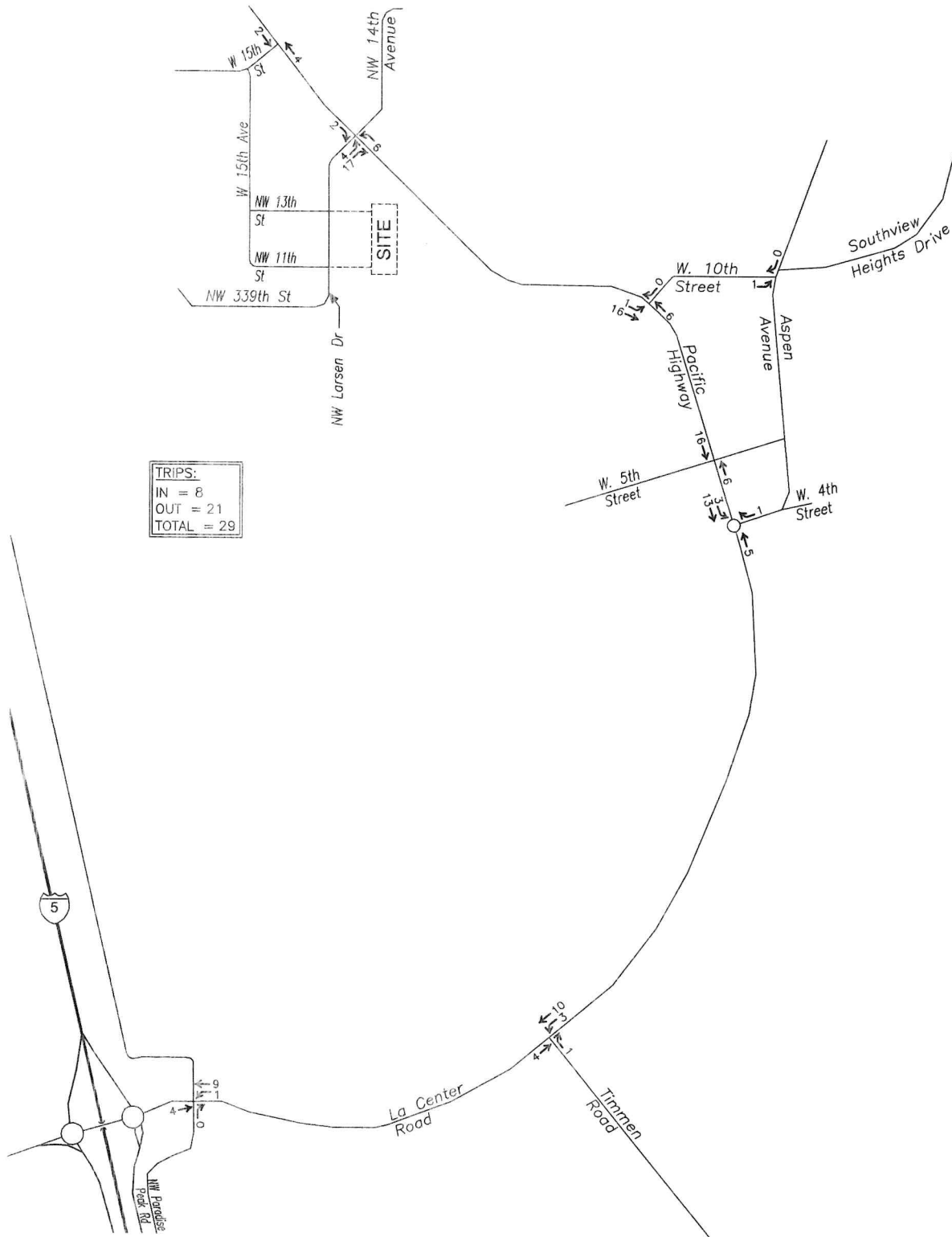
FIGURE

5b



FILE NAME: 2327flow.dwg

PLOT DATE: 11.28.23



CHARBONNEAU
ENGINEERING LLC

PROJECT: 23-27

NOTES: The site's trip generation
is based on Single-Family
Detached Housing (ITE 210) trip
rates.

TRIP ASSIGNMENT
AM PEAK HOUR
LARSEN DRIVE SUBDIVISION

FIGUR

5a

APPENDIX D
LEVEL OF SERVICE COMPUTER PRINTOUTS

TWO-WAY STOP CONTROL SUMMARY

General Information		Site Information	
Analyst	DSK	Intersection	Pacific Hwy. & D Ave.
Agency/Co.	Kelly Engineering	Jurisdiction	City of La Center
Date Performed	1/30/2025	Analysis Year	2025
Analysis Time Period	AM Peak Hour		
Project Description Existing			
East/West Street: Pacific Hwy.		North/South Street: D Ave.	
Intersection Orientation: East-West		Study Period (hrs): 0.25	

Vehicle Volumes and Adjustments						
Major Street	Eastbound			Westbound		
Movement	1	2	3	4	5	6
	L	T	R	L	T	R
Volume (veh/h)	1	197	1	1	100	12
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92
Hourly Flow Rate, HFR (veh/h)	1	214	1	1	108	13
Percent Heavy Vehicles	0	--	--	0	--	--
Median Type	Undivided					
RT Channelized			0			0
Lanes	0	1	0	0	1	0
Configuration	LTR			LTR		
Upstream Signal		0			0	
Minor Street	Northbound			Southbound		
Movement	7	8	9	10	11	12
	L	T	R	L	T	R
Volume (veh/h)	0	0	1	21	1	1
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92
Hourly Flow Rate, HFR (veh/h)	0	0	1	22	1	1
Percent Heavy Vehicles	0	0	0	0	0	0
Percent Grade (%)	0			0		
Flared Approach		N			N	
Storage		0			0	
RT Channelized			0			0
Lanes	0	1	0	0	1	0
Configuration		LTR			LTR	

Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	LTR	LTR		LTR			LTR	
v (veh/h)	1	1		1			24	
C (m) (veh/h)	1479	1367		831			630	
v/c	0.00	0.00		0.00			0.04	
95% queue length	0.00	0.00		0.00			0.12	
Control Delay (s/veh)	7.4	7.6		9.3			10.9	
LOS	A	A		A			B	
Approach Delay (s/veh)	--	--	9.3			10.9		
Approach LOS	--	--	A			B		

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK			Intersection	Pacific Hwy. & D Ave.			
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center			
Date Performed	1/30/2025			Analysis Year	2028			
Analysis Time Period	AM Peak Hour							
Project Description Year 2028 w/o Project								
East/West Street: Pacific Hwy.				North/South Street: D Ave.				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)	1	233	1	1	121	13		
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92		
Hourly Flow Rate, HFR (veh/h)	1	253	1	1	131	14		
Percent Heavy Vehicles	0	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration	LTR			LTR				
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	0	0	1	22	1	1		
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92		
Hourly Flow Rate, HFR (veh/h)	0	0	1	23	1	1		
Percent Heavy Vehicles	0	0	0	0	0	0		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration		LTR			LTR			
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	LTR	LTR	LTR			LTR		
v (veh/h)	1	1		1			25	
C (m) (veh/h)	1450	1323		790			575	
v/c	0.00	0.00		0.00			0.04	
95% queue length	0.00	0.00		0.00			0.14	
Control Delay (s/veh)	7.5	7.7		9.6			11.5	
LOS	A	A		A			B	
Approach Delay (s/veh)	--	--	9.6			11.5		
Approach LOS	--	--	A			B		

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & D Ave.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2028		
Analysis Time Period	AM Peak Hour						
Project Description Year 2028 with Project							
East/West Street: Pacific Hwy.				North/South Street: D Ave.			
Intersection Orientation: East-West				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	2	233	1	1	121	23	
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92	
Hourly Flow Rate, HFR (veh/h)	2	253	1	1	131	24	
Percent Heavy Vehicles	0	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration	LTR			LTR			
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	0	0	1	50	1	2	
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92	
Hourly Flow Rate, HFR (veh/h)	0	0	1	54	1	2	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration		LTR			LTR		
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	LTR	LTR		LTR			LTR
v (veh/h)	2	1		1			57
C (m) (veh/h)	1438	1323		790			567
v/c	0.00	0.00		0.00			0.10
95% queue length	0.00	0.00		0.00			0.33
Control Delay (s/veh)	7.5	7.7		9.6			12.1
LOS	A	A		A			B
Approach Delay (s/veh)	--	--	9.6			12.1	
Approach LOS	--	--	A			B	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK			Intersection	Pacific Hwy. & D Ave.			
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center			
Date Performed	1/30/2025			Analysis Year	2025			
Analysis Time Period	PM Peak Hour							
Project Description Existing								
East/West Street: Pacific Hwy.				North/South Street: D Ave.				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)	0	162	1	1	248	34		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86		
Hourly Flow Rate, HFR (veh/h)	0	188	1	1	288	39		
Percent Heavy Vehicles	0	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration	LTR			LTR				
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	2	1	1	16	0	1		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86		
Hourly Flow Rate, HFR (veh/h)	2	1	1	18	0	1		
Percent Heavy Vehicles	0	0	0	0	0	0		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration		LTR			LTR			
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	LTR	LTR		LTR			LTR	
v (veh/h)	0	1		4			19	
C (m) (veh/h)	1244	1397		538			491	
v/c	0.00	0.00		0.01			0.04	
95% queue length	0.00	0.00		0.02			0.12	
Control Delay (s/veh)	7.9	7.6		11.7			12.6	
LOS	A	A		B			B	
Approach Delay (s/veh)	--	--	11.7			12.6		
Approach LOS	--	--	B			B		

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK			Intersection	Pacific Hwy. & D Ave.			
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center			
Date Performed	1/30/2025			Analysis Year	2028			
Analysis Time Period	PM Peak Hour							
Project Description Year 2028 w/o Project								
East/West Street: Pacific Hwy.				North/South Street: D Ave.				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)	2	204	1	1	296	36		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86		
Hourly Flow Rate, HFR (veh/h)	2	237	1	1	344	41		
Percent Heavy Vehicles	0	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration	LTR			LTR				
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	2	1	1	17	0	1		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86		
Hourly Flow Rate, HFR (veh/h)	2	1	1	19	0	1		
Percent Heavy Vehicles	0	0	0	0	0	0		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration		LTR			LTR			
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	LTR	LTR		LTR			LTR	
v (veh/h)	2	1		4			20	
C (m) (veh/h)	1185	1341		463			417	
v/c	0.00	0.00		0.01			0.05	
95% queue length	0.01	0.00		0.03			0.15	
Control Delay (s/veh)	8.0	7.7		12.8			14.1	
LOS	A	A		B			B	
Approach Delay (s/veh)	--	--	12.8			14.1		
Approach LOS	--	--	B			B		

TWO-WAY STOP CONTROL SUMMARY								
General Information				Site Information				
Analyst	DSK			Intersection	Pacific Hwy. & D Ave.			
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center			
Date Performed	1/30/2025			Analysis Year	2028			
Analysis Time Period	PM Peak Hour							
Project Description Year 2028 with Project								
East/West Street: Pacific Hwy.				North/South Street: D Ave.				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)	2	204	1	1	296	66		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86		
Hourly Flow Rate, HFR (veh/h)	2	237	1	1	344	76		
Percent Heavy Vehicles	0	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration	LTR			LTR				
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	2	1	1	37	0	2		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86		
Hourly Flow Rate, HFR (veh/h)	2	1	1	43	0	2		
Percent Heavy Vehicles	0	0	0	0	0	0		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	0	1	0	0	1	0		
Configuration		LTR			LTR			
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	LTR	LTR	LTR			LTR		
v (veh/h)	2	1		4			45	
C (m) (veh/h)	1150	1341		450			405	
v/c	0.00	0.00		0.01			0.11	
95% queue length	0.01	0.00		0.03			0.37	
Control Delay (s/veh)	8.1	7.7		13.1			15.0	
LOS	A	A		B			B	
Approach Delay (s/veh)	--	--	13.1			15.0		
Approach LOS	--	--	B			B		

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 10th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2025		
Analysis Time Period	AM Peak Hour						
Project Description Existing							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)		117	8	12	244		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86	
Hourly Flow Rate, HFR (veh/h)	0	136	9	13	283	0	
Percent Heavy Vehicles	0	--	--	8	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration			TR	LT			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)				43		26	
Peak-Hour Factor, PHF	0.74	0.74	0.74	0.86	0.86	0.86	
Hourly Flow Rate, HFR (veh/h)	0	0	0	49	0	30	
Percent Heavy Vehicles	0	0	0	3	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	0	0	0	0	0	
Configuration					LR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration		LT		LR			
v (veh/h)		13		79			
C (m) (veh/h)		1401		657			
v/c		0.01		0.12			
95% queue length		0.03		0.41			
Control Delay (s/veh)		7.6		11.2			
LOS		A		B			
Approach Delay (s/veh)	--	--	11.2				
Approach LOS	--	--	B				

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 10th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2028		
Analysis Time Period	AM Peak Hour						
Project Description Year 2028 w/o Project							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)		139	10	13	283		
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86	
Hourly Flow Rate, HFR (veh/h)	0	161	11	15	329	0	
Percent Heavy Vehicles	0	--	--	8	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration			TR	LT			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)				15		28	
Peak-Hour Factor, PHF	0.74	0.74	0.74	0.86	0.86	0.86	
Hourly Flow Rate, HFR (veh/h)	0	0	0	17	0	32	
Percent Heavy Vehicles	0	0	0	3	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	0	0	0	0	0	
Configuration					LR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration		LT		LR			
v (veh/h)		15		49			
C (m) (veh/h)		1369		701			
v/c		0.01		0.07			
95% queue length		0.03		0.22			
Control Delay (s/veh)		7.7		10.5			
LOS		A		B			
Approach Delay (s/veh)	--	--	10.5				
Approach LOS	--	--	B				

TWO-WAY STOP CONTROL SUMMARY

General Information							Site Information		
Analyst	DSK		Intersection		Pacific Hwy. & 10th St.				
Agency/Co.	Kelly Engineering		Jurisdiction		City of La Center				
Date Performed	1/30/2025		Analysis Year		2028				
Analysis Time Period	AM Peak Hour								
Project Description Year 2028 with Project									
East/West Street: Pacific Hwy.					North/South Street: Pacific Hwy.				
Intersection Orientation: North-South					Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments									
Major Street	Northbound			Southbound					
Movement	1	2	3	4	5	6			
	L	T	R	L	T	R			
Volume (veh/h)		149	10	13	311				
Peak-Hour Factor, PHF	0.86	0.86	0.86	0.86	0.86	0.86			
Hourly Flow Rate, HFR (veh/h)	0	173	11	15	361	0			
Percent Heavy Vehicles	0	--	--	8	--	--			
Median Type	Undivided								
RT Channelized			0			0			
Lanes	0	1	0	0	1	0			
Configuration			TR	LT					
Upstream Signal		0			0				
Minor Street	Eastbound			Westbound					
Movement	7	8	9	10	11	12			
	L	T	R	L	T	R			
Volume (veh/h)				15		28			
Peak-Hour Factor, PHF	0.74	0.74	0.74	0.86	0.86	0.86			
Hourly Flow Rate, HFR (veh/h)	0	0	0	17	0	32			
Percent Heavy Vehicles	0	0	0	3	0	0			
Percent Grade (%)	0			0					
Flared Approach		N			N				
Storage		0			0				
RT Channelized			0			0			
Lanes	0	0	0	0	0	0			
Configuration					LR				
Delay, Queue Length, and Level of Service									
Approach	Northbound	Southbound	Westbound			Eastbound			
Movement	1	4	7	8	9	10	11	12	
Lane Configuration		LT		LR					
v (veh/h)		15		49					
C (m) (veh/h)		1355		677					
v/c		0.01		0.07					
95% queue length		0.03		0.23					
Control Delay (s/veh)		7.7		10.7					
LOS		A		B					
Approach Delay (s/veh)	--	--	10.7						
Approach LOS	--	--	B						

TWO-WAY STOP CONTROL SUMMARY

General Information		Site Information	
Analyst	DSK	Intersection	Pacific Hwy. & 10th St.
Agency/Co.	Kelly Engineering	Jurisdiction	City of La Center
Date Performed	1/30/2025	Analysis Year	2025
Analysis Time Period	PM Peak Hour		
Project Description Existing			
East/West Street: Pacific Hwy.		North/South Street: Pacific Hwy.	
Intersection Orientation: North-South		Study Period (hrs): 0.25	

Vehicle Volumes and Adjustments						
Major Street	Northbound			Southbound		
Movement	1	2	3	4	5	6
	L	T	R	L	T	R
Volume (veh/h)		601	31	34	232	
Peak-Hour Factor, PHF	0.86	0.97	0.97	0.97	0.97	0.86
Hourly Flow Rate, HFR (veh/h)	0	619	31	35	239	0
Percent Heavy Vehicles	0	--	--	1	--	--
Median Type	Undivided					
RT Channelized			0			0
Lanes	0	1	0	0	1	0
Configuration			TR	LT		
Upstream Signal		0			0	
Minor Street	Eastbound			Westbound		
Movement	7	8	9	10	11	12
	L	T	R	L	T	R
Volume (veh/h)				15		45
Peak-Hour Factor, PHF	0.74	0.74	0.74	0.97	0.86	0.97
Hourly Flow Rate, HFR (veh/h)	0	0	0	15	0	46
Percent Heavy Vehicles	0	0	0	0	0	0
Percent Grade (%)	0			0		
Flared Approach		N			N	
Storage		0			0	
RT Channelized			0			0
Lanes	0	0	0	0	0	0
Configuration					LR	

Delay, Queue Length, and Level of Service								
Approach	Northbound	Southbound	Westbound			Eastbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration		LT		LR				
v (veh/h)		35		61				
C (m) (veh/h)		941		411				
v/c		0.04		0.15				
95% queue length		0.12		0.52				
Control Delay (s/veh)		9.0		15.3				
LOS		A		C				
Approach Delay (s/veh)	--	--	15.3					
Approach LOS	--	--	C					

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 10th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2028		
Analysis Time Period	PM Peak Hour						
Project Description Year 2028 w/o Project							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)		619	33	40	245		
Peak-Hour Factor, PHF	0.86	0.97	0.97	0.97	0.97	0.86	
Hourly Flow Rate, HFR (veh/h)	0	638	34	41	252	0	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration			TR	LT			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)				16		48	
Peak-Hour Factor, PHF	0.74	0.74	0.74	0.97	0.86	0.97	
Hourly Flow Rate, HFR (veh/h)	0	0	0	16	0	49	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	0	0	0	0	0	
Configuration					LR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration		LT		LR			
v (veh/h)		41		65			
C (m) (veh/h)		923		394			
v/c		0.04		0.16			
95% queue length		0.14		0.58			
Control Delay (s/veh)		9.1		15.9			
LOS		A		C			
Approach Delay (s/veh)	--	--	15.9				
Approach LOS	--	--	C				

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 10th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2028		
Analysis Time Period	PM Peak Hour						
Project Description Year 2028 with Project							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)		649	33	40	265		
Peak-Hour Factor, PHF	0.86	0.97	0.97	0.97	0.97	0.86	
Hourly Flow Rate, HFR (veh/h)	0	669	34	41	273	0	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration			TR	LT			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)				16		48	
Peak-Hour Factor, PHF	0.74	0.74	0.74	0.97	0.86	0.97	
Hourly Flow Rate, HFR (veh/h)	0	0	0	16	0	49	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	0	0	0	0	0	
Configuration					LR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration		LT		LR			
v (veh/h)		41		65			
C (m) (veh/h)		899		374			
v/c		0.05		0.17			
95% queue length		0.14		0.62			
Control Delay (s/veh)		9.2		16.6			
LOS		A		C			
Approach Delay (s/veh)	--	--	16.6				
Approach LOS	--	--	C				

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 5th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2025		
Analysis Time Period	AM Peak Hour						
Project Description Existing							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	8	137	7	12	283	2	
Peak-Hour Factor, PHF	0.78	0.78	0.78	0.78	0.78	0.78	
Hourly Flow Rate, HFR (veh/h)	10	175	8	15	362	2	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration	LTR			LTR			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	0	0	6	8	2	3	
Peak-Hour Factor, PHF	0.78	0.78	0.78	0.78	0.78	0.78	
Hourly Flow Rate, HFR (veh/h)	0	0	7	10	2	3	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration		LTR			LTR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	LTR	LTR		LTR			LTR
v (veh/h)	10	15		15			7
C (m) (veh/h)	1206	1398		457			686
v/c	0.01	0.01		0.03			0.01
95% queue length	0.03	0.03		0.10			0.03
Control Delay (s/veh)	8.0	7.6		13.1			10.3
LOS	A	A		B			B
Approach Delay (s/veh)	--	--	13.1			10.3	
Approach LOS	--	--	B			B	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 5th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2028		
Analysis Time Period	AM Peak Hour						
Project Description Year 2028 w/o Project							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	8	164	7	13	324	2	
Peak-Hour Factor, PHF	0.78	0.78	0.78	0.78	0.78	0.78	
Hourly Flow Rate, HFR (veh/h)	10	210	8	16	415	2	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration	LTR			LTR			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	0	0	6	8	2	3	
Peak-Hour Factor, PHF	0.78	0.78	0.78	0.78	0.78	0.78	
Hourly Flow Rate, HFR (veh/h)	0	0	7	10	2	3	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration		LTR			LTR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	LTR	LTR		LTR			LTR
v (veh/h)	10	16		15			7
C (m) (veh/h)	1153	1358		401			641
v/c	0.01	0.01		0.04			0.01
95% queue length	0.03	0.04		0.12			0.03
Control Delay (s/veh)	8.1	7.7		14.3			10.7
LOS	A	A		B			B
Approach Delay (s/veh)	--	--	14.3			10.7	
Approach LOS	--	--	B			B	

TWO-WAY STOP CONTROL SUMMARY

General Information		Site Information	
Analyst	DSK	Intersection	Pacific Hwy. & 5th St.
Agency/Co.	Kelly Engineering	Jurisdiction	City of La Center
Date Performed	1/30/2025	Analysis Year	2028
Analysis Time Period	AM Peak Hour		
Project Description Year 2028 with Project			
East/West Street: Pacific Hwy.		North/South Street: Pacific Hwy.	
Intersection Orientation: North-South		Study Period (hrs): 0.25	

Vehicle Volumes and Adjustments						
Major Street	Northbound			Southbound		
Movement	1	2	3	4	5	6
	L	T	R	L	T	R
Volume (veh/h)	8	174	7	13	352	2
Peak-Hour Factor, PHF	0.78	0.78	0.78	0.78	0.78	0.78
Hourly Flow Rate, HFR (veh/h)	10	223	8	16	451	2
Percent Heavy Vehicles	0	--	--	1	--	--
Median Type	Undivided					
RT Channelized			0			0
Lanes	0	1	0	0	1	0
Configuration	LTR			LTR		
Upstream Signal		0			0	
Minor Street	Eastbound			Westbound		
Movement	7	8	9	10	11	12
	L	T	R	L	T	R
Volume (veh/h)	0	0	6	8	2	3
Peak-Hour Factor, PHF	0.78	0.78	0.78	0.78	0.78	0.78
Hourly Flow Rate, HFR (veh/h)	0	0	7	10	2	3
Percent Heavy Vehicles	0	0	0	0	0	0
Percent Grade (%)	0			0		
Flared Approach		N			N	
Storage		0			0	
RT Channelized			0			0
Lanes	0	1	0	0	1	0
Configuration		LTR			LTR	

Delay, Queue Length, and Level of Service								
Approach	Northbound	Southbound	Westbound			Eastbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	LTR	LTR		LTR			LTR	
v (veh/h)	10	16		15			7	
C (m) (veh/h)	1118	1343		374			612	
v/c	0.01	0.01		0.04			0.01	
95% queue length	0.03	0.04		0.13			0.03	
Control Delay (s/veh)	8.2	7.7		15.0			11.0	
LOS	A	A		C			B	
Approach Delay (s/veh)	--	--	15.0			11.0		
Approach LOS	--	--	C			B		

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 5th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2025		
Analysis Time Period	PM Peak Hour						
Project Description Existing							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	5	605	17	11	233	2	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	5	650	18	11	250	2	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration	LTR			LTR			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	2	2	2	18	3	10	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	2	2	2	19	3	10	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration		LTR			LTR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	LTR	LTR	LTR			LTR	
v (veh/h)	5	11		32			6
C (m) (veh/h)	1325	927		284			316
v/c	0.00	0.01		0.11			0.02
95% queue length	0.01	0.04		0.38			0.06
Control Delay (s/veh)	7.7	8.9		19.3			16.6
LOS	A	A		C			C
Approach Delay (s/veh)	--	--	19.3			16.6	
Approach LOS	--	--	C			C	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 5th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2025		
Analysis Time Period	PM Peak Hour						
Project Description Year 2028 w/o Project							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	5	667	31	11	264	2	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	5	717	33	11	283	2	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration	LTR			LTR			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	2	2	2	32	3	14	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	2	2	2	34	3	15	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration		LTR			LTR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	LTR	LTR		LTR			LTR
v (veh/h)	5	11		52			6
C (m) (veh/h)	1289	864		239			270
v/c	0.00	0.01		0.22			0.02
95% queue length	0.01	0.04		0.81			0.07
Control Delay (s/veh)	7.8	9.2		24.2			18.6
LOS	A	A		C			C
Approach Delay (s/veh)	--	--	24.2			18.6	
Approach LOS	--	--	C			C	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	Pacific Hwy. & 5th St.		
Agency/Co.	Kelly Engineering			Jurisdiction	City of La Center		
Date Performed	1/30/2025			Analysis Year	2028		
Analysis Time Period	PM Peak Hour						
Project Description Year 2028 with Project							
East/West Street: Pacific Hwy.				North/South Street: Pacific Hwy.			
Intersection Orientation: North-South				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Northbound			Southbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	5	687	31	11	279	2	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	5	738	33	11	299	2	
Percent Heavy Vehicles	0	--	--	1	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration	LTR			LTR			
Upstream Signal		0			0		
Minor Street	Eastbound			Westbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	2	2	2	32	3	14	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	2	2	2	34	3	15	
Percent Heavy Vehicles	0	0	0	0	0	0	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	0	1	0	0	1	0	
Configuration		LTR			LTR		
Delay, Queue Length, and Level of Service							
Approach	Northbound	Southbound	Westbound			Eastbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	LTR	LTR		LTR			LTR
v (veh/h)	5	11		52			6
C (m) (veh/h)	1272	848		227			257
v/c	0.00	0.01		0.23			0.02
95% queue length	0.01	0.04		0.86			0.07
Control Delay (s/veh)	7.8	9.3		25.5			19.3
LOS	A	A		D			C
Approach Delay (s/veh)	--	--	25.5			19.3	
Approach LOS	--	--	D			C	

ROUNABOUT REPORT

General Information

Analyst DSK
 Agency or Co. Kelly Engineering
 Date Performed 1/31/2025
 Time Period AM Peak Hour
 Peak Hour Factor 0.88

Site Information

Intersection Pacific Hwy. @ 4th St.
 E/W Street Name 4th St.
 N/S Street Name Pacific Hwy.
 Analysis Year 2025
 Project ID Existing

Project Description:

Volume Adjustment and Site Characteristics

	EB				WB				NB				SB			
	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	U
Number of Lanes (N)	0	0	0		0	0	0		0	1	0		0	1	0	
Lane Assignment							LR				T				LT	
Right-Turn Bypass	None				None				Non-Yielding				None			
Conflicting Lanes	1				1				1				1			
Volume (V), veh/h				0	538		81	0		108		0	99	217		0
Heavy Veh. Adj. (f_{HV}), %	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3
Pedestrians Crossing	0				0				0				0			

Critical and Follow-Up Headway Adjustment

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Critical Headway (sec)	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929
Follow-Up Headway (sec)	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858

Flow Computations

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Circulating Flow (V_c), pc/h	1000			126			116			630		
Exiting Flow (V_{ex}), pc/h	116			0			221			884		
Entry Flow (V_e), pc/h					725			126	308		370	
Entry Volume veh/h					704			122	299		359	

Capacity and v/c Ratios

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Capacity (c_{PCE}), pc/h		0			996			1006			602	
Capacity (c), veh/h		0			967			977			584	
v/c Ratio (X)					0.73			0.13			0.62	

Delay and Level of Service

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Lane Control Delay (d), s/veh					16.6			4.8	0.0		18.6	
Lane LOS		F			C			A			C	
Lane 95% Queue					6.7			0.4			4.2	
Approach Delay, s/veh				16.62			1.40			18.59		
Approach LOS, s/veh				C			A			C		
Intersection Delay, s/veh	12.78											
Intersection LOS	B											

ROUNABOUT REPORT

General Information

Analyst DSK
 Agency or Co. Kelly Engineering
 Date Performed 1/31/2025
 Time Period AM Peak Hour
 Peak Hour Factor 0.88

Site Information

Intersection Pacific Hwy. @ 4th St.
 E/W Street Name 4th St.
 N/S Street Name Pacific Hwy.
 Analysis Year 2028
 Project ID Year 2028 w/o Project

Project Description:

Volume Adjustment and Site Characteristics

	EB				WB				NB				SB			
	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	U
Number of Lanes (N)	0	0	0		0	0	0		0	1	0		0	1	0	
Lane Assignment							LR				T				LT	
Right-Turn Bypass	None				None				Non-Yielding				None			
Conflicting Lanes	1				1				1				1			
Volume (V), veh/h				0	647		91	0		131		0	108	251		0
Heavy Veh. Adj. (f_{HV}), %	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3
Pedestrians Crossing	0				0				0				0			

Critical and Follow-Up Headway Adjustment

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Critical Headway (sec)	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929
Follow-Up Headway (sec)	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858

Flow Computations

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Circulating Flow (V_c), pc/h	1177			153			126			757		
Exiting Flow (V_{ex}), pc/h	126			0			260			1051		
Entry Flow (V_e), pc/h					864			153	386		420	
Entry Volume veh/h					839			149	375		408	

Capacity and v/c Ratios

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Capacity (c_{PCE}), pc/h		0			969			996			530	
Capacity (c), veh/h		0			941			967			514	
v/c Ratio (X)					0.89			0.15			0.79	

Delay and Level of Service

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Lane Control Delay (d), s/veh					30.0			5.2	0.0		32.8	
Lane LOS		F			D			A			D	
Lane 95% Queue					12.5			0.5			7.4	
Approach Delay, s/veh				30.02			1.47			32.75		
Approach LOS, s/veh				D			A			D		
Intersection Delay, s/veh	22.20											
Intersection LOS	C											

ROUNABOUT REPORT

General Information

Analyst DSK
 Agency or Co. Kelly Engineering
 Date Performed 1/31/2025
 Time Period AM Peak Hour
 Peak Hour Factor 0.88

Site Information

Intersection Pacific Hwy. @ 4th St.
 E/W Street Name 4th St.
 N/S Street Name Pacific Hwy.
 Analysis Year 2028
 Project ID Year 2028 with Project

Project Description:

Volume Adjustment and Site Characteristics

	EB				WB				NB				SB			
	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	U
Number of Lanes (N)	0	0	0		0	0	0		0	1	0		0	1	0	
Lane Assignment							LR				T				LT	
Right-Turn Bypass	None				None				Non-Yielding				None			
Conflicting Lanes	1				1				1				1			
Volume (V), veh/h				0	647		94	0		138		0	117	270		0
Heavy Veh. Adj. (f_{HV}), %	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3
Pedestrians Crossing	0				0				0				0			

Critical and Follow-Up Headway Adjustment

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Critical Headway (sec)	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929
Follow-Up Headway (sec)	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858

Flow Computations

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Circulating Flow (V_c), pc/h	1210			162			137			757		
Exiting Flow (V_{ex}), pc/h	137			0			272			1073		
Entry Flow (V_e), pc/h					867			162	386		453	
Entry Volume veh/h					842			157	375		440	

Capacity and v/c Ratios

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Capacity (c_{PCE}), pc/h		0			961			985			530	
Capacity (c), veh/h		0			933			957			514	
v/c Ratio (X)					0.90			0.16			0.86	

Delay and Level of Service

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Lane Control Delay (d), s/veh					31.6			5.3	0.0		40.1	
Lane LOS		F			D			A			E	
Lane 95% Queue					13.0			0.6			9.0	
Approach Delay, s/veh				31.65			1.57			40.05		
Approach LOS, s/veh				D			A			E		
Intersection Delay, s/veh	24.87											
Intersection LOS	C											

ROUNABOUT REPORT

General Information

Analyst DSK
 Agency or Co. Kelly Engineering
 Date Performed 1/31/2025
 Time Period PM Peak Hour
 Peak Hour Factor 0.93

Site Information

Intersection Pacific Hwy. @ 4th St.
 E/W Street Name 4th St.
 N/S Street Name Pacific Hwy.
 Analysis Year 2025
 Project ID Existing

Project Description:

Volume Adjustment and Site Characteristics

	EB				WB				NB				SB			
	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	U
Number of Lanes (N)	0	0	0		0	0	0		0	1	0		0	1	0	
Lane Assignment							LR				T				LT	
Right-Turn Bypass	None				None				Non-Yielding				None			
Conflicting Lanes	1				1				1				1			
Volume (V), veh/h				0	317		42	0		219		0	43	154		0
Heavy Veh. Adj. (f_{HV}), %	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Pedestrians Crossing	0				0				0				0			

Critical and Follow-Up Headway Adjustment

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Critical Headway (sec)	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929
Follow-Up Headway (sec)	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858

Flow Computations

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Circulating Flow (V_c), pc/h	553			235			46			341		
Exiting Flow (V_{ex}), pc/h	46			0			281			506		
Entry Flow (V_e), pc/h					386			235	587		212	
Entry Volume veh/h					386			235	587		212	

Capacity and v/c Ratios

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Capacity (c_{PCE}), pc/h		0			893			1079			804	
Capacity (c), veh/h		0			893			1079			804	
v/c Ratio (X)					0.43			0.22			0.26	

Delay and Level of Service

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Lane Control Delay (d), s/veh					9.2			5.4	0.0		7.4	
Lane LOS		F			A			A			A	
Lane 95% Queue					2.2			0.8			1.1	
Approach Delay, s/veh				9.23			1.53			7.39		
Approach LOS, s/veh				A			A			A		
Intersection Delay, s/veh	4.50											
Intersection LOS	A											

ROUNABOUT REPORT

General Information

Analyst DSK
 Agency or Co. Kelly Engineering
 Date Performed 1/31/2025
 Time Period PM Peak Hour
 Peak Hour Factor 0.93

Site Information

Intersection Pacific Hwy. @ 4th St.
 E/W Street Name 4th St.
 N/S Street Name Pacific Hwy.
 Analysis Year 2028
 Project ID Year 2028 w/o Project

Project Description:

Volume Adjustment and Site Characteristics

	EB				WB				NB				SB			
	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	U
Number of Lanes (N)	0	0	0		0	0	0		0	1	0		0	1	0	
Lane Assignment							LR				T				LT	
Right-Turn Bypass	None				None				Non-Yielding				None			
Conflicting Lanes	1				1				1				1			
Volume (V), veh/h				0	473		56	0		264		0	64	182		0
Heavy Veh. Adj. (f_{HV}), %	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Pedestrians Crossing	0				0				0				0			

Critical and Follow-Up Headway Adjustment

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Critical Headway (sec)	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929
Follow-Up Headway (sec)	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858

Flow Computations

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Circulating Flow (V_c), pc/h	774			284			69			509		
Exiting Flow (V_{ex}), pc/h	69			0			344			704		
Entry Flow (V_e), pc/h					569			284	848		265	
Entry Volume veh/h					569			284	848		265	

Capacity and v/c Ratios

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Capacity (c_{PCE}), pc/h		0			851			1055			680	
Capacity (c), veh/h		0			851			1055			680	
v/c Ratio (X)					0.67			0.27			0.39	

Delay and Level of Service

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Lane Control Delay (d), s/veh					15.7			6.0	0.0		10.6	
Lane LOS		F			C			A			B	
Lane 95% Queue					5.3			1.1			1.8	
Approach Delay, s/veh				15.67			1.51			10.58		
Approach LOS, s/veh				C			A			B		
Intersection Delay, s/veh	6.83											
Intersection LOS	A											

ROUNDBOUT REPORT

General Information

Analyst DSK
 Agency or Co. Kelly Engineering
 Date Performed 1/31/2025
 Time Period PM Peak Hour
 Peak Hour Factor 0.93

Site Information

Intersection Pacific Hwy. @ 4th St.
 E/W Street Name 4th St.
 N/S Street Name Pacific Hwy.
 Analysis Year 2028
 Project ID Year 2028 with Project

Project Description:

Volume Adjustment and Site Characteristics

	EB				WB				NB				SB			
	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	U
Number of Lanes (N)	0	0	0		0	0	0		0	1	0		0	1	0	
Lane Assignment							LR				T				LT	
Right-Turn Bypass	None				None				Non-Yielding				None			
Conflicting Lanes	1				1				1				1			
Volume (V), veh/h				0	473		56	0		284		0	70	196		0
Heavy Veh. Adj. (f_{HV}), %	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Pedestrians Crossing	0				0				0				0			

Critical and Follow-Up Headway Adjustment

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Critical Headway (sec)	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929	5.1929
Follow-Up Headway (sec)	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858	3.1858

Flow Computations

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Circulating Flow (V_c), pc/h	795			305			75			509		
Exiting Flow (V_{ex}), pc/h	75			0			366			719		
Entry Flow (V_e), pc/h					569			305	848		286	
Entry Volume veh/h					569			305	848		286	

Capacity and v/c Ratios

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Capacity (c_{PCE}), pc/h		0			833			1048			680	
Capacity (c), veh/h		0			833			1048			680	
v/c Ratio (X)					0.68			0.29			0.42	

Delay and Level of Service

	EB			WB			NB			SB		
	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass	Left	Right	Bypass
Lane Control Delay (d), s/veh					16.5			6.3	0.0		11.2	
Lane LOS		F			C			A			B	
Lane 95% Queue					5.5			1.2			2.1	
Approach Delay, s/veh				16.51			1.66			11.18		
Approach LOS, s/veh				C			A			B		
Intersection Delay, s/veh	7.23											
Intersection LOS	A											

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK			Intersection	La Center Road & Timmen Rd.			
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center			
Date Performed	1/31/2025			Analysis Year	2025			
Analysis Time Period	AM Peak Hour							
Project Description Existing								
East/West Street: NW La Center Road				North/South Street: Timmen Road				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)		261	13	66	710			
Peak-Hour Factor, PHF	0.87	0.87	0.87	0.87	0.87	0.87		
Hourly Flow Rate, HFR (veh/h)	0	299	14	75	816	0		
Percent Heavy Vehicles	49	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	0	2	0	1	1	0		
Configuration		T	TR	L	T			
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	23		36					
Peak-Hour Factor, PHF	0.87	0.87	0.87	0.87	0.87	0.87		
Hourly Flow Rate, HFR (veh/h)	26	0	41	0	0	0		
Percent Heavy Vehicles	0	0	3	15	1	65		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	1	0	1	0	0	0		
Configuration	L		R					
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration		L	L		R			
v (veh/h)		75	26		41			
C (m) (veh/h)		1259	152		885			
v/c		0.06	0.17		0.05			
95% queue length		0.19	0.60		0.15			
Control Delay (s/veh)		8.0	33.5		9.3			
LOS		A	D		A			
Approach Delay (s/veh)	--	--	18.7					
Approach LOS	--	--	C					

TWO-WAY STOP CONTROL SUMMARY

General Information							Site Information		
Analyst	DSK			Intersection	La Center Road & Timmen Rd.				
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center				
Date Performed	1/31/2025			Analysis Year	2028				
Analysis Time Period	AM Peak Hour								
Project Description YeAr 2028 w/o Project									
East/West Street: NW La Center Road				North/South Street: Timmen Road					
Intersection Orientation: East-West				Study Period (hrs): 0.25					
Vehicle Volumes and Adjustments									
Major Street	Eastbound			Westbound					
Movement	1	2	3	4	5	6			
	L	T	R	L	T	R			
Volume (veh/h)		330	18	84	837				
Peak-Hour Factor, PHF	0.87	0.87	0.87	0.87	0.87	0.87			
Hourly Flow Rate, HFR (veh/h)	0	379	20	96	962	0			
Percent Heavy Vehicles	49	--	--	0	--	--			
Median Type	Undivided								
RT Channelized			0			0			
Lanes	0	2	0	1	1	0			
Configuration		T	TR	L	T				
Upstream Signal		0			0				
Minor Street	Northbound			Southbound					
Movement	7	8	9	10	11	12			
	L	T	R	L	T	R			
Volume (veh/h)	29		50						
Peak-Hour Factor, PHF	0.87	0.87	0.87	0.87	0.87	0.87			
Hourly Flow Rate, HFR (veh/h)	33	0	57	0	0	0			
Percent Heavy Vehicles	0	0	3	15	1	65			
Percent Grade (%)	0			0					
Flared Approach		N			N				
Storage		0			0				
RT Channelized			0			0			
Lanes	1	0	1	0	0	0			
Configuration	L		R						
Delay, Queue Length, and Level of Service									
Approach	Eastbound	Westbound	Northbound			Southbound			
Movement	1	4	7	8	9	10	11	12	
Lane Configuration		L	L		R				
v (veh/h)		96	33		57				
C (m) (veh/h)		1171	99		836				
v/c		0.08	0.33		0.07				
95% queue length		0.27	1.30		0.22				
Control Delay (s/veh)		8.3	58.6		9.6				
LOS		A	F		A				
Approach Delay (s/veh)	--	--	27.6						
Approach LOS	--	--	D						

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	La Center Road & Timmen Rd.		
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center		
Date Performed	1/31/2025			Analysis Year	2028		
Analysis Time Period	AM Peak Hour						
Project Description YeAr 2028 with Project							
East/West Street: NW La Center Road				North/South Street: Timmen Road			
Intersection Orientation: East-West				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)		336	18	84	855		
Peak-Hour Factor, PHF	0.87	0.87	0.87	0.87	0.87	0.87	
Hourly Flow Rate, HFR (veh/h)	0	386	20	96	982	0	
Percent Heavy Vehicles	49	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	2	0	1	1	0	
Configuration		T	TR	L	T		
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	29		50				
Peak-Hour Factor, PHF	0.87	0.87	0.87	0.87	0.87	0.87	
Hourly Flow Rate, HFR (veh/h)	33	0	57	0	0	0	
Percent Heavy Vehicles	0	0	3	15	1	65	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	1	0	1	0	0	0	
Configuration	L		R				
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11
Lane Configuration		L	L		R		
v (veh/h)		96	33		57		
C (m) (veh/h)		1164	95		833		
v/c		0.08	0.35		0.07		
95% queue length		0.27	1.36		0.22		
Control Delay (s/veh)		8.4	61.8		9.6		
LOS		A	F		A		
Approach Delay (s/veh)	--	--	28.8				
Approach LOS	--	--	D				

TWO-WAY STOP CONTROL SUMMARY							
General Information				Site Information			
Analyst	DSK			Intersection	La Center Road & Timmen Rd.		
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center		
Date Performed	1/31/2025			Analysis Year	2025		
Analysis Time Period	PM Peak Hour						
Project Description Existing							
East/West Street: NW La Center Road				North/South Street: Timmen Road			
Intersection Orientation: East-West				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)		695	36	58	389		
Peak-Hour Factor, PHF	0.87	0.89	0.89	0.89	0.89	0.87	
Hourly Flow Rate, HFR (veh/h)	0	780	40	65	437	0	
Percent Heavy Vehicles	49	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	0	2	0	1	1	0	
Configuration		T	TR	L	T		
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	33		117				
Peak-Hour Factor, PHF	0.89	0.87	0.89	0.87	0.87	0.87	
Hourly Flow Rate, HFR (veh/h)	37	0	131	0	0	0	
Percent Heavy Vehicles	6	0	0	15	1	65	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	1	0	1	0	0	0	
Configuration	L		R				
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11 12
Lane Configuration		L	L		R		
v (veh/h)		65	37		131		
C (m) (veh/h)		818	122		646		
v/c		0.08	0.30		0.20		
95% queue length		0.26	1.18		0.75		
Control Delay (s/veh)		9.8	46.9		12.0		
LOS		A	E		B		
Approach Delay (s/veh)	--	--	19.7				
Approach LOS	--	--	C				

TWO-WAY STOP CONTROL SUMMARY

General Information							Site Information		
Analyst	DSK			Intersection	La Center Road & Timmen Rd.				
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center				
Date Performed	1/31/2025			Analysis Year	2028				
Analysis Time Period	PM Peak Hour								
Project Description Year 2028 w/o Project									
East/West Street: NW La Center Road				North/South Street: Timmen Road					
Intersection Orientation: East-West				Study Period (hrs): 0.25					
Vehicle Volumes and Adjustments									
Major Street	Eastbound			Westbound					
Movement	1	2	3	4	5	6			
	L	T	R	L	T	R			
Volume (veh/h)		965	38	62	567				
Peak-Hour Factor, PHF	0.87	0.89	0.89	0.89	0.89	0.87			
Hourly Flow Rate, HFR (veh/h)	0	1084	42	69	637	0			
Percent Heavy Vehicles	49	--	--	0	--	--			
Median Type	Undivided								
RT Channelized			0			0			
Lanes	0	2	0	1	1	0			
Configuration		T	TR	L	T				
Upstream Signal		0			0				
Minor Street	Northbound			Southbound					
Movement	7	8	9	10	11	12			
	L	T	R	L	T	R			
Volume (veh/h)	35		138						
Peak-Hour Factor, PHF	0.89	0.87	0.89	0.87	0.87	0.87			
Hourly Flow Rate, HFR (veh/h)	39	0	155	0	0	0			
Percent Heavy Vehicles	6	0	0	15	1	65			
Percent Grade (%)	0			0					
Flared Approach		N			N				
Storage		0			0				
RT Channelized			0			0			
Lanes	1	0	1	0	0	0			
Configuration	L		R						
Delay, Queue Length, and Level of Service									
Approach	Eastbound	Westbound	Northbound			Southbound			
Movement	1	4	7	8	9	10	11	12	
Lane Configuration		L	L		R				
v (veh/h)		69	39		155				
C (m) (veh/h)		628	53		530				
v/c		0.11	0.74		0.29				
95% queue length		0.37	3.05		1.21				
Control Delay (s/veh)		11.4	174.8		14.6				
LOS		B	F		B				
Approach Delay (s/veh)	--	--	46.8						
Approach LOS	--	--	E						

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK			Intersection	La Center Road & Timmen Rd.			
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center			
Date Performed	1/31/2025			Analysis Year	2028			
Analysis Time Period	PM Peak Hour							
Project Description Year 2028 with Project								
East/West Street: NW La Center Road				North/South Street: Timmen Road				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)		982	38	62	579			
Peak-Hour Factor, PHF	0.87	0.89	0.89	0.89	0.89	0.87		
Hourly Flow Rate, HFR (veh/h)	0	1103	42	69	650	0		
Percent Heavy Vehicles	49	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	0	2	0	1	1	0		
Configuration		T	TR	L	T			
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	35		138					
Peak-Hour Factor, PHF	0.89	0.87	0.89	0.87	0.87	0.87		
Hourly Flow Rate, HFR (veh/h)	39	0	155	0	0	0		
Percent Heavy Vehicles	6	0	0	15	1	65		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	1	0	1	0	0	0		
Configuration	L		R					
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration		L	L		R			
v (veh/h)		69	39		155			
C (m) (veh/h)		618	51		523			
v/c		0.11	0.76		0.30			
95% queue length		0.38	3.15		1.23			
Control Delay (s/veh)		11.6	187.2		14.8			
LOS		B	F		B			
Approach Delay (s/veh)	--	--	49.4					
Approach LOS	--	--	E					

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	La Center Rd. & Paradise Park		
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center		
Date Performed	1/31/2025			Analysis Year	2025		
Analysis Time Period	AM Peak Hour						
Project Description Existing							
East/West Street: NW La Center Road				North/South Street: Paraadise Park Road			
Intersection Orientation: East-West				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	21	260	5	0	670	13	
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92	
Hourly Flow Rate, HFR (veh/h)	22	282	5	0	728	14	
Percent Heavy Vehicles	0	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	1	1	1	1	1	0	
Configuration	L	T	R	L		TR	
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	4	1	0	6	0	37	
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92	
Hourly Flow Rate, HFR (veh/h)	4	1	0	6	0	40	
Percent Heavy Vehicles	0	0	0	100	0	22	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	1	1	0	1	1	0	
Configuration	L		TR	L		TR	
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	L	L	L		TR	L	TR
v (veh/h)	22	0	4		1	6	40
C (m) (veh/h)	874	1287	173		217	130	388
v/c	0.03	0.00	0.02		0.00	0.05	0.10
95% queue length	0.08	0.00	0.07		0.01	0.14	0.34
Control Delay (s/veh)	9.2	7.8	26.3		21.7	34.0	15.3
LOS	A	A	D		C	D	C
Approach Delay (s/veh)	--	--	25.4			17.8	
Approach LOS	--	--	D			C	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK	Intersection	La Center Rd. & Paradise Park					
Agency/Co.	Kelly Engoneering	Jurisdiction	City of La Center					
Date Performed	1/31/2025	Analysis Year	2028					
Analysis Time Period	AM Peak Hour							
Project Description Year 2028 w/o Project								
East/West Street: NW La Center Road				North/South Street: Paraadise Park Road				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)	37	322	12	3	782	33		
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92		
Hourly Flow Rate, HFR (veh/h)	40	349	13	3	849	35		
Percent Heavy Vehicles	0	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	1	1	1	1	1	0		
Configuration	L	T	R	L		TR		
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	10	1	0	24	2	72		
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92		
Hourly Flow Rate, HFR (veh/h)	10	1	0	26	2	78		
Percent Heavy Vehicles	0	0	0	100	0	22		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	1	1	0	1	1	0		
Configuration	L		TR	L		TR		
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	L	L	L		TR	L		TR
v (veh/h)	40	3	10		1	26		80
C (m) (veh/h)	774	1208	94		149	82		316
v/c	0.05	0.00	0.11		0.01	0.32		0.25
95% queue length	0.16	0.01	0.35		0.02	1.19		0.98
Control Delay (s/veh)	9.9	8.0	47.8		29.3	68.1		20.2
LOS	A	A	E		D	F		C
Approach Delay (s/veh)	--	--	46.1			32.0		
Approach LOS	--	--	E			D		

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	La Center Rd. & Paradise Park		
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center		
Date Performed	1/31/2025			Analysis Year	2028		
Analysis Time Period	AM Peak Hour						
Project Description Year 2028 with Project							
East/West Street: NW La Center Road				North/South Street: Paraadise Park Road			
Intersection Orientation: East-West				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	37	328	12	3	802	33	
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92	
Hourly Flow Rate, HFR (veh/h)	40	356	13	3	871	35	
Percent Heavy Vehicles	0	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	1	1	1	1	1	0	
Configuration	L	T	R	L		TR	
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	10	1	0	24	2	72	
Peak-Hour Factor, PHF	0.92	0.92	0.92	0.92	0.92	0.92	
Hourly Flow Rate, HFR (veh/h)	10	1	0	26	2	78	
Percent Heavy Vehicles	0	0	0	100	0	22	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	1	1	0	1	1	0	
Configuration	L		TR	L		TR	
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	L	L	L		TR	L	TR
v (veh/h)	40	3	10		1	26	80
C (m) (veh/h)	759	1201	89		144	78	306
v/c	0.05	0.00	0.11		0.01	0.33	0.26
95% queue length	0.17	0.01	0.37		0.02	1.26	1.02
Control Delay (s/veh)	10.0	8.0	50.5		30.2	72.7	20.9
LOS	B	A	F		D	F	C
Approach Delay (s/veh)	--	--	48.7			33.6	
Approach LOS	--	--	E			D	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK	Intersection	La Center Rd. & Paradise Park				
Agency/Co.	Kelly Engoneering	Jurisdiction	City of La Center				
Date Performed	1/31/2025	Analysis Year	2025				
Analysis Time Period	PM Peak Hour						
Project Description Existing							
East/West Street: NW La Center Road		North/South Street: Paraadise Park Road					
Intersection Orientation: East-West		Study Period (hrs): 0.25					
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	47	760	9	0	387	17	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	50	817	9	0	416	18	
Percent Heavy Vehicles	49	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	1	1	1	1	1	0	
Configuration	L	T	R	L		TR	
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	16	0	2	15	1	65	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	17	0	2	16	1	69	
Percent Heavy Vehicles	6	0	50	15	1	65	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	1	1	0	1	1	0	
Configuration	L		TR	L		TR	
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	L	L	L		TR	L	TR
v (veh/h)	50	0	17		2	16	70
C (m) (veh/h)	915	813	99		312	114	497
v/c	0.05	0.00	0.17		0.01	0.14	0.14
95% queue length	0.17	0.00	0.59		0.02	0.47	0.49
Control Delay (s/veh)	9.2	9.4	48.8		16.6	41.7	13.4
LOS	A	A	E		C	E	B
Approach Delay (s/veh)	--	--	45.4			18.7	
Approach LOS	--	--	E			C	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information			
Analyst	DSK			Intersection	La Center Rd. & Paradise Park		
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center		
Date Performed	1/31/2025			Analysis Year	2028		
Analysis Time Period	PM Peak Hour						
Project Description Year 2028 w/o Project							
East/West Street: NW La Center Road				North/South Street: Paradise Park Road			
Intersection Orientation: East-West				Study Period (hrs): 0.25			
Vehicle Volumes and Adjustments							
Major Street	Eastbound			Westbound			
Movement	1	2	3	4	5	6	
	L	T	R	L	T	R	
Volume (veh/h)	50	979	16	2	512	28	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	53	1052	17	2	550	30	
Percent Heavy Vehicles	49	--	--	0	--	--	
Median Type	Undivided						
RT Channelized			0			0	
Lanes	1	1	1	1	1	0	
Configuration	L	T	R	L		TR	
Upstream Signal		0			0		
Minor Street	Northbound			Southbound			
Movement	7	8	9	10	11	12	
	L	T	R	L	T	R	
Volume (veh/h)	23	0	3	36	1	109	
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93	
Hourly Flow Rate, HFR (veh/h)	24	0	3	38	1	117	
Percent Heavy Vehicles	6	0	50	15	1	65	
Percent Grade (%)	0			0			
Flared Approach		N			N		
Storage		0			0		
RT Channelized			0			0	
Lanes	1	1	0	1	1	0	
Configuration	L		TR	L		TR	
Delay, Queue Length, and Level of Service							
Approach	Eastbound	Westbound	Northbound			Southbound	
Movement	1	4	7	8	9	10	11
Lane Configuration	L	L	L		TR	L	TR
v (veh/h)	53	2	24		3	38	
C (m) (veh/h)	799	660	42		223	60	
v/c	0.07	0.00	0.57		0.01	0.63	
95% queue length	0.21	0.01	2.08		0.04	2.64	
Control Delay (s/veh)	9.8	10.5	171.3		21.4	137.1	
LOS	A	B	F		C	F	C
Approach Delay (s/veh)	--	--	154.7			46.6	
Approach LOS	--	--	F			E	

TWO-WAY STOP CONTROL SUMMARY

General Information				Site Information				
Analyst	DSK			Intersection	La Center Rd. & Paradise Park			
Agency/Co.	Kelly Engoneering			Jurisdiction	City of La Center			
Date Performed	1/31/2025			Analysis Year	2028			
Analysis Time Period	PM Peak Hour							
Project Description Year 2028 with Project								
East/West Street: NW La Center Road				North/South Street: Paraadise Park Road				
Intersection Orientation: East-West				Study Period (hrs): 0.25				
Vehicle Volumes and Adjustments								
Major Street	Eastbound			Westbound				
Movement	1	2	3	4	5	6		
	L	T	R	L	T	R		
Volume (veh/h)	50	996	16	2	584	28		
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93		
Hourly Flow Rate, HFR (veh/h)	53	1070	17	2	627	30		
Percent Heavy Vehicles	49	--	--	0	--	--		
Median Type	Undivided							
RT Channelized			0			0		
Lanes	1	1	1	1	1	0		
Configuration	L	T	R	L		TR		
Upstream Signal		0			0			
Minor Street	Northbound			Southbound				
Movement	7	8	9	10	11	12		
	L	T	R	L	T	R		
Volume (veh/h)	23	0	3	36	1	109		
Peak-Hour Factor, PHF	0.93	0.93	0.93	0.93	0.93	0.93		
Hourly Flow Rate, HFR (veh/h)	24	0	3	38	1	117		
Percent Heavy Vehicles	6	0	50	15	1	65		
Percent Grade (%)	0			0				
Flared Approach		N			N			
Storage		0			0			
RT Channelized			0			0		
Lanes	1	1	0	1	1	0		
Configuration	L		TR	L		TR		
Delay, Queue Length, and Level of Service								
Approach	Eastbound	Westbound	Northbound			Southbound		
Movement	1	4	7	8	9	10	11	12
Lane Configuration	L	L	L		TR	L		TR
v (veh/h)	53	2	24		3	38		118
C (m) (veh/h)	743	649	34		217	50		365
v/c	0.07	0.00	0.71		0.01	0.76		0.32
95% queue length	0.23	0.01	2.44		0.04	3.10		1.37
Control Delay (s/veh)	10.2	10.6	239.7		21.8	189.0		19.5
LOS	B	B	F		C	F		C
Approach Delay (s/veh)	--	--	215.5			60.8		
Approach LOS	--	--	F			F		

APPENDIX E

REFERENCES

References

1. Trip Generation Manual, 11th Edition, 2021, Institute of Transportation Engineers.
2. Highway Capacity Manual, 2000 and 2010, Transportation Research Board, National Research Council.
3. Correspondence with representatives from the City of La Center.
4. Pre-application Conference Report, Juniper Ridge Subdivision, 2024-007 PAC.