CATEGORICAL EXEMPTION MEMO

TO: City of Santa Ana, Planning and Building Agency
Planning Division
20 Civic Center Plaza
Santa Ana, CA 92701

FROM: Nicole Morse, Esq., Principal

DATE: April 7, 2025

RE: CEQA Class 32 Exemption – 400 W Warner Ave

I. PROJECT UNDERSTANDING

Stake Sports LLC ("Project Applicant") seeks to retrofit an existing 4.99-acre property located north of Dyer Road, south of West Warner Ave, west of South Birch Street, east of South Garnsey Street, and north of West Central Avenue in the City of Santa Ana ("City"), County of Orange. The subject property's Assessor's Parcel Number (APN) is 410-021-01 ("Project site"). The Project site is currently developed with an approximate 57,705 square foot (sf) one-story concrete building and an approximate 1,115 sf one-story metal secondary building for a total building perimeter footprint area of 58,820 sf.

As shown on Figure 1, *Site Plan*, and Figure 2, *Project Renderings*, of Attachment A, *Figures*, the Project includes the retrofitting of the existing industrial warehouse building into a soccer training facility. The proposed retrofitting consists of interior and exterior architectural renovations, including mechanical, electrical, and plumbing improvements. The facility would be geared towards soccer and would serve as a venue for soccer practice, soccer courses, training and events, with integrated data analysis and specialized training apparatus intended to strengthen player skills. The facility would include amenities such as lounge areas, locker rooms, food and beverage areas, and a clothing/shoe store. As shown in Figure 3, *Landscape Plan*, new landscaping and lighting would be installed around the northern and eastern perimeter of the site. Landscaping would include 25 24-inch box strawberry trees, 5 15-gallon camphor trees, 11 15-gallon 'pink dawn' trees, and 17 15-gallon 'little gem' low branch trees and a variety of 5-gallon shrubs including, but not limited to, paw pink flowers, kangaroo paw orange, rock purslane, blutopia flax lily, and Mexican feather grass.

Access to the Project site would be provided via four driveways on West Warner Avenue and South Birch Street. The Project would provide a total of 116 parking spaces including 25 Electric Vehicle capable parking spaces, 6 Electric Vehicle Charging Station (EVCS) parking spaces, 2 Level 2 EVCS parking spaces, 1 standard accessible EVCS parking space, and 1 van accessible EVCS parking space. A total of 8 bicycle parking spaces would also be provided onsite. The Project would incorporate improvements to curbs and gutter, fencing, sidewalk, parking, Americans with Disabilities Act (ADA) striping, ramp, and signage, consistent with City standards. Additionally, the Project

would implement all necessary on-site utility and storm water management infrastructure that would connect to the existing infrastructure systems on West Warner Avenue and South Birch Street, consistent with City requirements.

Construction of the Project is expected to commence in September 2025 and would last through February 2026. The following construction activities would occur as part of the Project:

- Demolition
- Site Preparation
- Grading
- Building Construction
- Paving
- Architectural Coating

Miscellaneous site demolition for the Project will include (i) landscape, (ii) a small building, and (iii) miscellaneous parking lot lights. The existing building and parking lot will remain intact, and the existing building is being delivered as a cold shell. As a conservative estimate, this analysis assumes to up to 100 tons of debris will be generated from demolition activities. No import or export of soils would be required.

The information presented in this Memorandum is based on our review and analysis of the following documents and information: (a) materials provided by the Project Applicant regarding the proposed Project; (b) publicly available documents and information from the City of Santa Ana website, including but not limited to the City's General Plan, Zoning and Land Use Code, and (c) information provided by the City of Santa Ana staff.

II. EXISTING CONDITIONS

A. Existing Land Use

The Project site is currently developed with an approximate 57,705 sf one-story concrete building and an approximate 1,115 sf one-story metal secondary building for a total building perimeter footprint area of 58,820sf on a 4.99-acre property located at 400 West Warner Avenue in the City of Santa Ana. The Project site was developed sometime between 1952 and 1963 and was previously occupied by the former Sears Parts & Repair Center.

B. Existing General Plan Designation

The City of Santa Ana General Plan designates the Project site as Industrial (IND). The Industrial (IND) land use designation provides space for activities such as light and heavy manufacturing, warehousing, processing, and distribution as well as commercial uses ancillary to industrial activities. Industrial districts are significant sources of employment and municipal revenue, and they contribute to the economic health of the City and the region. The maximum floor area ratio (FAR) for the allowed use is 0.45 and the typical maximum height is 35 feet.

C. Existing Zoning

The Project site is located within the Light Industrial (M-1) district. Chapter 41 Division 18 Section 41-472 through 472.5 of the City's Municipal Code provides a list of uses permitted or conditionally permitted in the M-1 district.

According to the City's Municipal Code Chapter 41 Division 18 Section 41-472.5(s), indoor sport facilities are conditionally permitted in the M-1 zone, subject to the development and operational standards set forth below. According to Chapter 41 Division 18 Section 41-482, in addition to the standards of the M-1 district, indoor sport facilities shall comply with the following development and operational standards:

a) All business activities shall by conducted and located within an enclosed structure.

b) Any outdoor storage of equipment or materials shall be fully screened by a decorative masonry block wall.

c) No indoor sport facility shall operate before 7:00 a.m. or after 10:00 p.m. on any day of the week.

d) Ancillary uses including: meeting rooms, snack bars and equipment rental or sales are permitted within an indoor sport facility provided that their gross floor area of the ancillary use does not exceed twenty (20) percent of the total building area.

e) Ancillary uses shall operate in conjunction with the primary recreation use, and shall maintain the same or fewer hours of operation.

D. Surrounding Land Uses

Surrounding land uses include industrial, industrial/flex, residential, and institutional within the City of Santa Ana limits. Specifically, the Project site includes single-family residences and Esqueda Elementary School to the north; industrial uses to the south; commercial and industrial uses to the east; and industrial uses to the west. Surrounding land uses are zoned R-1, C-5, and C-2 to the north; M-1 to the south and west; and C-1 and M-1 to the east. The Project is consistent with the General Plan and zoning and, therefore, would complement surrounding development.

III. CEQA CATEGORICAL EXEMPTION

A. Class 32 Exemption

CEQA Guidelines Section 15332, In-Fill Development Projects, states that a Class 32 exemption consists of projects characterized as in-fill development meeting the conditions described below.

(a) The project is consistent with the applicable general plan designation and all applicable general plan policies as well as with applicable zoning designation and regulations.

(b) The proposed development occurs within city limits on a project site of no more than five acres substantially surrounded by urban uses.

(c) The project site has no value as habitat for endangered, rare or threatened species.

(d) Approval of the project would not result in any significant effects relating to traffic, noise, air quality, or water quality.

(e) The site can be adequately served by all required utilities and public services.

The Project site is currently zoned M-1 and has a General Plan land use designation of IND. The Project is conditionally permitted, within this designation. The Project would be implemented consistent with all applicable General Plan and Zoning policies and regulations.

The Project site consists of 4.99 acres and is located within the City of Santa Ana limits. Surrounding land uses include industrial uses, industrial/flex uses, residential uses, and institutional uses. Therefore, the proposed development occurs within City limits on a site of no more than five acres substantially surrounded by urban uses.

The Project site is currently developed with urban uses surrounded by typical ornamental landscaping. According to the United States Fish and Wildlife Service's National Wetlands Inventory and Mapper, the Project site does not contain any wetland, riparian habitat or other sensitive natural community.[1] The Project site is currently developed and located in an urbanized area of the City. The Project site is located within an area that has not been identified as containing species identified as a candidate, sensitive, or special status species in local or regional plans, policies or regulations or by the California Department of Fish and Wildlife or the U.S. Fish and Wildlife Service. Therefore, the Project site has no value as habitat for endangered, rare or threatened species.

The proposed retrofitting and operation of a project of this scale would not typically result in significant environmental impacts. For Class 32 Exemptions, the City requires the following reports: Focused Traffic Analysis, Air Quality /Greenhouse Gas (GHG) Assessment, and Noise Study. These reports have been prepared to support the finding of a Class 32 exemption for the Project and are summarized below.

Focused Traffic Analysis

The Focused Traffic Analysis is presented as *Attachment B* to this Memorandum. The existing permitted use (light industrial) would generate 57 passenger car equivalent (PCE) trips during the a.m. peak hour and 52 PCE trips during the p.m. peak hour. The trip generation for the existing use based on the Institute of Transportation Engineers Trip Generation, 11th Edition Land Use Code 110 – General Industrial.

Because the Project is an atypical land use, the trip generation for the Project used empirical data collected at three similar facilities – TOCA in Costa Mesa, Momentous in Irvine, and The Map in Garden Grove - with similar operations to calculate the peak hour trip generation and trip generation rate. As a result, the Project is anticipated to generate 11 trips during the AM peak hour and 95 net trips during the PM peak hour. The Project would generate 46 fewer trips than the currently permitted use during the AM peak hour and 43 additional trips during the PM peak hour.

The City requires preparation of a traffic study if a project generates more than 50 peak hour trips. As shown above, although the Project would generate less than 50 peak hour trips, a Focused Traffic Analysis was conducted. The analysis concluded that all study intersections would operate at satisfactory levels of service under existing and existing plus Project conditions.

According to the City of Santa Ana Traffic Impact Study Guidelines, several types of projects can be screened out from a Vehicle Miles Traveled (VMT) assessment using the following criteria, indicating that these projects have the potential to reduce VMT per service population (VMT/SP) and result in a less-than significant transportation impact:

[1] https://fwsprimary.wim.usgs.gov/wetlands/apps/wetlands-mapper/

- Projects which serve the local community and have the potential to reduce VMT, such as neighborhood K-12 schools and local serving retail less than 50,000 SF (Charter schools are excluded from this criteria).

- Projects that generate less than 110 net daily trips.

- Projects located within Transit Priority Areas (TPAs).

    - TPAs are defined as a ½ mile radius around an existing or planned major transit stop (e.g. Metrolink Station, Streetcar Station, etc.) or an existing stop along a high quality transit corridor.

    - High Quality Transit Areas (HQTAs) are defined as a corridor with fixed route bus service with service intervals no longer than 15 minutes during peak commute hours. A map of HQTAs can be reviewed on SCAG's website (but should be verified by the engineer/planner related to the criteria for these areas).

    - Please note that projects that are in TPAs will also be required to complete a secondary screening step to verify the proposed project's consistency with the assumptions from the Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS). This consistency can be a land use review (e.g. are the proposed land uses already included in the RTP/SCS) or can be reviewed from a VMT/SP perspective (e.g. does the resulting land use increase or decrease the VMT/SP in the Traffic Analysis Zone (TAZ) compared to the RTP/SCS assumptions).

- Projects located in a low-VMT generating TAZ.

As shown in Appendix A of the City's Traffic Impact Study Guidelines, the Project is located within a TPA.[2] Additionally, the Project proposes land use consistent with those permitted by the General Plan, which is consistent with the land uses assumed for the Project site as part of the RTP/SCS. Therefore, the Project would meet the screening threshold for being within a TPA. Additionally, the Project would serve the local community. Therefore, the Project would meet two of the screening thresholds and VMT impacts would be less than significant.

Air Quality and Greenhouse Gas Emissions

The Project's Air Quality & Greenhouse Gas Assessment is presented as *Attachment C* to this Memorandum. As shown in Tables 4 and 5 of the Assessment, the Project would not result in an exceedance of the South Coast Air Quality Management District (South Coast AQMD) regional significance threshold for construction-source or operational-source emissions. Additionally, as shown in Table 7 of the Assessment, emissions resulting from the construction would not exceed the numerical thresholds of localized significance established by the South Coast AQMD for any criteria pollutant. Moreover, Table 8 of the Assessment shows that the Project would generate a total of approximately 2,018.62 $MTCO_2e$/yr, which would not exceed the SCAQMD's numeric threshold of significance of 3,000 $MTCO_2e$/yr.

[2] https://storage.googleapis.com/proudcity/santaanaca/uploads/2022/03/Santa-Ana-VMT-TIS-Guidelines.pdf

Noise

The Project's Noise Assessment is presented as *Attachment D* to this Memorandum. According to Section 18-314(e) of the city's Municipal Code, noise sources associated with the construction, repair, remodeling, or grading of any real property, provided said activities do not take place between the hours of 8:00 p.m. and 7:00 a.m. on weekdays, including Saturday, or any time on Sunday or a federal holiday are exempt from the noise ordinance. To evaluate whether the Project will generate potentially significant short-term noise levels at nearest receiver locations, a construction-related daytime noise level threshold of 80 dBA Leq is used as a reasonable threshold to assess the daytime construction noise level impacts. As presented in Table 7 of the Noise Assessment, construction noise analysis shows that the nearest receiver locations will satisfy the reasonable daytime 80 dBA Leq significance threshold during Project construction activities. As such, construction noise is considered less than significant at all receiver locations.

Construction activity can result in varying degrees of ground vibration, depending on the equipment and methods employed. As shown in Table 9 of the Noise Assessment, based on the maximum acceptable continuous vibration threshold of 0.30 PPV (in/sec), typical Project construction vibration levels will fall below the thresholds at all the noise-sensitive receiver locations. Therefore, the Project's construction-related vibration impacts are considered less than significant.

The Project-related exterior noise sources are expected to include roof-top air conditioning units, trash enclosure activity, and parking lot vehicle movements. To demonstrate compliance with local noise regulations, the Project-only operational noise levels were evaluated against exterior noise level thresholds based on the City of Santa Ana exterior noise level standards at nearby noise-sensitive receiver locations. As shown in Table 4 of the Noise Assessment, operational noise levels associated with the Project will not exceed the City of Santa Ana 55 dBA Leq daytime or the 50 dBA Leq nighttime exterior noise level standards. Therefore, the stationary operational noise impacts are considered less than significant at the nearby noise-sensitive receiver locations.

Based on the traffic counts for Warner Avenue and Birch Street, Warner Avenue has an AM peak hour traffic volume of 2,073 and a P.M. peak-hour traffic volume of 2,293. The additional project related traffic would result in a less than 1 dBA CNEL increase in traffic noise along Warner Avenue. Therefore, land uses adjacent to the study area roadway segments would experience less than significant noise level impacts due to the Project-related traffic noise levels.

Utilities and Public Services

The Project site is currently served by existing utilities and public services. The Project includes the retrofitting of an existing industrial warehouse building into a soccer training facility and consists of interior and exterior architectural renovations, including mechanical, electrical, and plumbing improvements. The Project would implement all necessary on-site utility and storm water management infrastructure, consistent with City requirements. Therefore, the site can be adequately served by all required utilities and public services.

B. Review Of Exceptions to The Categorical Exemption

CEQA Guidelines include exceptions to all exemptions. As codified in Guidelines Section 15300.2, a project that would otherwise fit into an exemption must not be disqualified by the following sections:

a) Location. Classes 3, 4, 5, 6, and 11 are qualified by consideration of where the project is to be located – a project that is ordinarily insignificant in its impact on the environment may in a particularly sensitive environment be significant. Therefore, these classes are considered to apply all instances, except where the project may impact on an environmental resource of hazardous or critical concern where designated, precisely mapped, and officially adopted pursuant to law by federal, state, or local agencies.

b) Cumulative Impact. All exemptions for these classes are inapplicable when the cumulative impact of successive projects of the same type in the same place, over time is significant.

c) Significant Effect. A categorical exemption shall not be used for an activity where there is a reasonable possibility that the activity will have a significant effect on the environment due to unusual circumstances.

d) Scenic Highways. A categorical exemption shall not be used for a project which may result in damage to scenic resources, including but not limited to, trees, historic buildings, rock outcroppings, or similar resources, within a highway officially designated as a state scenic highway. This does not apply to improvements which are required as mitigation by an adopted negative declaration or certified EIR.

e) Hazardous Waste Sites. A categorical exemption shall not be used for a project located on a site which is included on any list compiled pursuant to Section 65962.5 of the Government Code.

f) Historical Resources. A categorical exemption shall not be used for a project which may cause a substantial adverse change in the significance of a historical resource.

The applicability of the above-listed conditions to the 400 W Warner Ave Project is discussed below.

a) This Condition would not apply under a Class 32 exemption, as it only applies to Classes 3, 4, 5, 6, and 11.

b) As presented within this Memorandum, the Project would not result in any significant individual or cumulative environmental impacts. As such, Condition b) is not applicable to the Project.

c) No significant effects would occur as a result of the Project. The Project proposes retrofitting of an existing urban use within a developed area of the City. No unusual circumstances exist. As such, Condition c) is not applicable to the Project.

d) According to the California Department of Transportation (Caltrans) California Scenic Highway Mapping System, the nearest officially designated state scenic highway is a portion of California State Route 91 located approximately 9.2 miles northeast of the Project site. This section of the scenic highway is not visible from the Project site or surrounding areas.[3] As such, the Project would not result in damage to scenic resources within a highway officially designated as a state scenic highway; Condition d) is not applicable.

e) Pursuant to Government Code Section 65962.5, the Hazardous Waste and Substances Sites (Cortese) List is a planning document used by the State and local agencies to comply with the California Environmental Quality Act requirements in providing information about the location of hazardous materials release sites. Below are the data resources that provide information regarding the facilities or sites identified as meeting the Cortese List requirements.

[3] https://caltrans.maps.arcgis.com/apps/webappviewer/index.html?id=465dfd3d807c46cc8e8057116f1aacaa.

- List of Hazardous Waste and Substances sites from Department of Toxic Substances Control (DTSC) EnviroStor database.
- List of Leaking Underground Storage Tank Sites from the State Water Board's GeoTracker database.
- List of solid waste disposal sites identified by Water Board with waste constituents above hazardous waste levels outside the waste management unit.
- List of "active" Cease and Desist Orders and Cleanup and Abatement Orders from Water Board.
- List of hazardous waste facilities subject to corrective action pursuant to Section 25187.5 of the Health and Safety Code, identified by DTSC.

Based on a review of the Cortese List maintained by the CalEPA, the Project site is not identified as a hazardous materials site pursuant to Government Code Section 65962.5.[4] According to the EnviroStor database, the Project site has an active listing due to the previous underground gasoline tank onsite.[5] However, as part of the Project, a full Liquid Boot vapor barrier would be installed. As the Project is not located on a site which is included on any list compiled pursuant to Section 65962.5 of the Government Code, Condition e) would not apply.

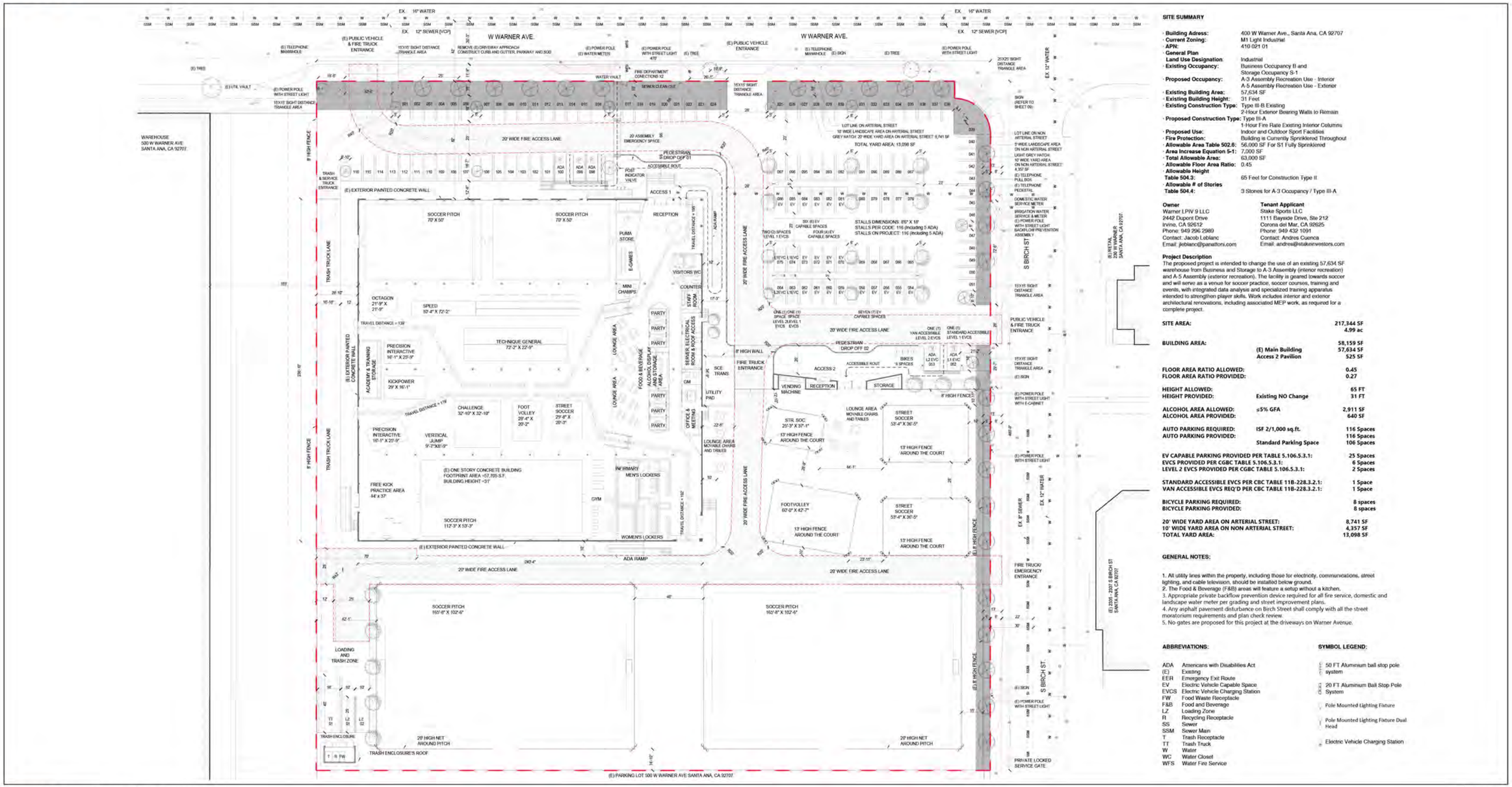
f) Condition f) requires consideration of whether the Project may cause a substantial adverse change in the significance of a historical resource. The definition of "historical resources" is contained in *CEQA Guidelines* Section 15064.5. The City of Santa Ana maintains a Citywide Historic Resources Map and list identifying the City's historic properties and districts. Although the existing building is over 50 years old, it is not listed as a significant historical resource in the Citywide Historic Resources Map.[6] Furthermore, the Project consists of a retrofit and the existing 57,705 sf building and parking lot will remain intact. Therefore, the Project would not cause a substantial adverse change in the significance of a historical resource, and Condition f) would not apply.

C. Conclusion

Based on the technical analyses prepared for the Project, the Project would not result in any significant environmental impacts. Additionally, the Project meets the conditions of a Class 32 exemption and would not conflict with any of the exceptions as codified in CEQA Guidelines Section 15300.

[4] https://calepa.ca.gov/sitecleanup/corteselist/
[5] https://www.envirostor.dtsc.ca.gov/public/profile_report?global_id=60003506
[6] https://gis.santa-ana.org/portal/apps/webappviewer/index.html?id=30f66000ad114c40a93faaf5596c928d

Attachment A: Figures



SITE SUMMARY

· **Building Adress:**	400 W Warner Ave., Santa Ana, CA 92707
· **Current Zoning:**	M1 Light Industrial
· **APN:**	410 021 01
· **General Plan Land Use Designation:**	Industrial
· **Existing Occupancy:**	Business Occupancy B and Storage Occupancy S-1
· **Proposed Occupancy:**	A-3 Assembly Recreation Use - Interior A-5 Assembly Recreation Use - Exterior
· **Existing Building Area:**	57,634 SF
· **Existing Building Height:**	31 Feet
· **Existing Construction Type:**	Type III-B Existing 2-Hour Exterior Bearing Walls to Remain
· **Proposed Construction Type:**	Type III-A 1-Hour Fire Rate Existing Interior Columns
· **Proposed Use:**	Indoor and Outdoor Sport Facilities
· **Fire Protection:**	Building is Currently Sprinklered Throughout
· **Allowable Area Table 502.6:**	56,000 SF For S1 Fully Sprinklered
· **Area Increase Equation 5-1:**	7,000 SF
· **Total Allowable Area:**	63,000 SF
· **Allowable Floor Area Ratio:**	0.45
· **Allowable Height Table 504.3:**	65 Feet for Construction Type II
· **Allowable # of Stories Table 504.4:**	3 Stories for A-3 Occupancy / Type III-A

Owner
Warner LPIV 9 LLC
2442 Dupont Drive
Irvine, CA 92612
Phone: 949 296 2989
Contact: Jacob Leblanc
Email: jleblanc@panattoni.com

Tenant Applicant
Stake Sports LLC
1111 Bayside Drive, Ste 212
Corona del Mar, CA 92625
Phone: 949 432 1091
Contact: Andres Cuenca
Email: andres@stakeinvestors.com

Project Description
The proposed project is intended to change the use of an existing 57,634 SF warehouse from Business and Storage to A-3 Assembly (interior recreation) and A-5 Assembly (exterior recreation). The facility is geared towards soccer and will serve as a venue for soccer practice, soccer courses, training and events, with integrated data analysis and specialized training apparatus intended to strengthen player skills. Work includes interior and exterior architectural renovations, including associated MEP work, as required for a complete project.

SITE AREA:		217,344 SF 4.99 ac
BUILDING AREA:		58,159 SF
	(E) Main Building	57,634 SF
	Access 2 Pavilion	525 SF
FLOOR AREA RATIO ALLOWED:		0.45
FLOOR AREA RATIO PROVIDED:		0.27
HEIGHT ALLOWED:		65 FT
HEIGHT PROVIDED:	Existing NO Change	31 FT
ALCOHOL AREA ALLOWED:	≤5% GFA	2,911 SF
ALCOHOL AREA PROVIDED:		640 SF
AUTO PARKING REQUIRED:	ISF 2/1,000 sq.ft.	116 Spaces
AUTO PARKING PROVIDED:		116 Spaces
	Standard Parking Space	106 Spaces
EV CAPABLE PARKING PROVIDED PER TABLE 5.106.5.3.1:		25 Spaces
EVCS PROVIDED PER CGBC TABLE 5.106.5.3.1:		6 Spaces
LEVEL 2 EVCS PROVIDED PER CGBC TABLE 5.106.5.3.1:		2 Spaces
STANDARD ACCESSIBLE EVCS PER CBC TABLE 11B-228.3.2.1:		1 Space
VAN ACCESSIBLE EVCS REQ'D PER CBC TABLE 11B-228.3.2.1:		1 Space
BICYCLE PARKING REQUIRED:		8 spaces
BICYCLE PARKING PROVIDED:		8 spaces
20' WIDE YARD AREA ON ARTERIAL STREET:		8,741 SF
10' WIDE YARD AREA ON NON ARTERIAL STREET:		4,357 SF
TOTAL YARD AREA:		13,098 SF

GENERAL NOTES:

1. All utility lines within the property, including those for electricity, communications, street lighting, and cable television, should be installed below ground.
2. The Food & Beverage (F&B) areas will feature a setup without a kitchen.
3. Appropriate private backflow prevention device required for all fire service, domestic and landscape water meter per grading and street improvement plans.
4. Any asphalt pavement disturbance on Birch Street shall comply with all the street moratorium requirements and plan check review.
5. No gates are proposed for this project at the driveways on Warner Avenue.

ABBREVIATIONS:

ADA	Americans with Disabilities Act
(E)	Existing
EER	Emergency Exit Route
EV	Electric Vehicle Capable Space
EVCS	Electric Vehicle Charging Station
FW	Food Waste Receptacle
F&B	Food and Beverage
LZ	Loading Zone
R	Recycling Receptacle
SS	Sewer
SSM	Sewer Main
T	Trash Receptacle
TT	Trash Truck
W	Water
WC	Water Closet
WFS	Water Fire Service

SYMBOL LEGEND:

- 50 FT Aluminum ball stop pole system
- 20 FT Aluminum Ball Stop Pole System
- Pole Mounted Lighting Fixture
- Pole-Mounted Lighting Fixture Dual Head
- Electric Vehicle Charging Station

Source(s): Architect Orange (01-29-2025)

Figure 1

Not to Scale

Site Plan

Proposed Site - Northeast Aerial View

Access 2 - Northeast Aerial View

Birch St. Vehicular Access

Kick Yard Facade Access

Main Access East Facade

Main Access Northeast Facade

Main Access Northeast Facade - Aerial View

Main Access North Facade

Main Access North Facade

Source(s): Architect Orange (03-13-2025)

Figure 2

Not to Scale

Project Renderings

PLANTING LEGEND

TREES

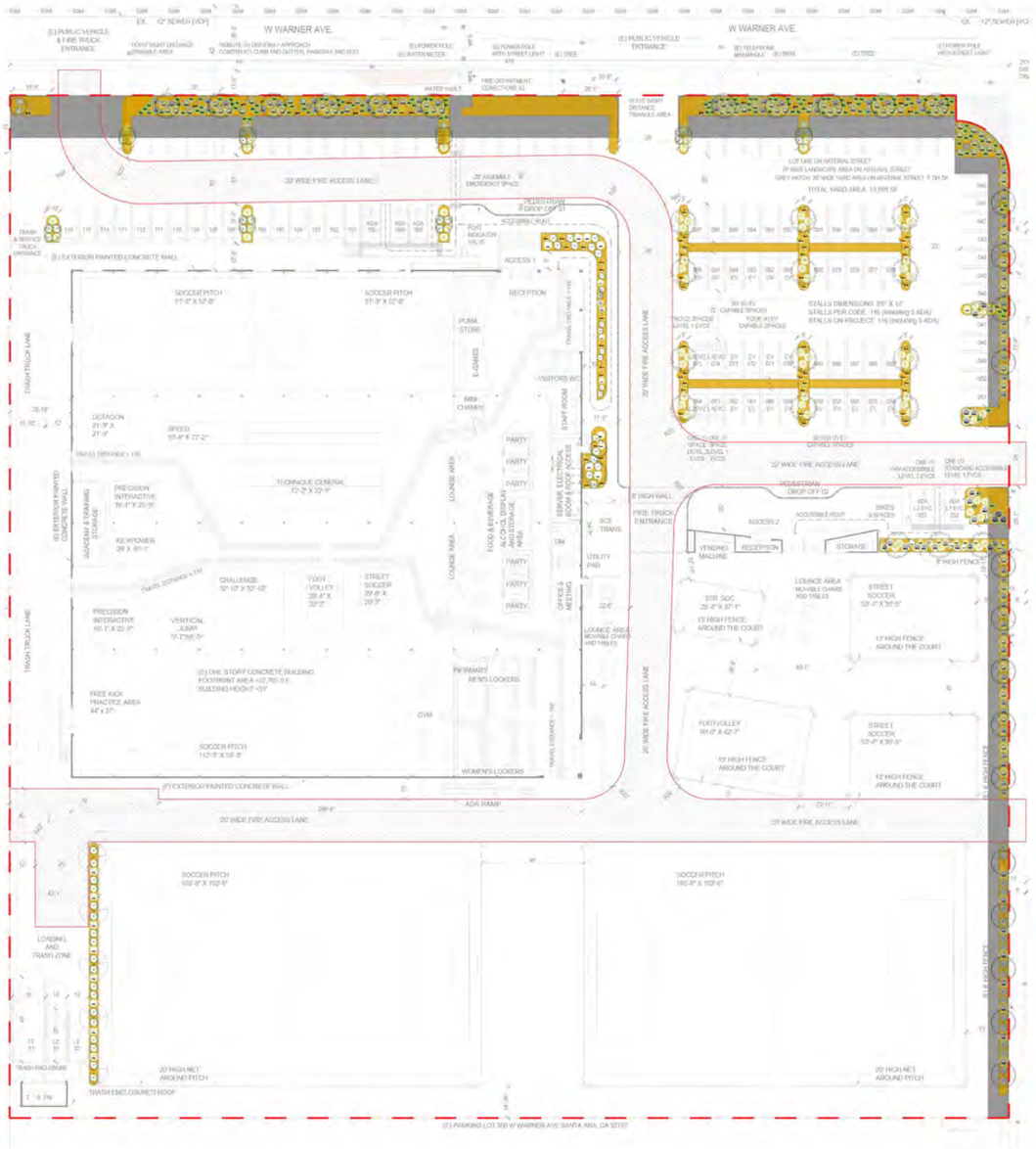
SYMBOL	BOTANICAL NAME	COMMON NAME	SIZE	HEIGHT	QTY
	"Arbutus Unedo" Multi Trunk	*Strawberry Tree*	24" Box	6'-8'	25
	Cinamomum camphora	Camphor Tree	15 Gal	25'	5
	Chitalpa tashkentensis	'Pink Dawn'	15 Gal	20'	11
	Magnolia grandiflora	'Little Gem' Low Branch	15 Gal	15'	17

SHRUBS

SYMBOL	BOTANICAL NAME	COMMON NAME	SIZE	HEIGHT	QTY
An Ka	*Anigozanthos Kangaroo*	Paw Pink Flowers	5 Gal	4'	51
An Or	*Anigozanthos 'Orange Cross'*	Kangaroo Paw Orange	5 Gal	3'	76
Ba pi	*Baccharis pilularis*	Coyote bush	1 Gal	2'	127
Ca Gr	*Calandrinia grandiflora*	Rock purslane	5 Gal	1'	34
Di Bl	*Dianella Blutopia*	Blutopia Flax Lily	5 Gal	1'	29
Li Ol	*Little Ollie Dwarf Olive*	'Little Ollie'	5 Gal	4'	74
Mu Ca	*Muhlenbergia capilaris*	Pink muhly	5 Gal	4'	22
Sa gr	*Salvia greggii*	'Alba' Autumn Sage 'Alba'	5 Gal	2'	82
Sti te	*Stipa tenuissima (Nassella t.)*	Mexican Feather Grass	5 Gal	1'	71

GROUNDCOVER

SYMBOL	BOTANICAL NAME	COMMON NAME	SIZE	HEIGHT	QTY
	Myoporum Parvifolium	Creeping boobialla	1 Gal	4"	



PLANTING SPECIES
Reference images


Cinamomum camphora
Camphor Tree


Strawberry Tree
"Arbutus Marina"
Multi Trunk


Chitalpa tashkentensis
'Pink Dawn'


Magnolia grandiflora
'Little Gem' Low Branch


Salvia greggii
'Alba' Autumn Sage 'Alba'


Little Ollie Dwarf Olive
Little Ollie


Anigozanthos 'Orange Cross'
Kangaroo Paw Orange


Muhlenbergia capilaris
Pink muhly


Stipa tenuissima (Nassella t.)
Mexican Feather Grass


Anigozanthos Kangaroo
Paw Pink Flowers


Dianella Blutopia
Blutopia flax lily


Baccharis pilularis
'Coyote Bush'


Myoporum parvifolium
Creeping boobialla


Calandrinia grandiflora
Rock purslane

Source(s): Architect Orange (03-13-2025)

Figure 3

Not to Scale

Landscape Plan

Attachment B: Focused Traffic Analysis

memorandum

DATE: March 12, 2025

TO: Mr. Ruben Castañeda, Senior Engineer,
Public Works Agency – Traffic Engineering
City of Santa Ana

FROM: Deepali Chausalkar
Sandipan Bhattacharjee, PE, TE, AICP, ENV SP

SUBJECT: Footlab – Focused Traffic Analysis

Translutions, Inc. (Translutions) is pleased to provide this focused traffic analysis discussing the trip generation and levels of service for the Footlab project to be located at 400 W. Warner Avenue in the City of Santa Ana. The site includes an existing building that is classified as a light industrial use.

PROJECT DESCRIPTION

The project is an atypical land use and the site includes an existing building that is classified as a light industrial use. The project is located at Southwest corner of W Warner Avenue and S Birch Street in the City of Santa Ana. The project includes the reuse of a existing 57,705 square foot industrial building on a 4.99-acre lot as a soccer training facility. Access to the project will be provided via three driveways with Driveway 1 and Drive 2 on W Warner Avenue and Driveway 3 on S Birch Street. All three driveways are unsignalized. Figure 1 illustrates the site plan.

STUDY AREA

Based on discussion with City staff, the following study area intersections were evaluated for levels of service:

1. Project Dwy 1/Warner Ave;
2. Project Dwy 2/Warner Ave;
3. Birch St/Warner Ave;
4. Project Dwy 3/Birch St;

ANALYSIS SCENARIOS

The following scenarios were included in the analysis:

1. Existing Conditions.
2. Existing With Project Conditions.

PROJECT TRIP GENERATION

Since the project is an atypical land use, based on discussion with the City, the trip generation for the proposed project was based on surveys conducted at three similar facilities – TOCA in Costa Mesa, Momentous in Irvine, and The Map in Garden Grove. The resulting trip generation rates were used to calculate the trip generation for the proposed project. The survey data is included in Appendix A. Table A shows the peak hour trip generation as well as the trip generation rate for the three survey sites. The trip generation rate across the three sites was averaged to calculate the trip generation rate for the proposed project.

Table A: Peak Hour Traffic Count Summary

		AM Peak Hour Counts			PM Peak Hour Counts			AM Peak Hour Rate			PM Peak Hour Rate		
Location	Area (TSF)	IN	OUT	TOTAL	IN	OUT	TOTAL	IN	OUT	TOTAL	IN	OUT	TOTAL
TOCA	25	2	0	2	6	7	13	0.080	0.000	0.080	0.240	0.280	0.520
Momentous	130	20	8	28	158	135	293	0.154	0.062	0.215	1.215	1.038	2.254
The Map	80	14	9	23	81	91	172	0.175	0.113	0.288	1.013	1.138	2.15
Average Rate								0.136	0.058	0.194	0.823	0.819	1.641

The resulting trip generation for the proposed project is included in Table B. As seen on Table B, the proposed project is forecast to generate 11 trips during the a.m. peak hour and 95 net trips during the p.m. peak hour.

Table B: Project Trip Generation

		AM Peak Hour			PM Peak Hour		
	Area (TSF)	IN	OUT	TOTAL	IN	OUT	TOTAL
Average Rate		0.136	0.058	0.194	0.823	0.819	1.641
Footlab Trip Generation	57.705	8	3	11	47	48	95

It should be noted that the existing permitted use (light industrial) would generate 57 PCE trips during the a.m. peak hour and 52 PCE trips during the p.m. peak hour. The trip generation for the existing use based on the ITE Trip Generation, 11th Edition is included in Appendix B. Therefore, the project generates 46 fewer trips than the currently permitted use during the a.m. peak hour and 43 additional trips during the p.m. peak hour. The City requires a local traffic study if a project generates more than 50 peak hour trips. As seen above, the proposed project is anticipated to generate less than 50 trips over those that are currently permitted.

However, based on City comments, this focused traffic analysis is conducted and includes an LOS analysis at the intersections of Birch Street at Warner Avenue and project driveways. In addition, the focused traffic analysis is based on the proposed project and no credits for the existing use will be applied.

PROJECT TRIP DISTRIBUTION AND ASSIGNMENT

Primary trip distribution patterns were developed based on the location of the project in relation to the surrounding land uses and the regional network. Figures 2 and 3 illustrate the primary project trip distribution and trip assignment and the resulting project trips at the study area intersections.

VOLUME DEVELOPMENT

Forecast traffic volumes at study intersections were developed for existing and existing plus project conditions. This section discusses the volume development methodology.

Existing Conditions

Existing traffic volumes are based on peak hour intersection turn movement counts collected by Counts Unlimited Inc. on a non-holiday weekday in December 2024. The counts are included in Appendix C. Figure 4 illustrates the existing and with project geometrics and stop control and Figure 5 illustrates the existing peak hour traffic volumes at the study area intersections. Volume development worksheets are included in Appendix D.

Existing With Project Conditions

Existing plus project peak hour traffic volumes were developed by adding the project trip assignment to the existing traffic volumes. Figure 6 shows the existing plus project peak hour traffic volumes at the study intersections. Detailed volume development worksheets are included in Appendix D.

LEVEL OF SERVICE ANALYSIS

Level of service (LOS) is a measure of the quality of operational conditions within a traffic stream and is generally expressed in terms of such measures as speed and travel time, freedom to maneuver, traffic interruptions, and comfort and convenience. Levels range from A to F, with LOS A representing excellent (free-flow) conditions and LOS F representing extreme congestion. Consistent to the guidelines, the Highway Capacity Manual (HCM) procedures have been used to evaluate levels of service. This section discusses the LOS definitions, procedures, and thresholds used in this report. The analysis of traffic operations at intersections was conducted according to the Highway Capacity Manual 7th Edition (HCM) delay methodologies, which is described in the Highway Capacity Manual (Transportation Research Board, Washington, D.C., 2022). Under the HCM methodology, LOS for signalized intersections is based on

the average delay experienced by vehicles traveling through an intersection, whereas for unsignalized intersections, the LOS is based on the worst approach where the minor leg has a shared lane and on the worst movement where the minor leg has dedicated turn lanes. Table B presents a brief description of each level of service letter grade, as well as the range of delays associated with each grade.

Table C: LOS Criteria

LOS	Description of Drivers' Perception and Traffic Operation	Delay in Seconds	
		Unsignalized	Signalized
A	This level is typically assigned when the volume-to-capacity ratio is low and either progression is exceptionally favorable, or the cycle length is very short. If it is due to favorable progression, most vehicles arrive during the green indication and travel through the intersection without stopping.	≤ 10	≤ 10
B	This level is assigned when the volume-to-capacity ratio is low and either progression is highly favorable, or the cycle length is short. More vehicles stop than with LOS A.	> 10 and ≤ 15	> 10 and ≤ 20
C	This level is typically assigned when progression is favorable, or the cycle length is moderate. Individual cycle failures (i.e., one or more queued vehicles are not able to depart as a result of insufficient capacity during the cycle) may begin to appear at this level. The number of vehicles stopping is significant, although many vehicles still pass through the intersection without stopping.	> 15 and ≤ 25	> 20 and ≤ 35
D	This level is typically assigned when the volume-to-capacity ratio is high and either progression is ineffective, or the cycle length is long. Many vehicles stop and individual cycle failures are noticeable.	> 25 and ≤ 35	> 35 and ≤ 55
E	This level is typically assigned when the volume-to-capacity ratio is high, progression is unfavorable, and the cycle length is long. Individual cycle failures are frequent.	> 35 and ≤ 50	> 55 and ≤ 80
F	This level is typically assigned when the volume-to-capacity ratio is very high, progression is very poor, and the cycle length is long. Most cycles fail to clear the queue.	> 50	> 80

The City endeavors to maintain LOS D as the minimum level of service standard at intersections of collector or higher classification.

Existing Levels of Service

The levels of service for existing conditions were calculated using the existing lane geometrics and existing traffic volumes. The existing levels of service at the study intersections are shown in Table D. As shown in Table D, all intersections are currently operating at satisfactory levels of service. LOS worksheets are included in Appendix E.

Table D: Existing and With Project Levels of Service

Intersection	LOS Std.	Control	Existing				Existing With Project			
			AM Peak Hour		PM Peak Hour		AM Peak Hour		PM Peak Hour	
			Delay	LOS	Delay	LOS	Delay	LOS	Delay	LOS
1 . Project Dwy 1/Warner Ave	D	TWSC	Does Not Exist		Does Not Exist		0.01	A	22.66	C
2 . Project Dwy 2/Warner Ave	D	TWSC	Does Not Exist		Does Not Exist		0.01	A	20.36	C
3 . Birch St/Warner Ave	D	TWSC	24.64	C	25.17	D	19.76	C	26.74	D
4 . Project Dwy 3/Birch St	D	TWSC	Does Not Exist		Does Not Exist		8.82	A	9.27	A

Notes:

* Exceeds LOS Standard

TWSC = Two-Way Stop Control; For TWSC intersections, reported delay is for worst-case movement.

LOS = Level of Service

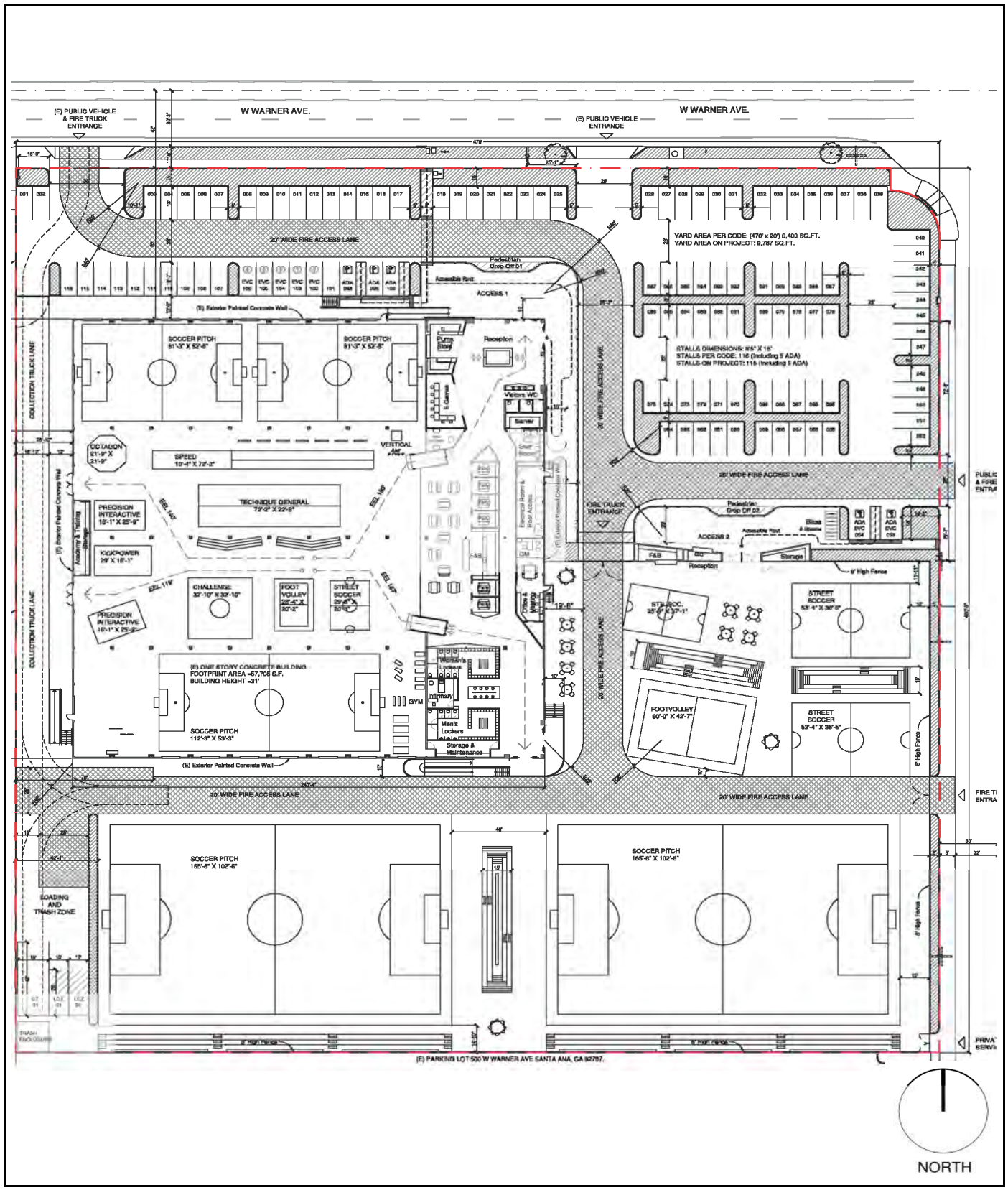
Existing With Project Levels of Service

The levels of service for existing with project conditions were calculated using the existing lane geometrics and existing with project traffic volumes. The existing with project levels of service at the study intersections are shown in Table D. As shown in Table D, all

intersections are forecast to operate at satisfactory levels of service. LOS worksheets are included in Appendix E. It should be noted that with the addition of project trips, the peak hour LOS does not degrade from acceptable LOS to unacceptable LOS.

CONCLUSION

The proposed project is forecast to generate 11 trips during the a.m. peak hour and 95 trips during the p.m. peak hour. All study intersections are forecast to operate at satisfactory levels of service under existing and existing plus project conditions.



Source: Architects Orange

FIGURE 1
Footlab
Site Plan

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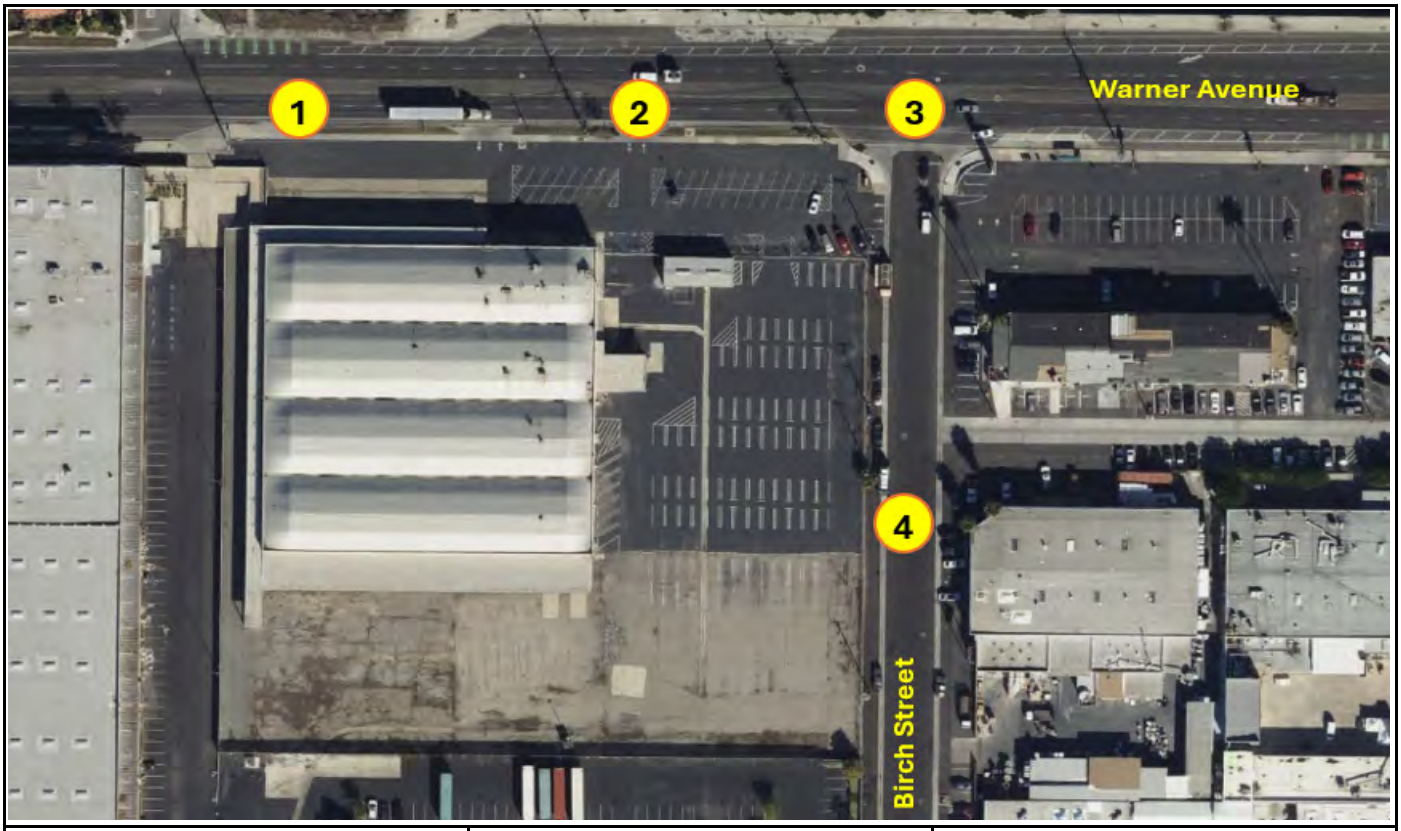
P:\Footlab Santa Ana\Focused Analysis\Z12 Portrait Site Plan (1/24/2025)



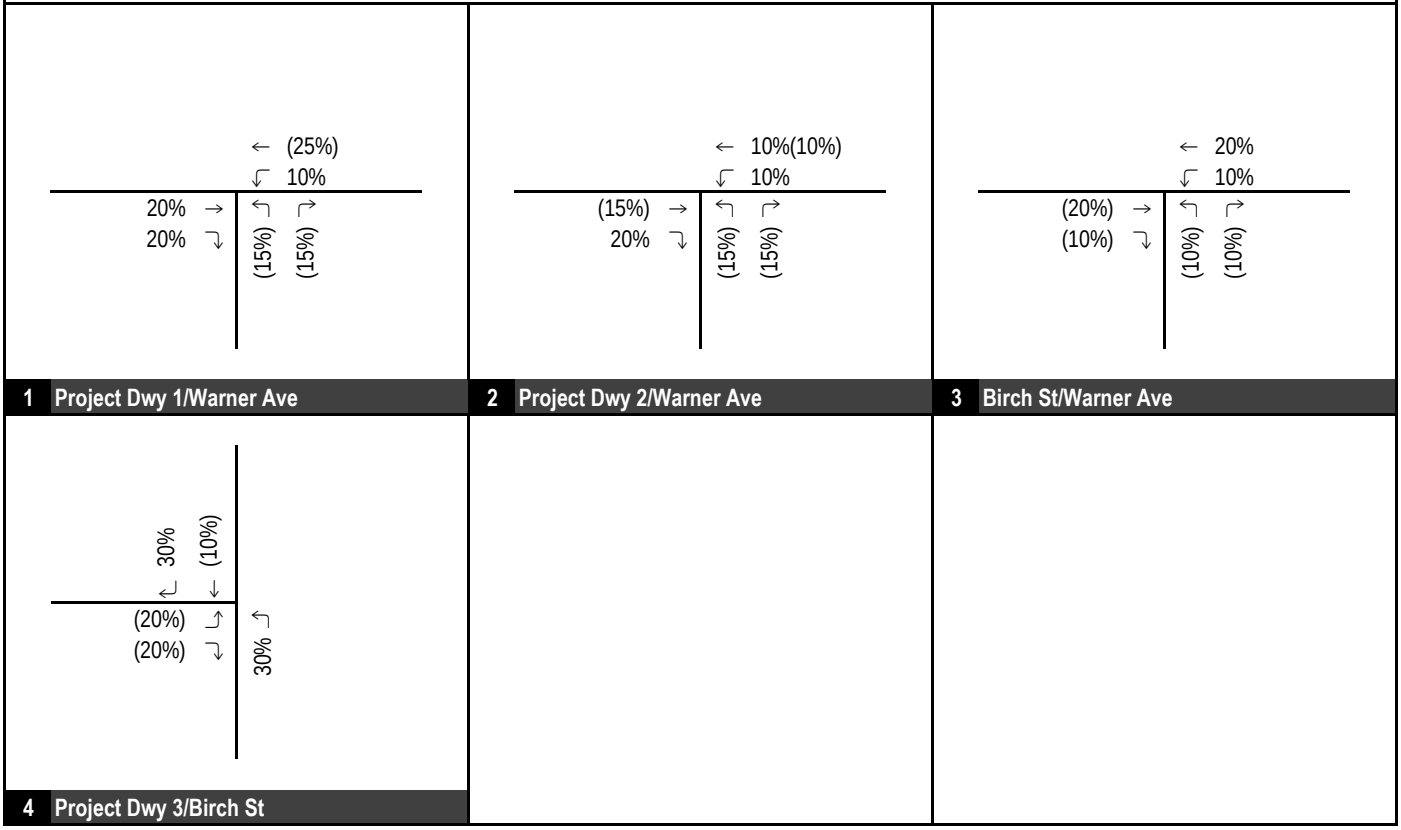


FIGURE 2

XXX%(YYY%) Inbound%(Outbound%) Percent

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Project Trip Distribution

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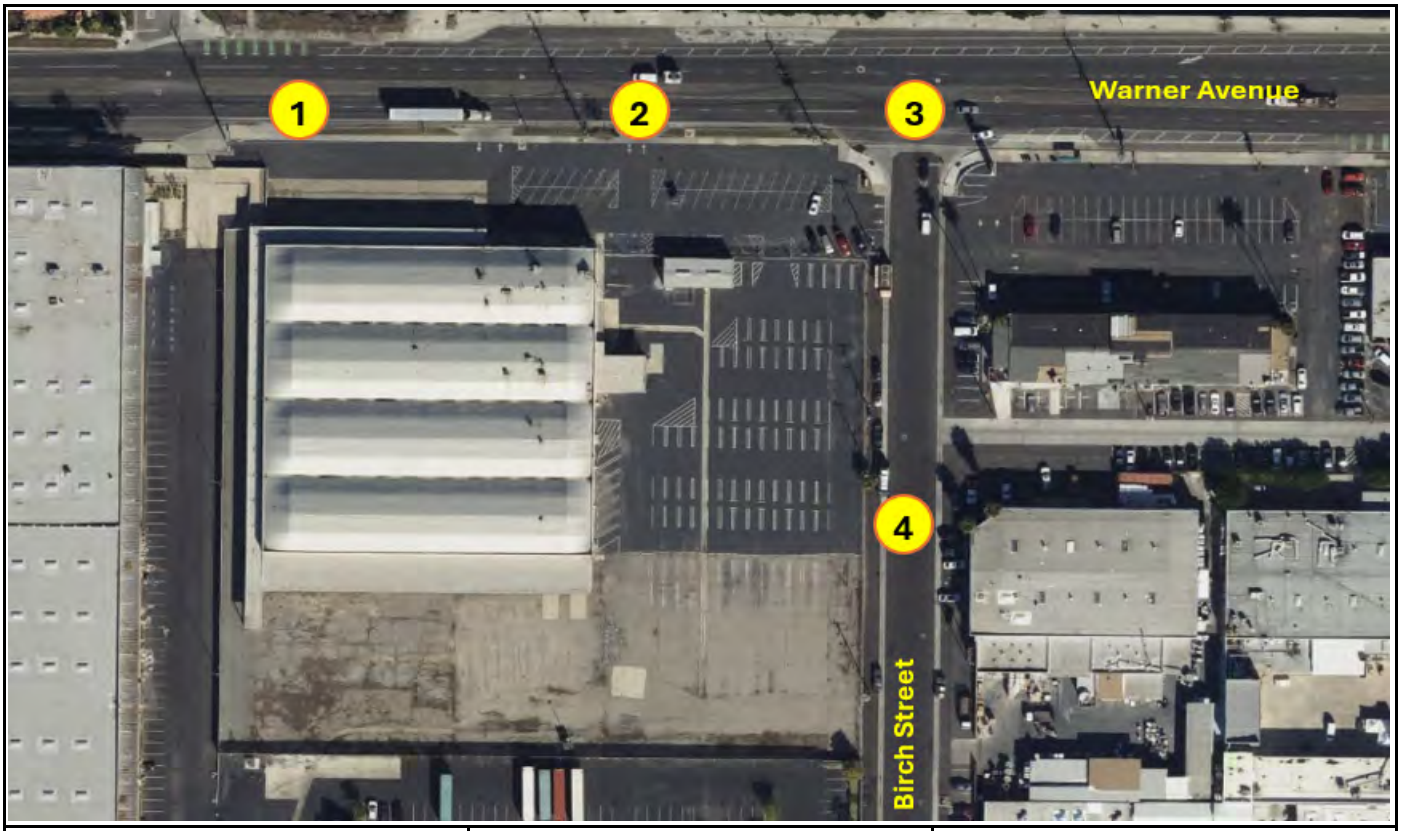

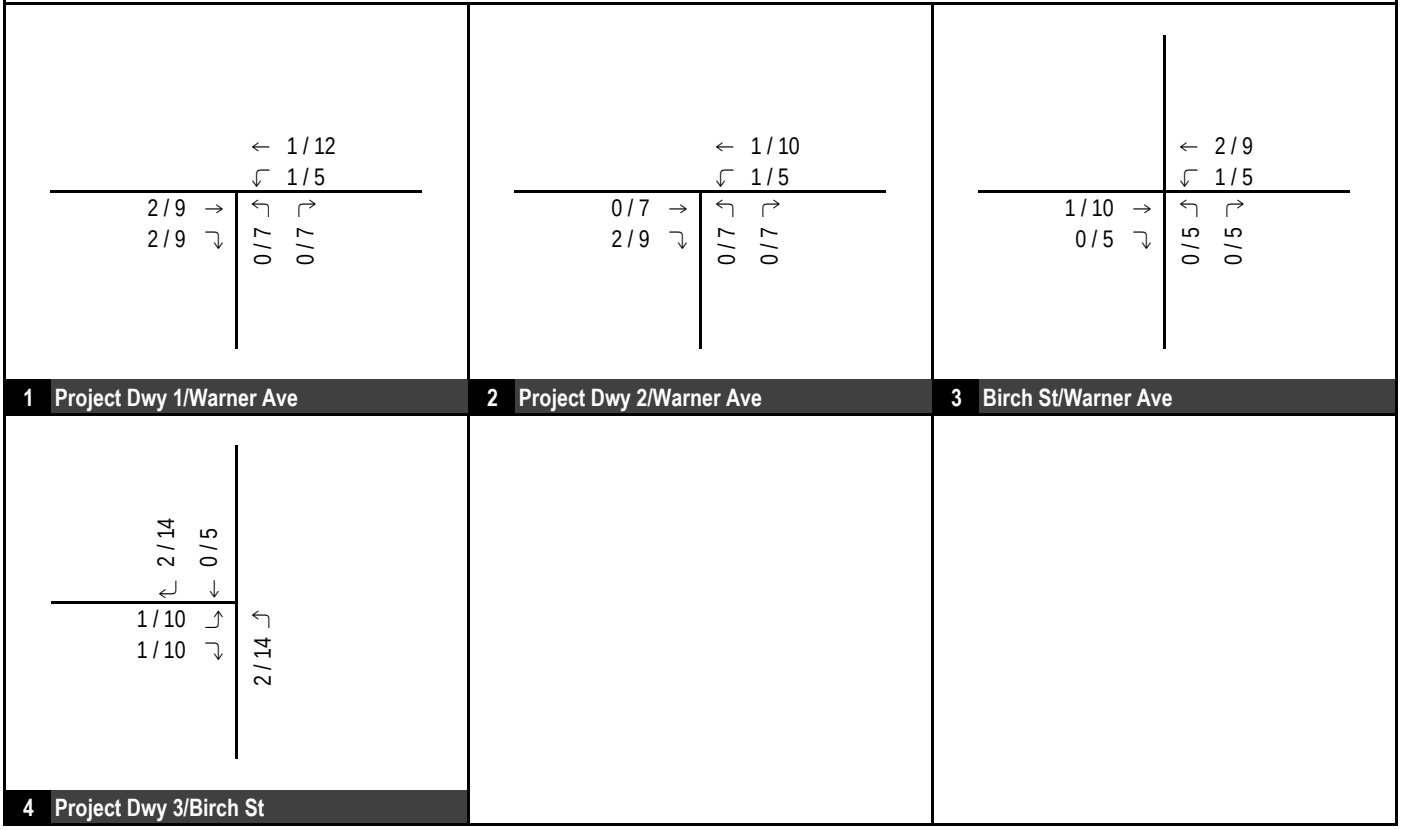

FIGURE 3

XXX / YYY AM / PM Peak Hour Trips

Footlab
Project Trip Assignment

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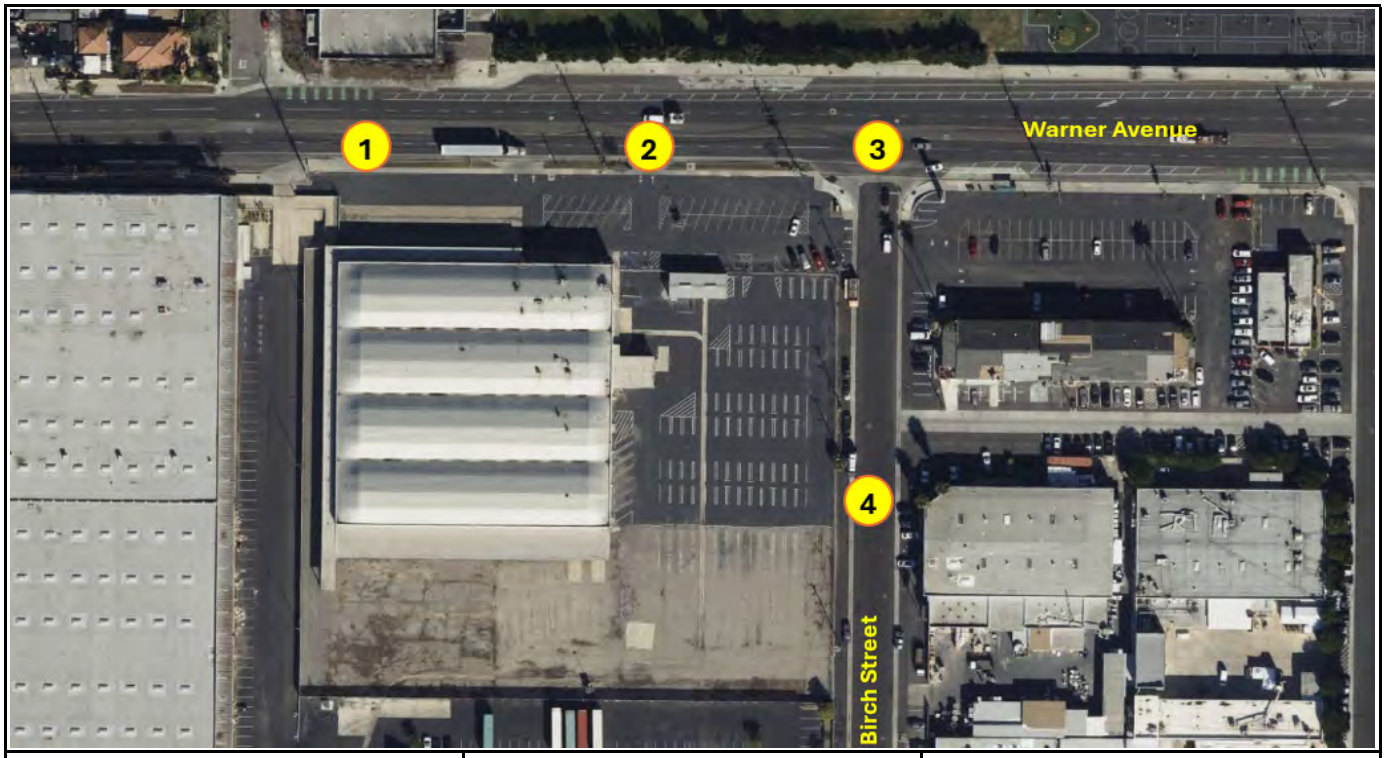
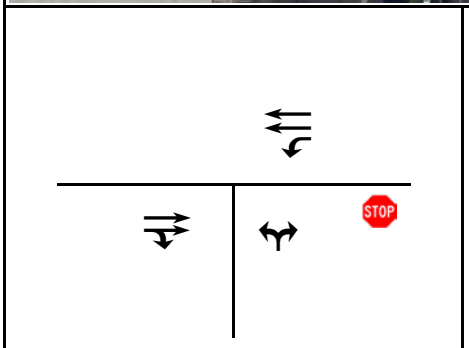
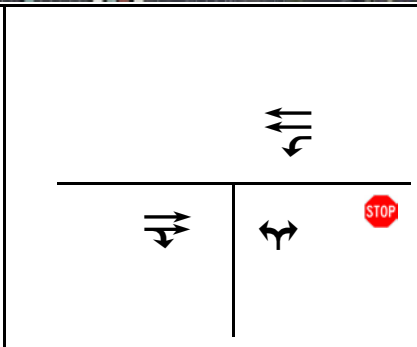
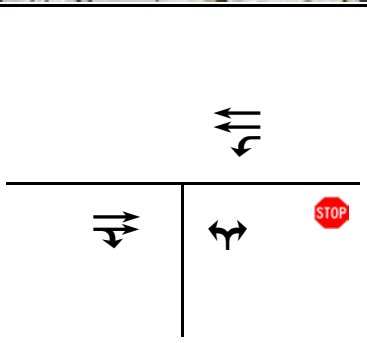




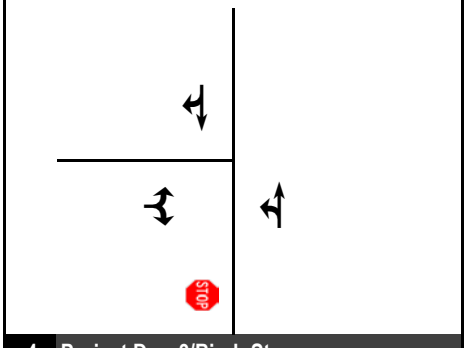
1 Project Dwy 1/Warner Ave



2 Project Dwy 2/Warner Ave



3 Birch St/Warner Ave



4 Project Dwy 3/Birch St

FIGURE 4

Legend

Signal

Stop Sign

Footlab

Existing and With Project Intersection Lane Geometrics and Stop Control

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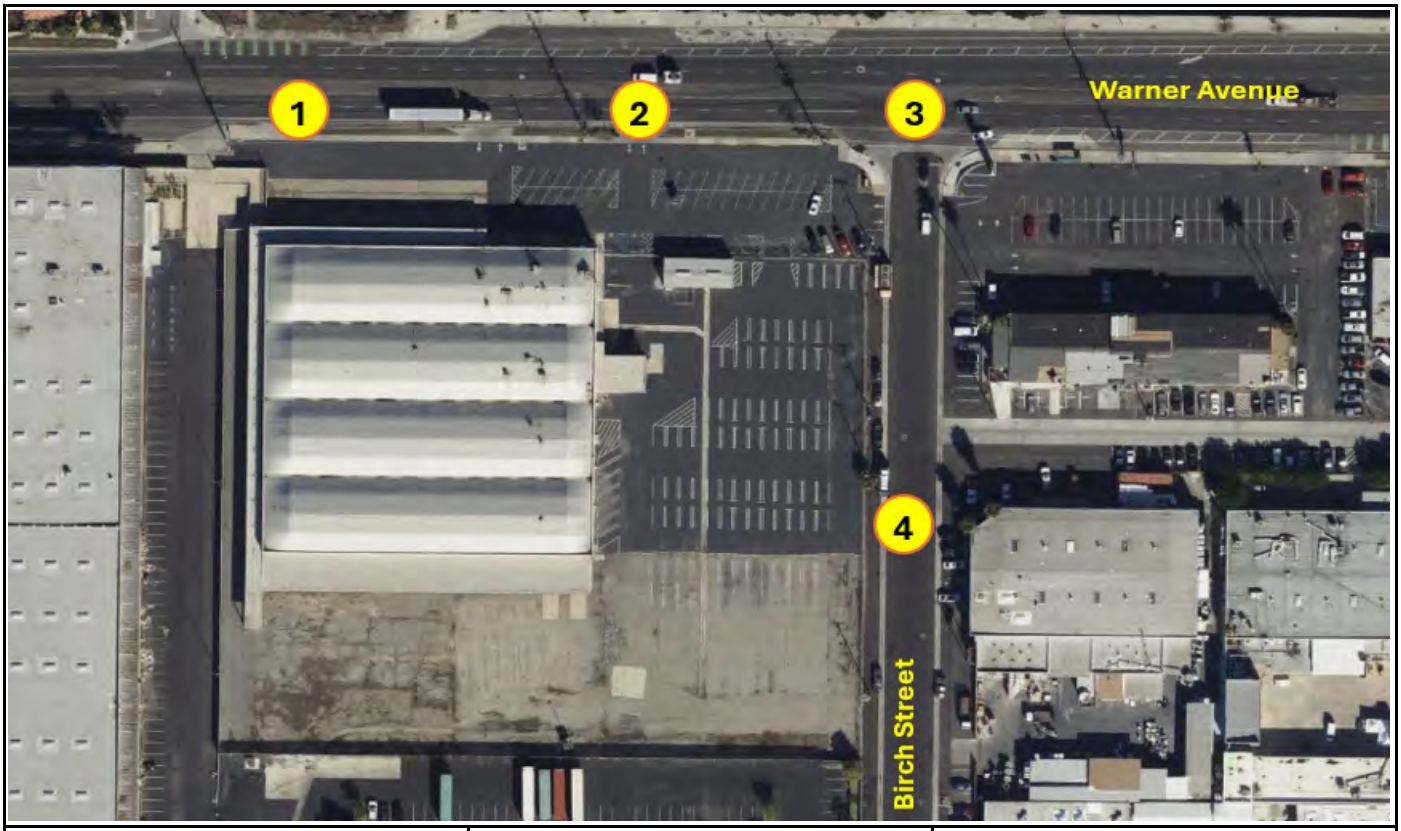
P:\Footlab Santa Ana\Focused Analysis\04 Z12 Geo Exist and With Prj\Figure (1/24/2025)



1 Project Dwy 1/Warner Ave	2 Project Dwy 2/Warner Ave	3 Birch St/Warner Ave
← 1215 / 1087 ↶ 1 / 5 831 / 1247 → 2 / 9 ↴ ↰ 0 / 7 ↱ 0 / 7	← 1215 / 1085 ↶ 1 / 5 829 / 1245 → 2 / 9 ↴ ↰ 0 / 7 ↱ 0 / 7	← 812 / 1232 ↶ 20 / 20 1200 / 1006 → 41 / 35 ↴ ↰ 15 / 84 ↱ 13 / 42

4 Project Dwy 3/Birch St
2 / 14 ↴ 60 / 50 ↓ 1 / 10 ↳ 1 / 10 ↴ ↰ 2 / 14 28 / 116 →

FIGURE 6

XXX / YYY AM / PM Peak Hour Trips

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Existing Plus Project Peak Hour Traffic Volumes

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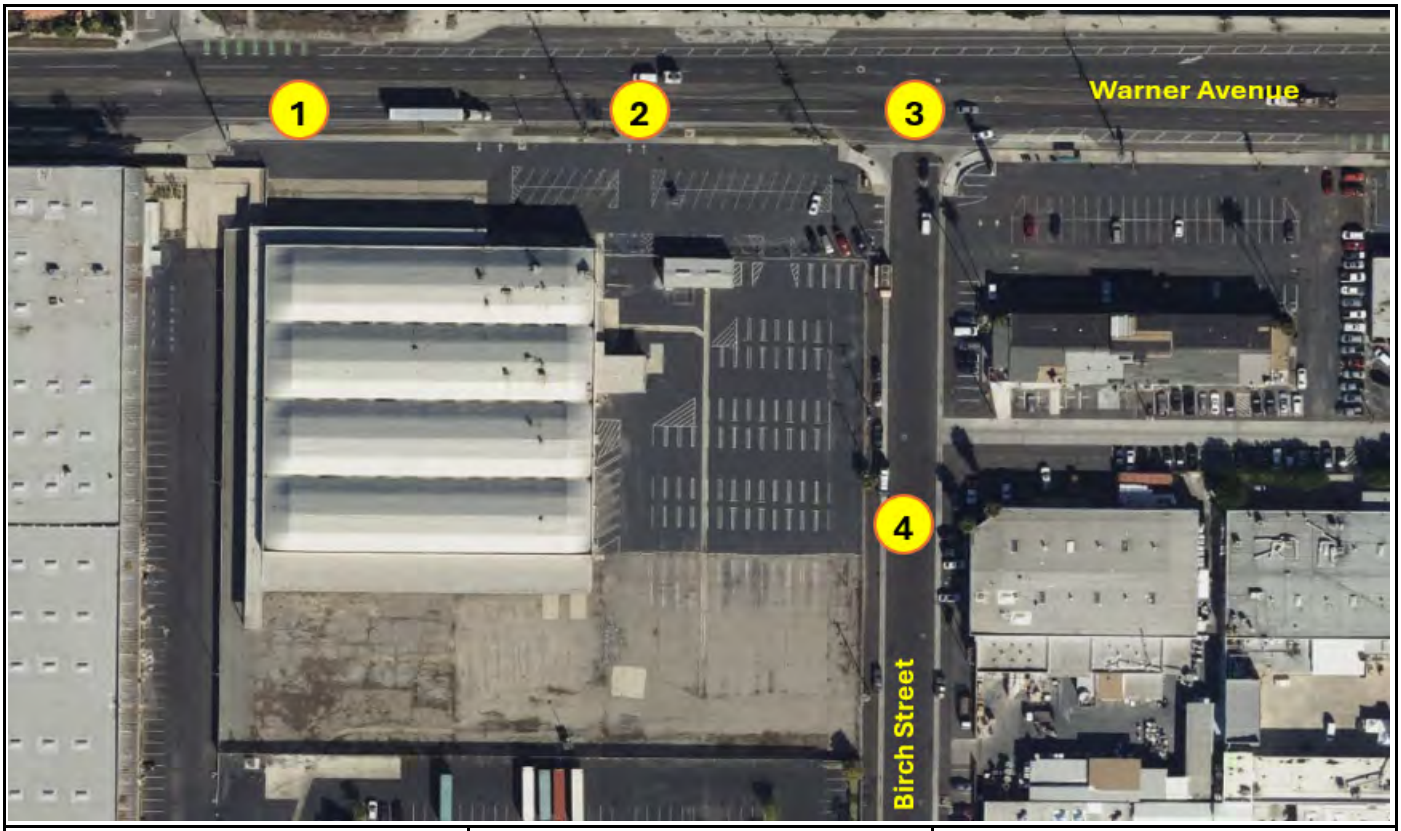

Future Intersection	Future Intersection	← 810 / 1223 ↰ 19 / 15 1199 / 996 → ↱ ↱ 41 / 30 ↲ 15 / 79 13 / 37
1 Project Dwy 1/Warner Ave	2 Project Dwy 2/Warner Ave	3 Birch St/Warner Ave
Future Intersection		
4 Project Dwy 3/Birch St		

FIGURE 5

XXX / YYY AM / PM Peak Hour Trips

Footlab
Existing Peak Hour Traffic Volumes

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Appendix A:
Survey Data

Trip Generation Survey

LOCATION: Toca Costa Mesa
CITY: Costa Mesa

DATE: 12/3/2024
DAY: Tuesday

ENTERING

Time	North Driveway	South Driveway	TOTAL
7:00 AM	0	0	**0**
7:15 AM	0	0	**0**
7:30 AM	0	0	**0**
7:45 AM	0	0	**0**
8:00 AM	0	0	**0**
8:15 AM	0	0	**0**
8:30 AM	1	0	**1**
8:45 AM	1	0	**1**

EXITING

Time	North Driveway	South Driveway	TOTAL
7:00 AM	0	0	**0**
7:15 AM	0	0	**0**
7:30 AM	0	0	**0**
7:45 AM	0	0	**0**
8:00 AM	0	0	**0**
8:15 AM	0	0	**0**
8:30 AM	0	0	**0**
8:45 AM	0	0	**0**

ENTERING

Time	North Driveway	South Driveway	TOTAL
4:00 PM	1	0	**1**
4:15 PM	1	0	**1**
4:30 PM	1	0	**1**
4:45 PM	3	0	**3**
5:00 PM	0	0	**0**
5:15 PM	0	0	**0**
5:30 PM	2	0	**2**
5:45 PM	0	0	**0**

EXITING

Time	North Driveway	South Driveway	TOTAL
4:00 PM	0	3	**3**
4:15 PM	0	0	**0**
4:30 PM	0	0	**0**
4:45 PM	0	4	**4**
5:00 PM	0	4	**4**
5:15 PM	0	0	**0**
5:30 PM	0	0	**0**
5:45 PM	0	1	**1**

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

Trip Generation Survey

LOCATION: Momentous Sports Center
CITY: Irvine

DATE: 12/4/2024
DAY: Wednesday

ENTERING

Time	North Driveway	South Driveway	TOTAL
7:00 AM	2	1	**3**
7:15 AM	3	0	**3**
7:30 AM	3	3	**6**
7:45 AM	2	0	**2**
8:00 AM	2	0	**2**
8:15 AM	1	1	**2**
8:30 AM	4	4	**8**
8:45 AM	4	4	**8**

EXITING

Time	North Driveway	South Driveway	TOTAL
7:00 AM	0	0	**0**
7:15 AM	0	0	**0**
7:30 AM	0	0	**0**
7:45 AM	0	0	**0**
8:00 AM	0	0	**0**
8:15 AM	0	1	**1**
8:30 AM	3	0	**3**
8:45 AM	2	2	**4**

ENTERING

Time	North Driveway	South Driveway	TOTAL
4:00 PM	1	30	**31**
4:15 PM	2	75	**77**
4:30 PM	2	31	**33**
4:45 PM	3	14	**17**
5:00 PM	1	10	**11**
5:15 PM	2	13	**15**
5:30 PM	2	37	**39**
5:45 PM	1	86	**87**

EXITING

Time	North Driveway	South Driveway	TOTAL
4:00 PM	13	8	**21**
4:15 PM	19	30	**49**
4:30 PM	34	13	**47**
4:45 PM	11	7	**18**
5:00 PM	24	9	**33**
5:15 PM	11	3	**14**
5:30 PM	7	4	**11**
5:45 PM	14	19	**33**

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951-268-6268

Trip Generation Survey

LOCATION: The Map Sports Facility
CITY: Garden Grove

DATE: 12/4/2024
DAY: Wednesday

ENTERING

Time	North Driveway	South Driveway	TOTAL
7:00 AM	0	0	**0**
7:15 AM	0	0	**0**
7:30 AM	0	0	**0**
7:45 AM	0	0	**0**
8:00 AM	0	0	**0**
8:15 AM	0	2	**2**
8:30 AM	0	3	**3**
8:45 AM	0	9	**9**

EXITING

Time	North Driveway	South Driveway	TOTAL
7:00 AM	0	0	**0**
7:15 AM	0	0	**0**
7:30 AM	0	0	**0**
7:45 AM	0	0	**0**
8:00 AM	0	0	**0**
8:15 AM	1	0	**1**
8:30 AM	1	0	**1**
8:45 AM	7	0	**7**

ENTERING

Time	North Driveway	South Driveway	TOTAL
4:00 PM	0	9	**9**
4:15 PM	2	24	**26**
4:30 PM	3	11	**14**
4:45 PM	3	18	**21**
5:00 PM	5	15	**20**
5:15 PM	6	11	**17**
5:30 PM	2	9	**11**
5:45 PM	0	9	**9**

EXITING

Time	North Driveway	South Driveway	TOTAL
4:00 PM	4	1	**5**
4:15 PM	5	4	**9**
4:30 PM	11	30	**41**
4:45 PM	7	12	**19**
5:00 PM	13	9	**22**
5:15 PM	7	4	**11**
5:30 PM	12	12	**24**
5:45 PM	8	1	**9**

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Appendix B:
Existing Use Trip Generation

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Appendix B - Trip Generation of Existing Use

Land Use	Units	Peak Hour						Daily
		AM Peak Hour			PM Peak Hour			
		In	Out	Total	In	Out	Total	
Total Vehicle Rates								
Trip Generation Rates[1]	Per TSF	0.651	0.089	0.740	0.091	0.559	0.650	4.870
PCE Inbound/Outbound Splits		88%	12%	100%	14%	86%	100%	50%/50%
Passenger Car Equivalent Rates Calculations								
Passenger Cars								
Recommended Mix (%)[2]		87.00%	87.00%	87.00%	87.00%	87.00%	87.00%	87.00%
PCE Factor[3]		1.0	1.0	1.0	1.0	1.0	1.0	1.0
PCE Rates		0.766	0.077	0.644	0.079	0.486	0.566	4.237
2-Axle Trucks								
Recommended Mix (%)[2]		1.03%	1.03%	1.03%	1.03%	1.03%	1.03%	1.03%
PCE Factor[3]		1.5	1.5	1.5	1.5	1.5	1.5	1.5
PCE Rates		0.010	0.001	0.011	0.001	0.009	0.010	0.075
3-Axle Trucks								
Recommended Mix (%)[2]		0.92%	0.92%	0.92%	0.92%	0.92%	0.92%	0.92%
PCE Factor[3]		2.0	2.0	2.0	2.0	2.0	2.0	2.0
PCE Rates		0.012	0.002	0.014	0.002	0.010	0.012	0.090
4-Axle Trucks								
Recommended Mix (%)[2]		11.05%	11.05%	11.05%	11.05%	11.05%	11.05%	11.05%
PCE Factor[3]		3.0	3.0	3.0	3.0	3.0	3.0	3.0
PCE Rates		0.216	0.029	0.245	0.030	0.185	0.215	1.614
Warehouse Net PCE Rate		**1.004**	**0.110**	**0.914**	**0.112**	**0.691**	**0.803**	**6.016**
Total Project Trip Generation (Trips, By Vehicle Type)								
Warehouse	57.705 TSF							
Passenger Cars		33	5	38	4	29	33	245
2-Axle Trucks		0	1	1	0	1	1	3
3-Axle Trucks		0	1	1	0	1	1	3
4+ Axle Trucks		4	1	5	1	4	5	32
Total Vehicles		37	8	45	5	35	40	283
Total Project Trip Generation (Passenger Car Eqivalent Trips, By Vehicle Type)								
Passenger Cars		33	5	38	4	29	33	245
Truck PCE								
2-Axle Trucks		0	2	2	0	2	2	5
3-Axle Trucks		0	2	2	0	2	2	6
4+ Axle Trucks		12	3	15	3	12	15	96
Total Truck PCE		12	7	19	3	16	19	107
Total PCE		**45**	**12**	**57**	**7**	**45**	**52**	**352**

Notes: Per TSF = Per Thousand Square Feet

[1] Rates based on Land Use 110 - "General Industrial" from Institute of Transportation Engineers (ITE) Trip Generation (11th Ed.).

[2] Recommended Truck Mix Percentages per City of Fontana Truck Trip Generation Study for Industrial Park uses, August 2003

[3] Recommended PCE Factors per HCM and FHWA.

Appendix C:
Existing Traffic Count

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

City of Santa Ana
N/S: S Birch Street
E/W: Warner Avenue
Weather: Clear

File Name : SNA_Birch_Warn AM
Site Code : 241066
Start Date : 12/4/2024
Page No : 1

Groups Printed- Passenger Vehicles - Large 2 Axle Vehicles - 3 Axle Vehicles - 4+ Axle Trucks

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
07:00 AM	3	115	118	1	1	2	231	8	239	359
07:15 AM	3	167	170	3	2	5	287	4	291	466
07:30 AM	1	185	186	6	4	10	272	9	281	477
07:45 AM	8	248	256	6	4	10	347	16	363	629
Total	15	715	730	16	11	27	1137	37	1174	1931
08:00 AM	7	201	208	1	3	4	279	7	286	498
08:15 AM	3	176	179	2	2	4	301	9	310	493
08:30 AM	4	144	148	7	7	14	294	9	303	465
08:45 AM	4	149	153	6	3	9	239	4	243	405
Total	18	670	688	16	15	31	1113	29	1142	1861
Grand Total	33	1385	1418	32	26	58	2250	66	2316	3792
Apprch %	2.3	97.7		55.2	44.8		97.2	2.8		
Total %	0.9	36.5	37.4	0.8	0.7	1.5	59.3	1.7	61.1	
Passenger Vehicles	30	1302	1332	25	21	46	2159	62	2221	3599
% Passenger Vehicles	90.9	94	93.9	78.1	80.8	79.3	96	93.9	95.9	94.9
Large 2 Axle Vehicles	3	68	71	7	5	12	80	3	83	166
% Large 2 Axle Vehicles	9.1	4.9	5	21.9	19.2	20.7	3.6	4.5	3.6	4.4
3 Axle Vehicles	0	5	5	0	0	0	6	0	6	11
% 3 Axle Vehicles	0	0.4	0.4	0	0	0	0.3	0	0.3	0.3
4+ Axle Trucks	0	10	10	0	0	0	5	1	6	16
% 4+ Axle Trucks	0	0.7	0.7	0	0	0	0.2	1.5	0.3	0.4

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 AM to 08:45 AM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:30 AM										
07:30 AM	1	185	186	**6**	**4**	**10**	272	9	281	477
07:45 AM	**8**	**248**	**256**	6	4	10	**347**	**16**	**363**	**629**
08:00 AM	7	201	208	1	3	4	279	7	286	498
08:15 AM	3	176	179	2	2	4	301	9	310	493
Total Volume	19	810	829	15	13	28	1199	41	1240	2097
% App. Total	2.3	97.7		53.6	46.4		96.7	3.3		
PHF	.594	.817	.810	.625	.813	.700	.864	.641	.854	.833

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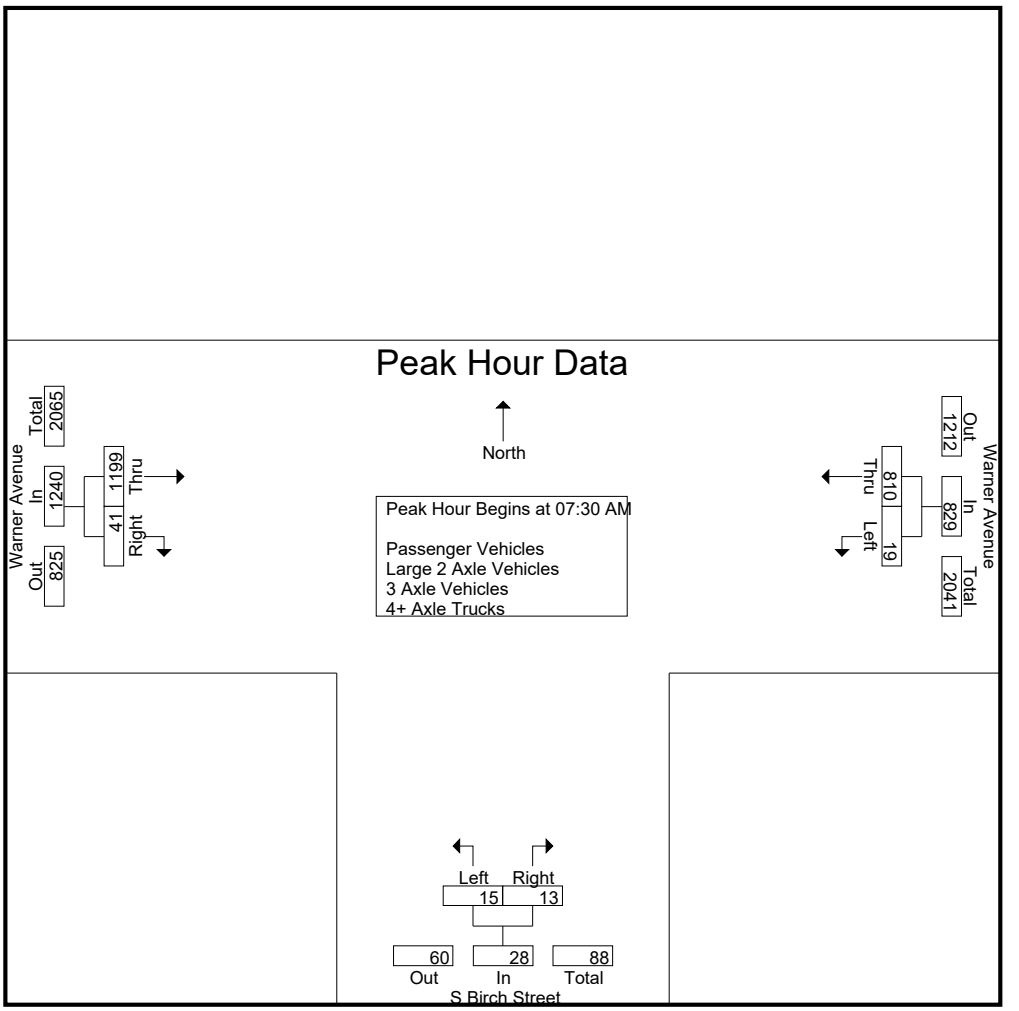
City of Santa Ana
N/S: S Birch Street
E/W: Warner Avenue
Weather: Clear

File Name : SNA_Birch_Warn AM
Site Code : 241066
Start Date : 12/4/2024
Page No : 2



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

	07:30 AM			07:45 AM			07:45 AM		
+0 mins.	1	185	186	6	4	10	**347**	**16**	**363**
+15 mins.	**8**	**248**	**256**	1	3	4	279	7	286
+30 mins.	7	201	208	2	2	4	301	9	310
+45 mins.	3	176	179	**7**	**7**	**14**	294	9	303
Total Volume	19	810	829	16	16	32	1221	41	1262
% App. Total	2.3	97.7		50	50		96.8	3.2	
PHF	.594	.817	.810	.571	.571	.571	.880	.641	.869

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City of Santa Ana
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E/W: Warner Avenue
Weather: Clear

File Name : SNA_Birch_Warn AM
Site Code : 241066
Start Date : 12/4/2024

Groups Printed- Passenger Vehicles

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
07:00 AM	3	108	111	1	1	2	220	7	227	340
07:15 AM	3	157	160	2	2	4	276	4	280	444
07:30 AM	1	172	173	4	2	6	263	9	272	451
07:45 AM	8	240	248	4	3	7	331	14	345	600
Total	15	677	692	11	8	19	1090	34	1124	1835
08:00 AM	5	184	189	1	2	3	274	7	281	473
08:15 AM	3	169	172	2	1	3	287	8	295	470
08:30 AM	4	135	139	6	7	13	284	9	293	445
08:45 AM	3	137	140	5	3	8	224	4	228	376
Total	15	625	640	14	13	27	1069	28	1097	1764
Grand Total	30	1302	1332	25	21	46	2159	62	2221	3599
Apprch %	2.3	97.7		54.3	45.7		97.2	2.8		
Total %	0.8	36.2	37	0.7	0.6	1.3	60	1.7	61.7	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:30 AM										
07:30 AM	1	172	173	**4**	2	6	263	9	272	451
07:45 AM	**8**	**240**	**248**	4	**3**	**7**	**331**	**14**	**345**	**600**
08:00 AM	5	184	189	1	2	3	274	7	281	473
08:15 AM	3	169	172	2	1	3	287	8	295	470
Total Volume	17	765	782	11	8	19	1155	38	1193	1994
% App. Total	2.2	97.8		57.9	42.1		96.8	3.2		
PHF	.531	.797	.788	.688	.667	.679	.872	.679	.864	.831

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City of Santa Ana
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E/W: Warner Avenue
Weather: Clear

File Name : SNA_Birch_Warn AM
Site Code : 241066
Start Date : 12/4/2024
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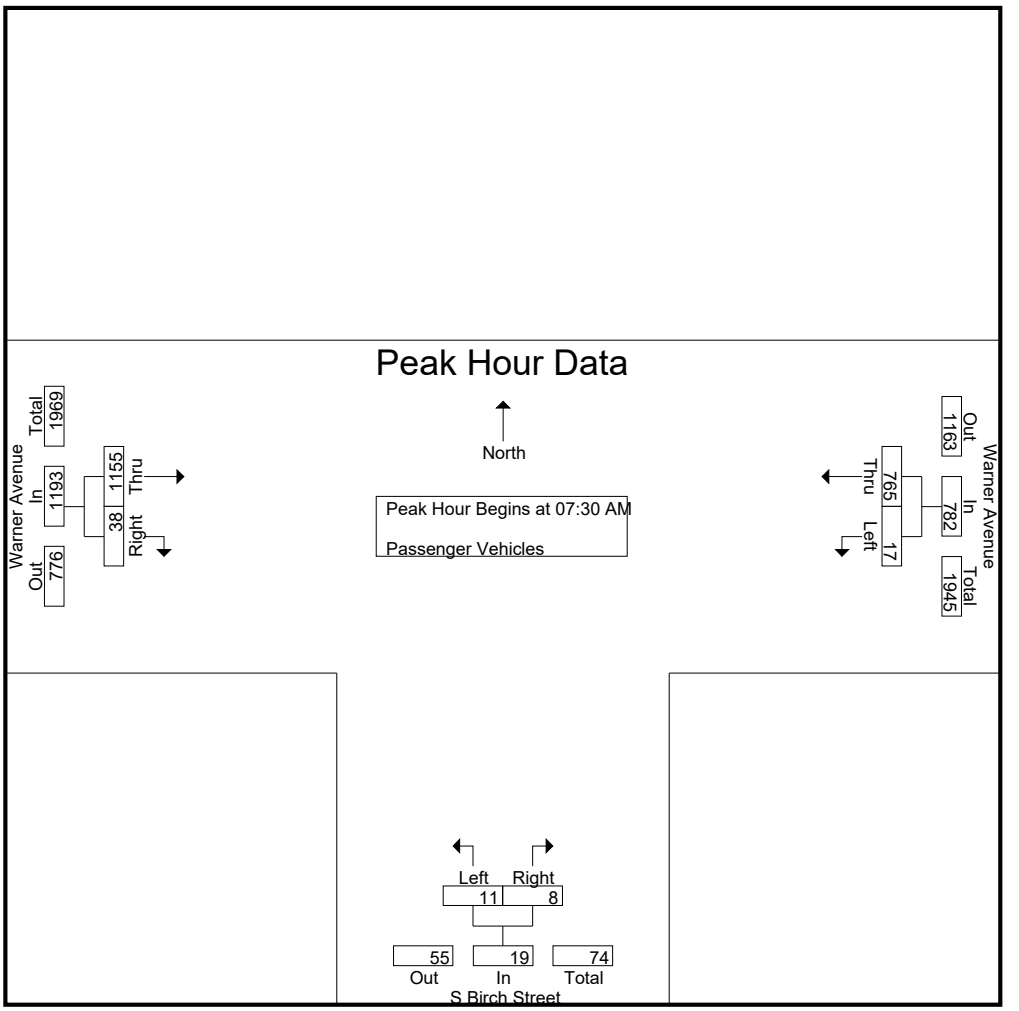

Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM			07:30 AM			07:30 AM		
+0 mins.	1	172	173	**4**	2	6	263	9	272
+15 mins.	**8**	**240**	**248**	4	**3**	**7**	**331**	**14**	**345**
+30 mins.	5	184	189	1	2	3	274	7	281
+45 mins.	3	169	172	2	1	3	287	8	295
Total Volume	17	765	782	11	8	19	1155	38	1193
% App. Total	2.2	97.8		57.9	42.1		96.8	3.2	
PHF	.531	.797	.788	.688	.667	.679	.872	.679	.864

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Groups Printed- Large 2 Axle Vehicles

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
07:00 AM	0	5	5	0	0	0	11	1	12	17
07:15 AM	0	10	10	1	0	1	11	0	11	22
07:30 AM	0	12	12	2	2	4	6	0	6	22
07:45 AM	0	8	8	2	1	3	13	2	15	26
Total	0	35	35	5	3	8	41	3	44	87
08:00 AM	2	14	16	0	1	1	4	0	4	21
08:15 AM	0	5	5	0	1	1	13	0	13	19
08:30 AM	0	8	8	1	0	1	9	0	9	18
08:45 AM	1	6	7	1	0	1	13	0	13	21
Total	3	33	36	2	2	4	39	0	39	79
Grand Total	3	68	71	7	5	12	80	3	83	166
Apprch %	4.2	95.8		58.3	41.7		96.4	3.6		
Total %	1.8	41	42.8	4.2	3	7.2	48.2	1.8	50	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:30 AM										
07:30 AM	0	12	12	**2**	**2**	**4**	6	0	6	22
07:45 AM	0	8	8	2	1	3	**13**	**2**	**15**	**26**
08:00 AM	**2**	**14**	**16**	0	1	1	4	0	4	21
08:15 AM	0	5	5	0	1	1	13	0	13	19
Total Volume	2	39	41	4	5	9	36	2	38	88
% App. Total	4.9	95.1		44.4	55.6		94.7	5.3		
PHF	.250	.696	.641	.500	.625	.563	.692	.250	.633	.846

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File Name : SNA_Birch_Warn AM
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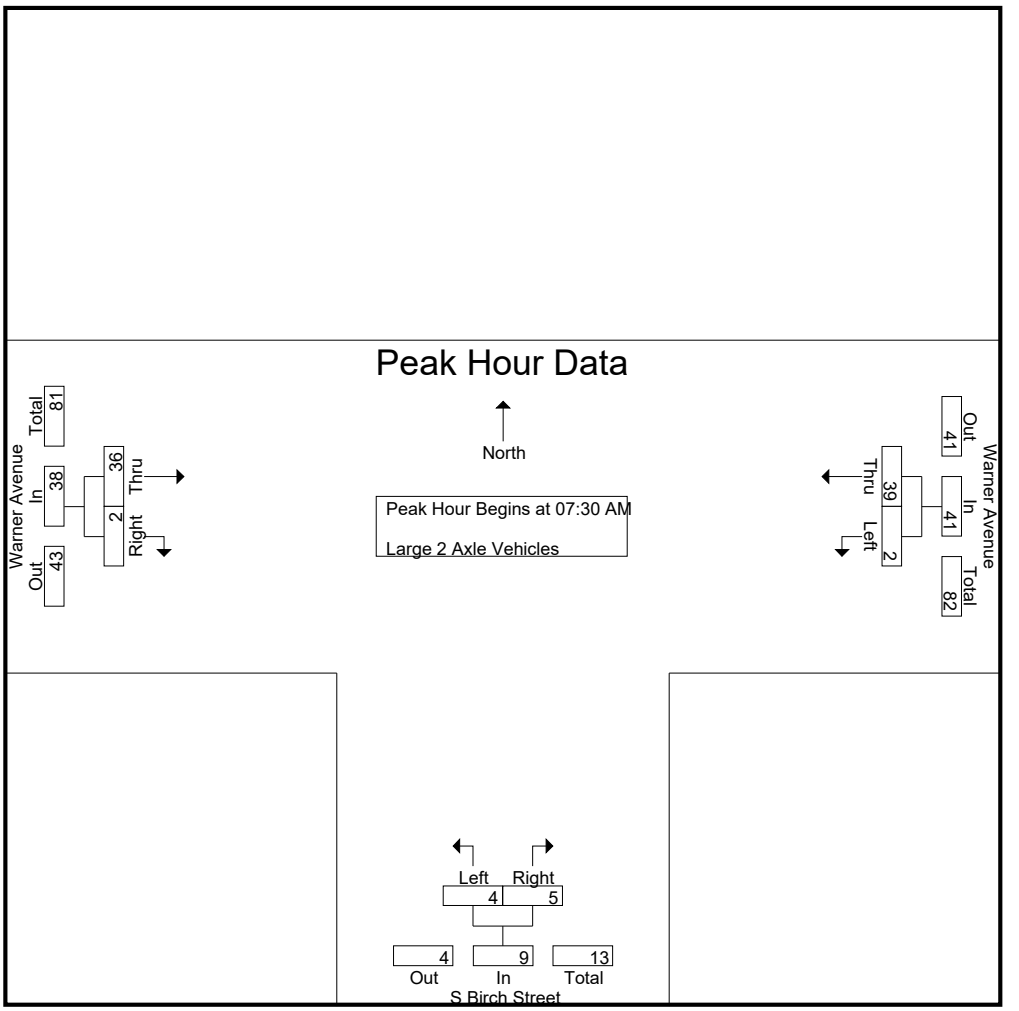

Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM			07:30 AM			07:30 AM		
+0 mins.	0	12	12	**2**	**2**	**4**	6	0	6
+15 mins.	0	8	8	2	1	3	**13**	**2**	**15**
+30 mins.	**2**	**14**	**16**	0	1	1	4	0	4
+45 mins.	0	5	5	0	1	1	13	0	13
Total Volume	2	39	41	4	5	9	36	2	38
% App. Total	4.9	95.1		44.4	55.6		94.7	5.3	
PHF	.250	.696	.641	.500	.625	.563	.692	.250	.633

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Groups Printed- 3 Axle Vehicles

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
07:00 AM	0	2	2	0	0	0	0	0	0	2
07:15 AM	0	0	0	0	0	0	0	0	0	0
07:30 AM	0	0	0	0	0	0	2	0	2	2
07:45 AM	0	0	0	0	0	0	0	0	0	0
Total	0	2	2	0	0	0	2	0	2	4
08:00 AM	0	0	0	0	0	0	1	0	1	1
08:15 AM	0	2	2	0	0	0	1	0	1	3
08:30 AM	0	0	0	0	0	0	1	0	1	1
08:45 AM	0	1	1	0	0	0	1	0	1	2
Total	0	3	3	0	0	0	4	0	4	7
Grand Total	0	5	5	0	0	0	6	0	6	11
Apprch %	0	100		0	0		100	0		
Total %	0	45.5	45.5	0	0	0	54.5	0	54.5	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:30 AM										
07:30 AM	0	0	0	0	0	0	**2**	0	**2**	2
07:45 AM	0	0	0	0	0	0	0	0	0	0
08:00 AM	0	0	0	0	0	0	1	0	1	1
08:15 AM	0	**2**	**2**	0	0	0	1	0	1	**3**
Total Volume	0	2	2	0	0	0	4	0	4	6
% App. Total	0	100		0	0		100	0		
PHF	.000	.250	.250	.000	.000	.000	.500	.000	.500	.500

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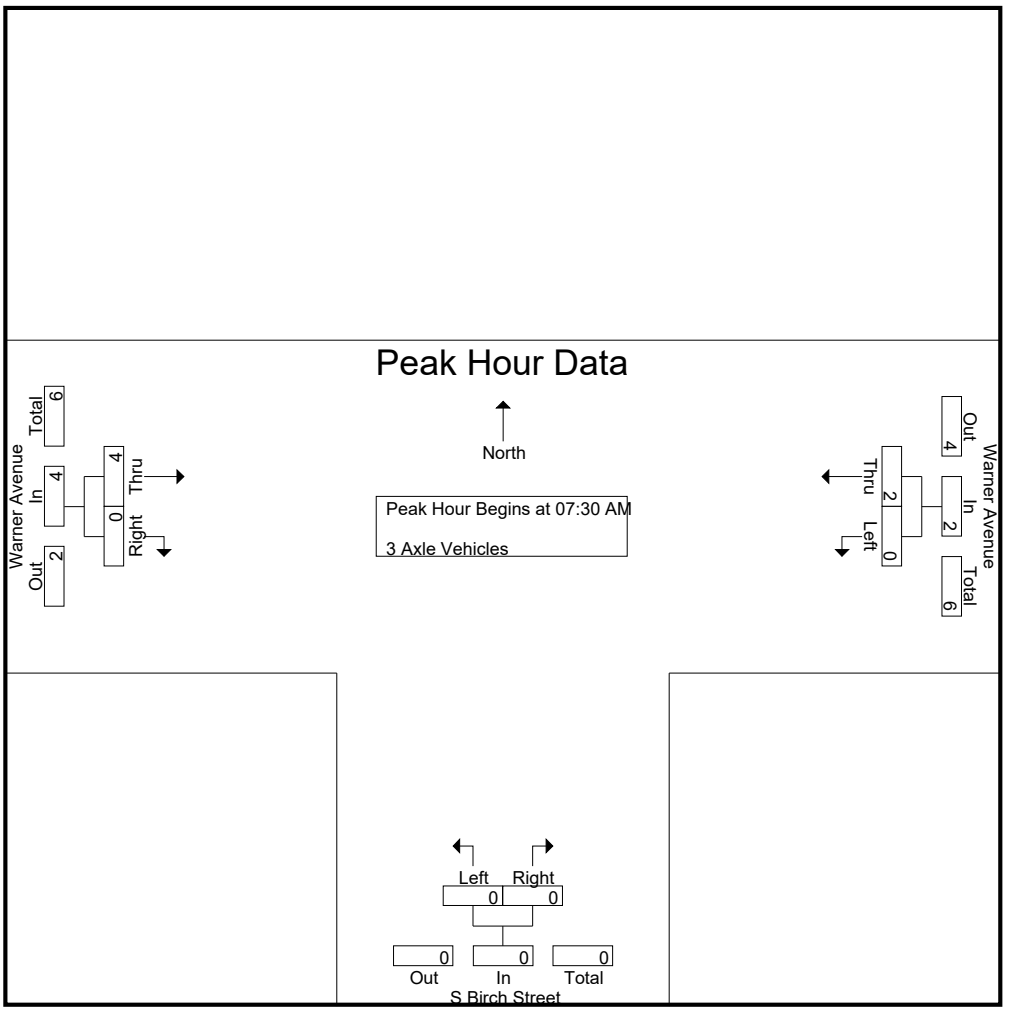

Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM			07:30 AM			07:30 AM		
+0 mins.	0	0	0	0	0	0	**2**	0	**2**
+15 mins.	0	0	0	0	0	0	0	0	0
+30 mins.	0	0	0	0	0	0	1	0	1
+45 mins.	0	**2**	**2**	0	0	0	1	0	1
Total Volume	0	2	2	0	0	0	4	0	4
% App. Total	0	100		0	0		100	0	
PHF	.000	.250	.250	.000	.000	.000	.500	.000	.500

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Groups Printed- 4+ Axle Trucks

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
07:00 AM	0	0	0	0	0	0	0	0	0	0
07:15 AM	0	0	0	0	0	0	0	0	0	0
07:30 AM	0	1	1	0	0	0	1	0	1	2
07:45 AM	0	0	0	0	0	0	3	0	3	3
Total	0	1	1	0	0	0	4	0	4	5
08:00 AM	0	3	3	0	0	0	0	0	0	3
08:15 AM	0	0	0	0	0	0	0	1	1	1
08:30 AM	0	1	1	0	0	0	0	0	0	1
08:45 AM	0	5	5	0	0	0	1	0	1	6
Total	0	9	9	0	0	0	1	1	2	11
Grand Total	0	10	10	0	0	0	5	1	6	16
Apprch %	0	100		0	0		83.3	16.7		
Total %	0	62.5	62.5	0	0	0	31.2	6.2	37.5	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:30 AM										
07:30 AM	0	1	1	0	0	0	1	0	1	2
07:45 AM	0	0	0	0	0	0	**3**	0	**3**	**3**
08:00 AM	0	**3**	**3**	0	0	0	0	0	0	3
08:15 AM	0	0	0	0	0	0	0	**1**	1	1
Total Volume	0	4	4	0	0	0	4	1	5	9
% App. Total	0	100		0	0		80	20		
PHF	.000	.333	.333	.000	.000	.000	.333	.250	.417	.750

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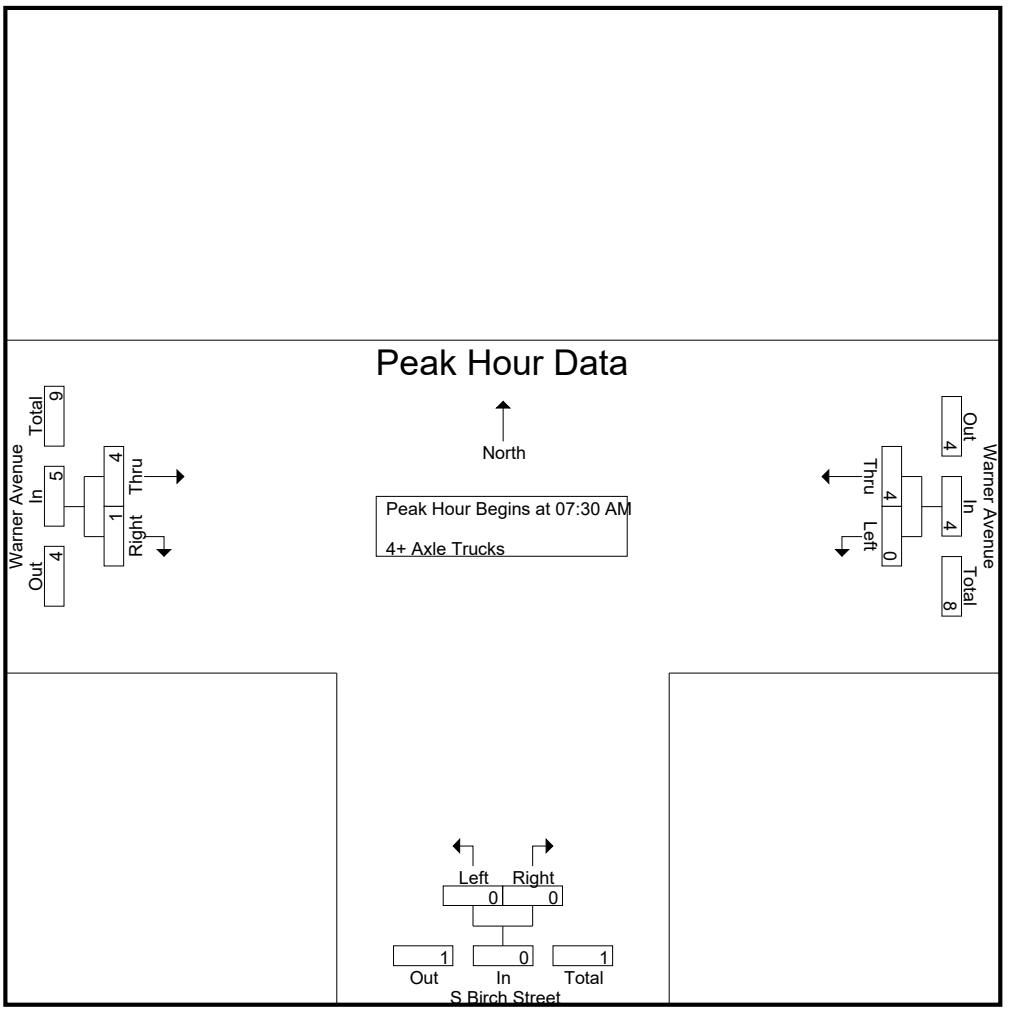

Peak Hour Analysis From 07:30 AM to 08:15 AM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30 AM			07:30 AM			07:30 AM		
+0 mins.	0	1	1	0	0	0	1	0	1
+15 mins.	0	0	0	0	0	0	**3**	0	**3**
+30 mins.	0	**3**	**3**	0	0	0	0	0	0
+45 mins.	0	0	0	0	0	0	0	**1**	1
Total Volume	0	4	4	0	0	0	4	1	5
% App. Total	0	100		0	0		80	20	
PHF	.000	.333	.333	.000	.000	.000	.333	.250	.417

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Groups Printed- Passenger Vehicles - Large 2 Axle Vehicles - 3 Axle Vehicles - 4+ Axle Trucks

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
04:00 PM	2	270	272	31	12	43	230	6	236	551
04:15 PM	2	269	271	21	6	27	205	9	214	512
04:30 PM	3	295	298	25	13	38	242	9	251	587
04:45 PM	2	303	305	22	9	31	224	10	234	570
Total	9	1137	1146	99	40	139	901	34	935	2220
05:00 PM	5	316	321	16	15	31	247	5	252	604
05:15 PM	1	297	298	19	9	28	258	9	267	593
05:30 PM	7	307	314	22	4	26	267	6	273	613
05:45 PM	9	287	296	12	6	18	228	5	233	547
Total	22	1207	1229	69	34	103	1000	25	1025	2357
Grand Total	31	2344	2375	168	74	242	1901	59	1960	4577
Apprch %	1.3	98.7		69.4	30.6		97	3		
Total %	0.7	51.2	51.9	3.7	1.6	5.3	41.5	1.3	42.8	
Passenger Vehicles	30	2298	2328	162	64	226	1849	55	1904	4458
% Passenger Vehicles	96.8	98	98	96.4	86.5	93.4	97.3	93.2	97.1	97.4
Large 2 Axle Vehicles	1	41	42	6	10	16	47	4	51	109
% Large 2 Axle Vehicles	3.2	1.7	1.8	3.6	13.5	6.6	2.5	6.8	2.6	2.4
3 Axle Vehicles	0	2	2	0	0	0	1	0	1	3
% 3 Axle Vehicles	0	0.1	0.1	0	0	0	0.1	0	0.1	0.1
4+ Axle Trucks	0	3	3	0	0	0	4	0	4	7
% 4+ Axle Trucks	0	0.1	0.1	0	0	0	0.2	0	0.2	0.2

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 04:45 PM										
04:45 PM	2	303	305	**22**	9	**31**	224	**10**	234	570
05:00 PM	5	**316**	**321**	16	**15**	31	247	5	252	604
05:15 PM	1	297	298	19	9	28	258	9	267	593
05:30 PM	**7**	307	314	22	4	26	**267**	6	**273**	**613**
Total Volume	15	1223	1238	79	37	116	996	30	1026	2380
% App. Total	1.2	98.8		68.1	31.9		97.1	2.9		
PHF	.536	.968	.964	.898	.617	.935	.933	.750	.940	.971

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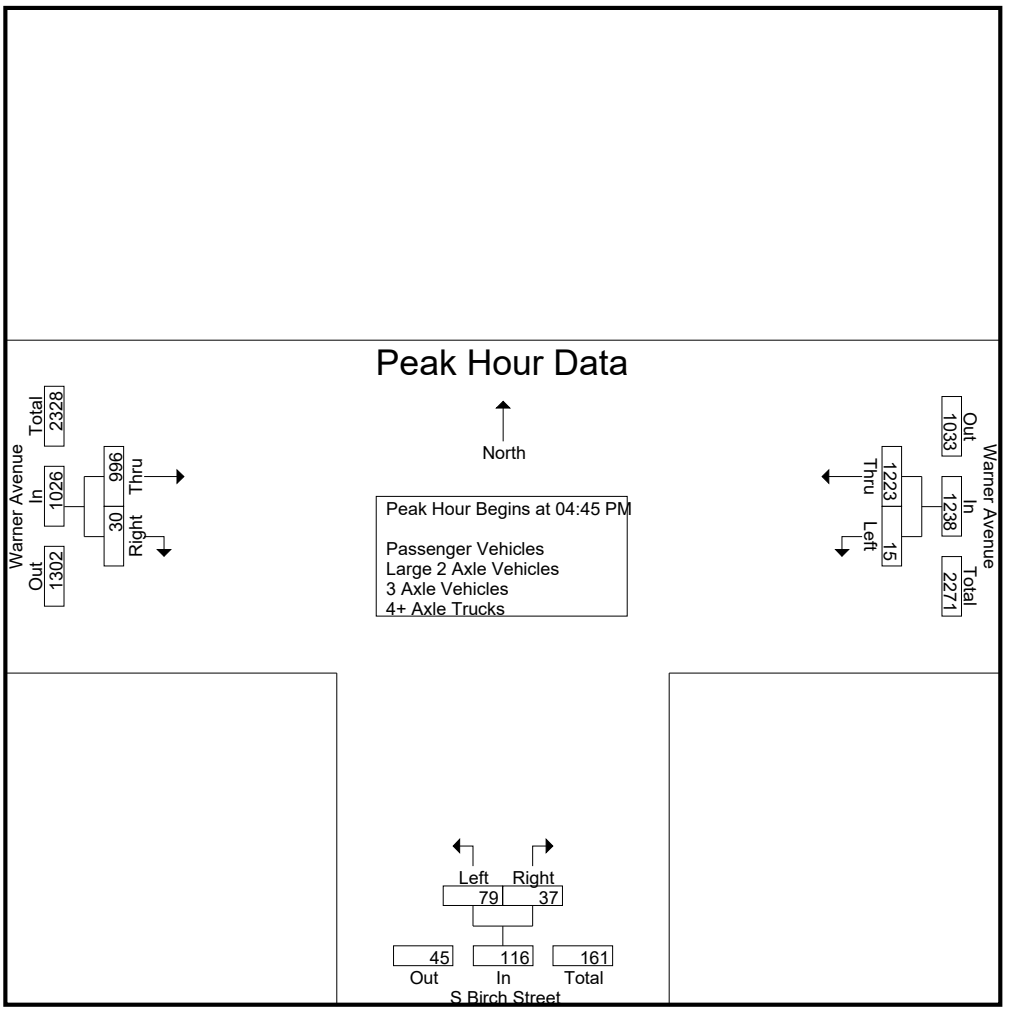

Peak Hour Analysis From 04:00 PM to 05:45 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:45 PM			04:00 PM			04:45 PM		
+0 mins.	2	303	305	**31**	12	**43**	224	**10**	234
+15 mins.	5	**316**	**321**	21	6	27	247	5	252
+30 mins.	1	297	298	25	**13**	38	258	9	267
+45 mins.	**7**	307	314	22	9	31	**267**	6	**273**
Total Volume	15	1223	1238	99	40	139	996	30	1026
% App. Total	1.2	98.8		71.2	28.8		97.1	2.9	
PHF	.536	.968	.964	.798	.769	.808	.933	.750	.940

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Groups Printed- Passenger Vehicles

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
04:00 PM	2	265	267	30	10	40	222	6	228	535
04:15 PM	2	262	264	20	4	24	198	9	207	495
04:30 PM	3	286	289	24	12	36	231	8	239	564
04:45 PM	2	296	298	20	7	27	221	9	230	555
Total	9	1109	1118	94	33	127	872	32	904	2149
05:00 PM	5	314	319	16	14	30	238	4	242	591
05:15 PM	1	285	286	19	8	27	252	8	260	573
05:30 PM	7	305	312	21	4	25	265	6	271	608
05:45 PM	8	285	293	12	5	17	222	5	227	537
Total	21	1189	1210	68	31	99	977	23	1000	2309
Grand Total	30	2298	2328	162	64	226	1849	55	1904	4458
Apprch %	1.3	98.7		71.7	28.3		97.1	2.9		
Total %	0.7	51.5	52.2	3.6	1.4	5.1	41.5	1.2	42.7	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 04:45 PM										
04:45 PM	2	296	298	20	7	27	221	**9**	230	555
05:00 PM	5	**314**	**319**	16	**14**	**30**	238	4	242	591
05:15 PM	1	285	286	19	8	27	252	8	260	573
05:30 PM	**7**	305	312	**21**	4	25	**265**	6	**271**	**608**
Total Volume	15	1200	1215	76	33	109	976	27	1003	2327
% App. Total	1.2	98.8		69.7	30.3		97.3	2.7		
PHF	.536	.955	.952	.905	.589	.908	.921	.750	.925	.957

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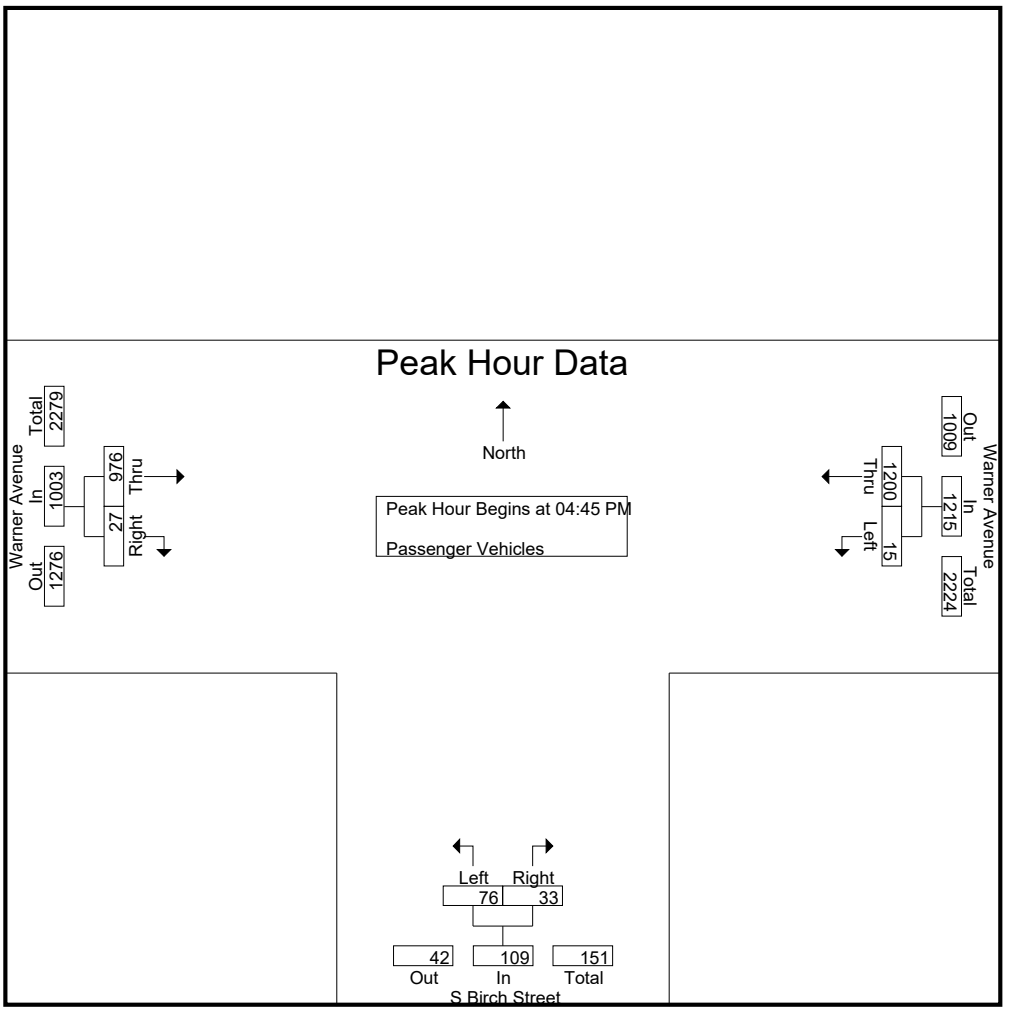
City of Santa Ana
N/S: S Birch Street
E/W: Warner Avenue
Weather: Clear

File Name : SNA_Birch_Warn PM
Site Code : 241066
Start Date : 12/4/2024
Page No : 2



Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:45 PM			04:45 PM			04:45 PM		
+0 mins.	2	296	298	20	7	27	221	**9**	230
+15 mins.	5	**314**	**319**	16	**14**	**30**	238	4	242
+30 mins.	1	285	286	19	8	27	252	8	260
+45 mins.	**7**	305	312	**21**	4	25	**265**	6	**271**
Total Volume	15	1200	1215	76	33	109	976	27	1003
% App. Total	1.2	98.8		69.7	30.3		97.3	2.7	
PHF	.536	.955	.952	.905	.589	.908	.921	.750	.925

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File Name : SNA_Birch_Warn PM
Site Code : 241066
Start Date : 12/4/2024
Page No : 1

Groups Printed- Large 2 Axle Vehicles

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
04:00 PM	0	4	4	1	2	3	7	0	7	14
04:15 PM	0	5	5	1	2	3	6	0	6	14
04:30 PM	0	8	8	1	1	2	10	1	11	21
04:45 PM	0	7	7	2	2	4	3	1	4	15
Total	0	24	24	5	7	12	26	2	28	64
05:00 PM	0	1	1	0	1	1	7	1	8	10
05:15 PM	0	12	12	0	1	1	6	1	7	20
05:30 PM	0	2	2	1	0	1	2	0	2	5
05:45 PM	1	2	3	0	1	1	6	0	6	10
Total	1	17	18	1	3	4	21	2	23	45
Grand Total	1	41	42	6	10	16	47	4	51	109
Apprch %	2.4	97.6		37.5	62.5		92.2	7.8		
Total %	0.9	37.6	38.5	5.5	9.2	14.7	43.1	3.7	46.8	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 04:45 PM										
04:45 PM	0	7	7	**2**	**2**	**4**	3	**1**	4	15
05:00 PM	0	1	1	0	1	1	**7**	1	**8**	10
05:15 PM	0	**12**	**12**	0	1	1	6	1	7	**20**
05:30 PM	0	2	2	1	0	1	2	0	2	5
Total Volume	0	22	22	3	4	7	18	3	21	50
% App. Total	0	100		42.9	57.1		85.7	14.3		
PHF	.000	.458	.458	.375	.500	.438	.643	.750	.656	.625

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Site Code : 241066
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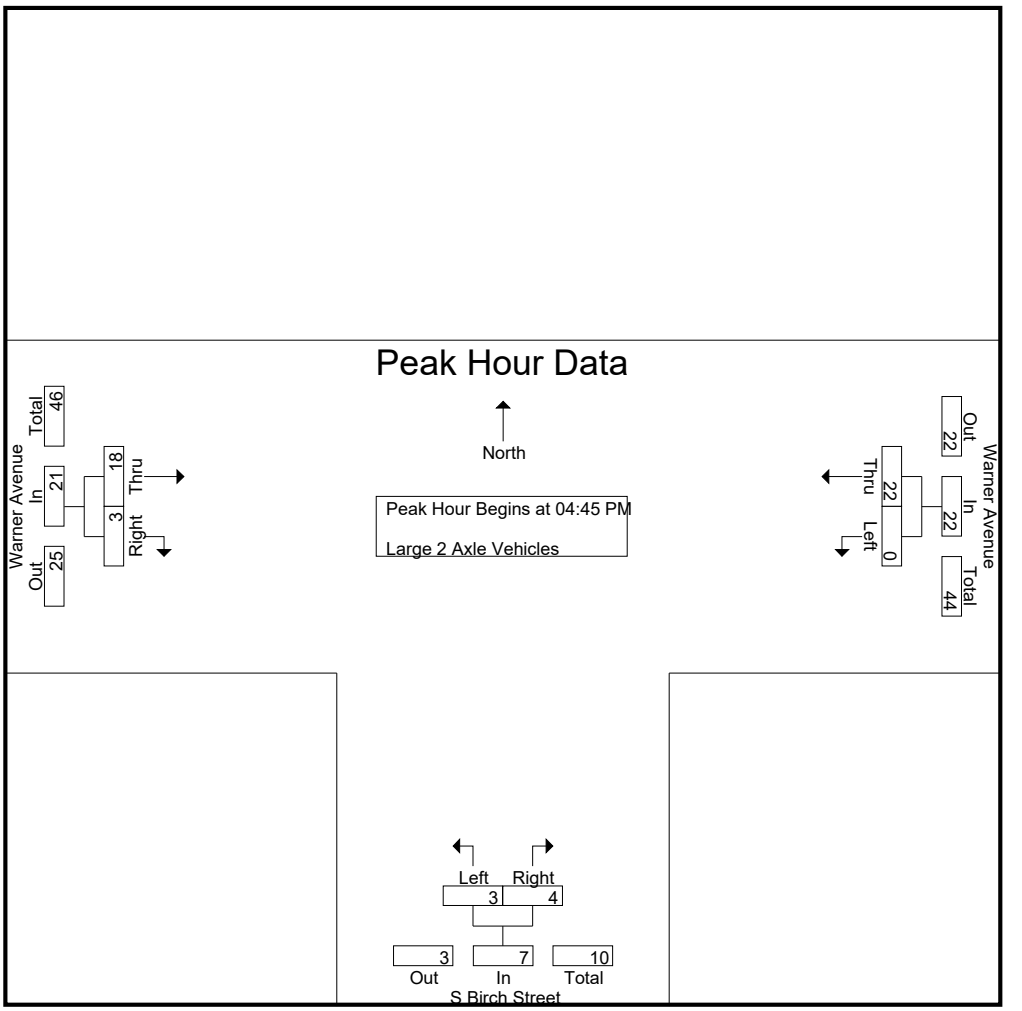

Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:45 PM			04:45 PM			04:45 PM		
+0 mins.	0	7	7	**2**	**2**	**4**	3	**1**	4
+15 mins.	0	1	1	0	1	1	**7**	1	**8**
+30 mins.	0	**12**	**12**	0	1	1	6	1	7
+45 mins.	0	2	2	1	0	1	2	0	2
Total Volume	0	22	22	3	4	7	18	3	21
% App. Total	0	100		42.9	57.1		85.7	14.3	
PHF	.000	.458	.458	.375	.500	.438	.643	.750	.656

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File Name : SNA_Birch_Warn PM
Site Code : 241066
Start Date : 12/4/2024
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Groups Printed- 3 Axle Vehicles

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
04:00 PM	0	1	1	0	0	0	0	0	0	1
04:15 PM	0	1	1	0	0	0	0	0	0	1
04:30 PM	0	0	0	0	0	0	1	0	1	1
04:45 PM	0	0	0	0	0	0	0	0	0	0
Total	0	2	2	0	0	0	1	0	1	3
05:00 PM	0	0	0	0	0	0	0	0	0	0
05:15 PM	0	0	0	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0	0	0
Grand Total	0	2	2	0	0	0	1	0	1	3
Apprch %	0	100		0	0		100	0		
Total %	0	66.7	66.7	0	0	0	33.3	0	33.3	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 04:45 PM										
04:45 PM	0	0	0	0	0	0	0	0	0	0
05:00 PM	0	0	0	0	0	0	0	0	0	0
05:15 PM	0	0	0	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0	0	0	0
Total Volume	0	0	0	0	0	0	0	0	0	0
% App. Total	0	0		0	0		0	0		
PHF	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000

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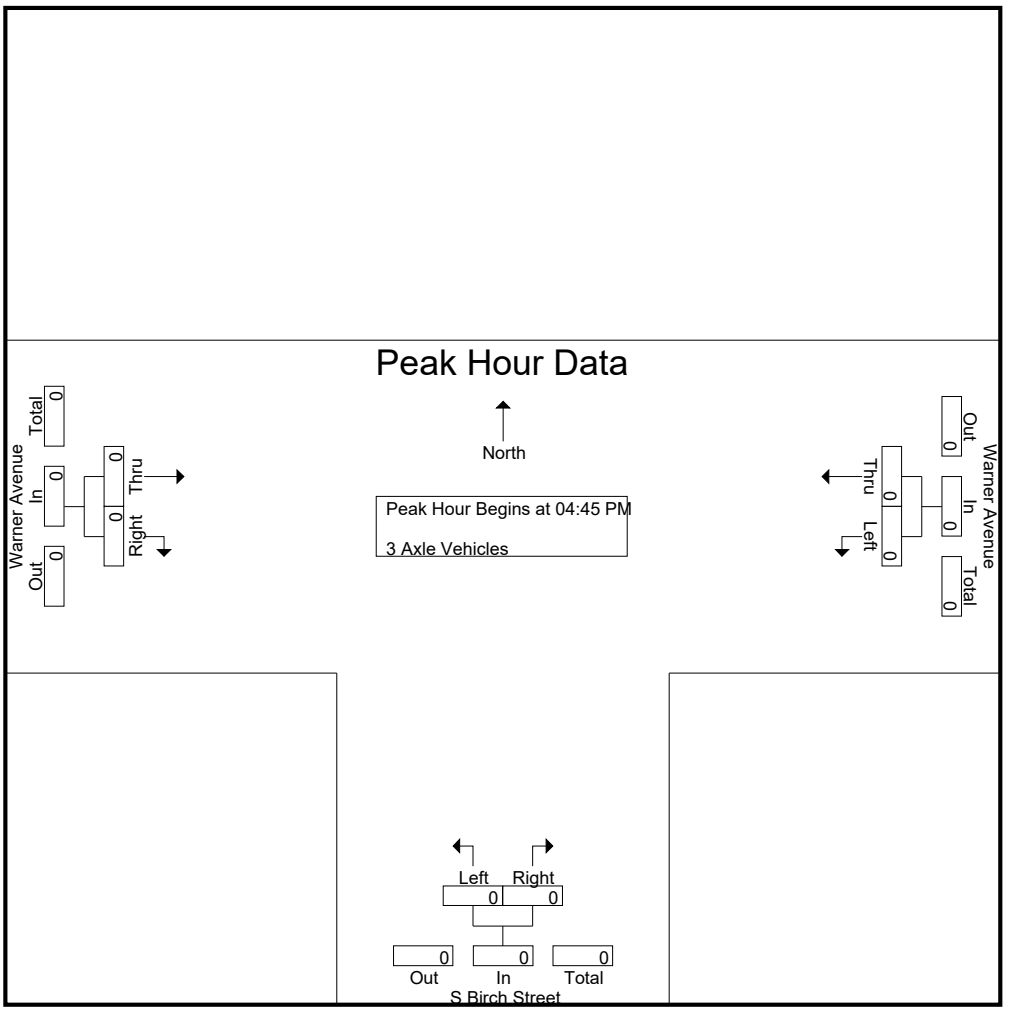

Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:45 PM			04:45 PM			04:45 PM		
+0 mins.	0	0	0	0	0	0	0	0	0
+15 mins.	0	0	0	0	0	0	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0
+45 mins.	0	0	0	0	0	0	0	0	0
Total Volume	0	0	0	0	0	0	0	0	0
% App. Total	0	0		0	0		0	0	
PHF	.000	.000	.000	.000	.000	.000	.000	.000	.000

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Page No : 1

Groups Printed- 4+ Axle Trucks

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
04:00 PM	0	0	0	0	0	0	1	0	1	1
04:15 PM	0	1	1	0	0	0	1	0	1	2
04:30 PM	0	1	1	0	0	0	0	0	0	1
04:45 PM	0	0	0	0	0	0	0	0	0	0
Total	0	2	2	0	0	0	2	0	2	4
05:00 PM	0	1	1	0	0	0	2	0	2	3
05:15 PM	0	0	0	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0	0	0	0
05:45 PM	0	0	0	0	0	0	0	0	0	0
Total	0	1	1	0	0	0	2	0	2	3
Grand Total	0	3	3	0	0	0	4	0	4	7
Apprch %	0	100		0	0		100	0		
Total %	0	42.9	42.9	0	0	0	57.1	0	57.1	

	Warner Avenue Westbound			S Birch Street Northbound			Warner Avenue Eastbound			
Start Time	Left	Thru	App. Total	Left	Right	App. Total	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 04:45 PM										
04:45 PM	0	0	0	0	0	0	0	0	0	0
05:00 PM	0	**1**	**1**	0	0	0	**2**	0	**2**	**3**
05:15 PM	0	0	0	0	0	0	0	0	0	0
05:30 PM	0	0	0	0	0	0	0	0	0	0
Total Volume	0	1	1	0	0	0	2	0	2	3
% App. Total	0	100		0	0		100	0		
PHF	.000	.250	.250	.000	.000	.000	.250	.000	.250	.250

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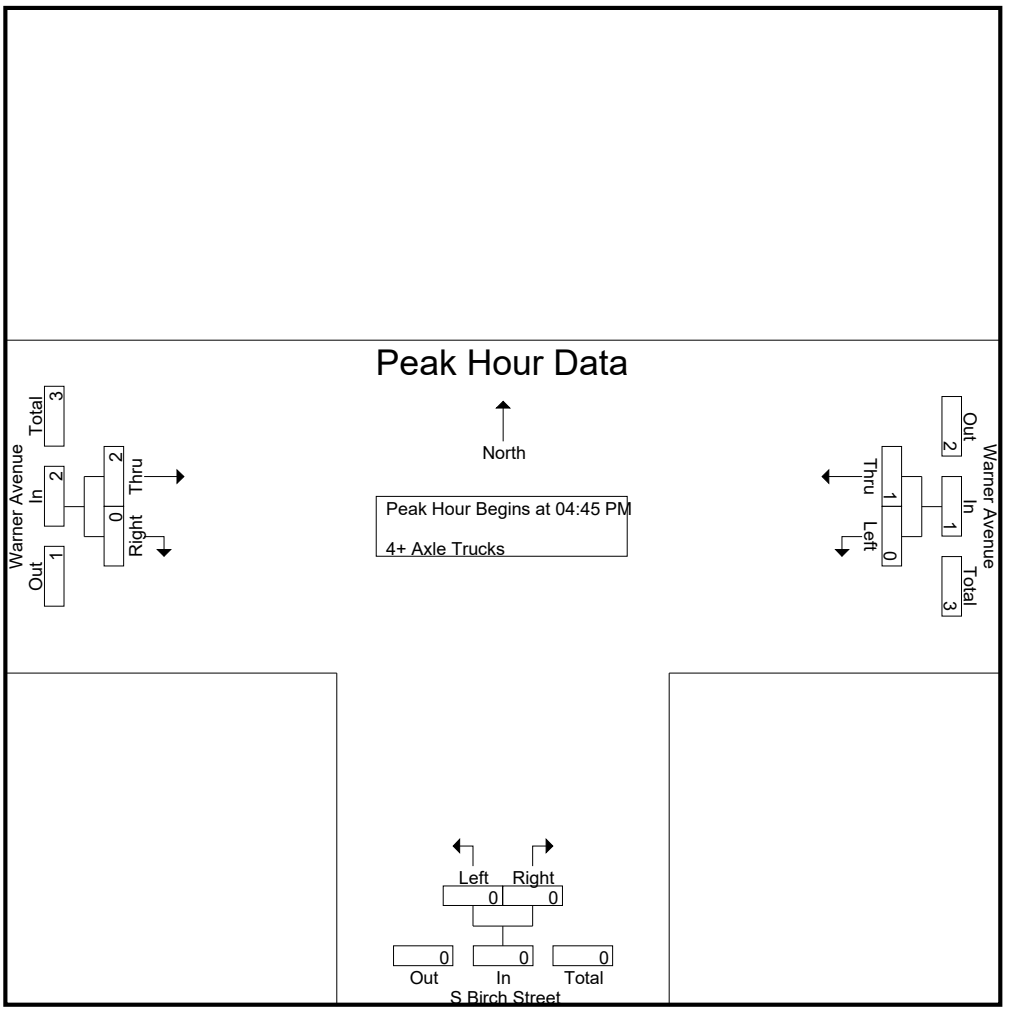

Peak Hour Analysis From 04:45 PM to 05:30 PM - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	04:45 PM			04:45 PM			04:45 PM		
+0 mins.	0	0	0	0	0	0	0	0	0
+15 mins.	0	**1**	**1**	0	0	0	**2**	0	**2**
+30 mins.	0	0	0	0	0	0	0	0	0
+45 mins.	0	0	0	0	0	0	0	0	0
Total Volume	0	1	1	0	0	0	2	0	2
% App. Total	0	100		0	0		100	0	
PHF	.000	.250	.250	.000	.000	.000	.250	.000	.250

Appendix D:
Volume Development Worksheets

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Appendix D- Existing and With Project Conditions Peak Hour Volume Summary

	AM Peak Hour				PM Peak Hour			
	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project
1 . Project Dwy 1/Warner Ave								
NBL	0	0	0	0	0	0	7	7
NBT	0	0	0	0	0	0	0	0
NBR	0	0	0	0	0	0	7	7
SBL	0	0	0	0	0	0	0	0
SBT	0	0	0	0	0	0	0	0
SBR	0	0	0	0	0	0	0	0
EBL	0	0	0	0	0	0	0	0
EBT	0	829	2	831	0	1,238	9	1247
EBR	0	0	2	2	0	0	9	9
WBL	0	0	1	1	0	0	5	5
WBT	0	1,214	1	1215	0	1,075	12	1087
WBR	0	0	0	0	0	0	0	0
North Leg								
Approach	0	0	0	0	0	0	0	0
Departure	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0
South Leg								
Approach	0	0	0	0	0	0	14	14
Departure	0	0	3	3	0	0	14	14
Total	0	0	3	3	0	0	28	28
East Leg								
Approach	0	1,214	2	1,216	0	1,075	17	1,092
Departure	0	829	2	831	0	1,238	16	1,254
Total	0	2,043	4	2,047	0	2,313	33	2,346
West Leg								
Approach	0	829	4	833	0	1,238	18	1,256
Departure	0	1,214	1	1,215	0	1,075	19	1,094
Total	0	2,043	5	2,048	0	2,313	37	2,350
Total Approaches								
Approach	0	2,043	6	2,049	0	2,313	49	2,362
Departure	0	2,043	6	2,049	0	2,313	49	2,362
Total	0	4,086	12	4,098	0	4,626	98	4,724

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Appendix D- Existing and With Project Conditions Peak Hour Volume Summary

	AM Peak Hour				PM Peak Hour			
	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project
2 Project Dwy 2/Warner Ave								
NBL	0	0	0	0	0	0	7	7
NBT	0	0	0	0	0	0	0	0
NBR	0	0	0	0	0	0	7	7
SBL	0	0	0	0	0	0	0	0
SBT	0	0	0	0	0	0	0	0
SBR	0	0	0	0	0	0	0	0
EBL	0	0	0	0	0	0	0	0
EBT	0	829	0	829	0	1,238	7	1245
EBR	0	0	2	2	0	0	9	9
WBL	0	0	1	1	0	0	5	5
WBT	0	1,214	1	1215	0	1,075	10	1085
WBR	0	0	0	0	0	0	0	0
North Leg								
Approach	0	0	0	0	0	0	0	0
Departure	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0
South Leg								
Approach	0	0	0	0	0	0	14	14
Departure	0	0	3	3	0	0	14	14
Total	0	0	3	3	0	0	28	28
East Leg								
Approach	0	1,214	2	1,216	0	1,075	15	1,090
Departure	0	829	0	829	0	1,238	14	1,252
Total	0	2,043	2	2,045	0	2,313	29	2,342
West Leg								
Approach	0	829	2	831	0	1,238	16	1,254
Departure	0	1,214	1	1,215	0	1,075	17	1,092
Total	0	2,043	3	2,046	0	2,313	33	2,346
Total Approaches								
Approach	0	2,043	4	2,047	0	2,313	45	2,358
Departure	0	2,043	4	2,047	0	2,313	45	2,358
Total	0	4,086	8	4,094	0	4,626	90	4,716

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Appendix D- Existing and With Project Conditions Peak Hour Volume Summary

	AM Peak Hour				PM Peak Hour			
	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project
3 Birch St/Warner Ave								
NBL	15	15	0	15	79	79	5	84
NBT	0	0	0	0	0	0	0	0
NBR	13	13	0	13	37	37	5	42
SBL	0	0	0	0	0	0	0	0
SBT	0	0	0	0	0	0	0	0
SBR	0	0	0	0	0	0	0	0
EBL	0	0	0	0	0	0	0	0
EBT	1,199	1,199	1	1200	996	996	10	1006
EBR	41	41	0	41	30	30	5	35
WBL	19	19	1	20	15	15	5	20
WBT	810	810	2	812	1,223	1,223	9	1232
WBR	0	0	0	0	0	0	0	0
North Leg								
Approach	0	0	0	0	0	0	0	0
Departure	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0
South Leg								
Approach	28	28	0	28	116	116	10	126
Departure	60	60	1	61	45	45	10	55
Total	88	88	1	89	161	161	20	181
East Leg								
Approach	829	829	3	832	1,238	1,238	14	1,252
Departure	1,212	1,212	1	1,213	1,033	1,033	15	1,048
Total	2,041	2,041	4	2,045	2,271	2,271	29	2,300
West Leg								
Approach	1,240	1,240	1	1,241	1,026	1,026	15	1,041
Departure	825	825	2	827	1,302	1,302	14	1,316
Total	2,065	2,065	3	2,068	2,328	2,328	29	2,357
Total Approaches								
Approach	2,097	2,097	4	2,101	2,380	2,380	39	2,419
Departure	2,097	2,097	4	2,101	2,380	2,380	39	2,419
Total	4,194	4,194	8	4,202	4,760	4,760	78	4,838

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Appendix D- Existing and With Project Conditions Peak Hour Volume Summary

	AM Peak Hour				PM Peak Hour			
	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project	Exist Traffic Counts	Exist Volumes	Project Trips	Exist Plus Project
4 Project Dwy 3/Birch St								
NBL	0	0	2	2	0	0	14	14
NBT	0	28	0	28	0	116	0	116
NBR	0	0	0	0	0	0	0	0
SBL	0	0	0	0	0	0	0	0
SBT	0	60	0	60	0	45	5	50
SBR	0	0	2	2	0	0	14	14
EBL	0	0	1	1	0	0	10	10
EBT	0	0	0	0	0	0	0	0
EBR	0	0	1	1	0	0	10	10
WBL	0	0	0	0	0	0	0	0
WBT	0	0	0	0	0	0	0	0
WBR	0	0	0	0	0	0	0	0
North Leg								
Approach	0	60	2	62	0	45	19	64
Departure	0	28	1	29	0	116	10	126
Total	0	88	3	91	0	161	29	190
South Leg								
Approach	0	28	2	30	0	116	14	130
Departure	0	60	1	61	0	45	15	60
Total	0	88	3	91	0	161	29	190
East Leg								
Approach	0	0	0	0	0	0	0	0
Departure	0	0	0	0	0	0	0	0
Total	0	0	0	0	0	0	0	0
West Leg								
Approach	0	0	2	2	0	0	20	20
Departure	0	0	4	4	0	0	28	28
Total	0	0	6	6	0	0	48	48
Total Approaches								
Approach	0	88	6	94	0	161	53	214
Departure	0	88	6	94	0	161	53	214
Total	0	176	12	188	0	322	106	428

Appendix E:
Levels of Service Worksheets

Intersection	
Int Delay, s/veh	0

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	829	0	0	1214	0	0
Future Vol, veh/h	829	0	0	1214	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	0	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	901	0	0	1320	0	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	901	0	1561	451
Stage 1	-	-	-	-	901	-
Stage 2	-	-	-	-	660	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	750	-	103	556
Stage 1	-	-	-	-	357	-
Stage 2	-	-	-	-	476	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	750	-	103	556
Mov Cap-2 Maneuver	-	-	-	-	232	-
Stage 1	-	-	-	-	357	-
Stage 2	-	-	-	-	476	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	750	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s/veh)	0	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection	
Int Delay, s/veh	0

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	829	0	0	1214	0	0
Future Vol, veh/h	829	0	0	1214	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	901	0	0	1320	0	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	901	0	1561	451
Stage 1	-	-	-	-	901	-
Stage 2	-	-	-	-	660	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	750	-	103	556
Stage 1	-	-	-	-	357	-
Stage 2	-	-	-	-	476	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	750	-	103	556
Mov Cap-2 Maneuver	-	-	-	-	286	-
Stage 1	-	-	-	-	357	-
Stage 2	-	-	-	-	476	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	750	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s/veh)	0	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection	
Int Delay, s/veh	0.5

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1199	41	19	810	15	13
Future Vol, veh/h	1199	41	19	810	15	13
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	83	83	83	83	83	83
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1445	49	23	976	18	16

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1494	0	2003	747
Stage 1	-	-	-	-	1469	-
Stage 2	-	-	-	-	534	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	445	-	52	355
Stage 1	-	-	-	-	178	-
Stage 2	-	-	-	-	552	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	445	-	49	355
Mov Cap-2 Maneuver	-	-	-	-	162	-
Stage 1	-	-	-	-	178	-
Stage 2	-	-	-	-	524	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.31	24.64
HCM LOS			C

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	217	-	-	445	-
HCM Lane V/C Ratio	0.156	-	-	0.051	-
HCM Control Delay (s/veh)	24.6	-	-	13.5	-
HCM Lane LOS	C	-	-	B	-
HCM 95th %tile Q(veh)	0.5	-	-	0.2	-

Intersection	
Int Delay, s/veh	0

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	0	0	0	28	60	0
Future Vol, veh/h	0	0	0	28	60	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	0	0	30	65	0

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	96	65	65	0	-	0
Stage 1	65	-	-	-	-	-
Stage 2	30	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	904	999	1537	-	-	-
Stage 1	957	-	-	-	-	-
Stage 2	992	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	904	999	1537	-	-	-
Mov Cap-2 Maneuver	904	-	-	-	-	-
Stage 1	957	-	-	-	-	-
Stage 2	992	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	0	0	0
HCM LOS	A		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1537	-	-	-	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s/veh)	0	-	0	-	-
HCM Lane LOS	A	-	A	-	-
HCM 95th %tile Q(veh)	0	-	-	-	-

Intersection	
Int Delay, s/veh	0

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1238	0	0	1075	0	0
Future Vol, veh/h	1238	0	0	1075	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	0	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1346	0	0	1168	0	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1346	0	1930	673
Stage 1	-	-	-	-	1346	-
Stage 2	-	-	-	-	584	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	508	-	58	398
Stage 1	-	-	-	-	207	-
Stage 2	-	-	-	-	520	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	508	-	58	398
Mov Cap-2 Maneuver	-	-	-	-	156	-
Stage 1	-	-	-	-	207	-
Stage 2	-	-	-	-	520	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	508	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s/veh)	0	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection	
Int Delay, s/veh	0

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1238	0	0	1075	0	0
Future Vol, veh/h	1238	0	0	1075	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1346	0	0	1168	0	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1346	0	1930	673
Stage 1	-	-	-	-	1346	-
Stage 2	-	-	-	-	584	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	508	-	58	398
Stage 1	-	-	-	-	207	-
Stage 2	-	-	-	-	520	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	508	-	58	398
Mov Cap-2 Maneuver	-	-	-	-	186	-
Stage 1	-	-	-	-	207	-
Stage 2	-	-	-	-	520	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	508	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s/veh)	0	-	-	0	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection	
Int Delay, s/veh	1.3

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	996	30	15	1223	79	37
Future Vol, veh/h	996	30	15	1223	79	37
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	97	97	97	97	97	97
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1027	31	15	1261	81	38

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1058	0	1704	529
Stage 1	-	-	-	-	1042	-
Stage 2	-	-	-	-	661	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	654	-	83	494
Stage 1	-	-	-	-	301	-
Stage 2	-	-	-	-	475	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	654	-	~ 81	494
Mov Cap-2 Maneuver	-	-	-	-	249	-
Stage 1	-	-	-	-	301	-
Stage 2	-	-	-	-	464	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.13	25.17
HCM LOS			D

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	296	-	-	654	-
HCM Lane V/C Ratio	0.404	-	-	0.024	-
HCM Control Delay (s/veh)	25.2	-	-	10.6	-
HCM Lane LOS	D	-	-	B	-
HCM 95th %tile Q(veh)	1.9	-	-	0.1	-

Notes			
~: Volume exceeds capacity	$: Delay exceeds 300s	+: Computation Not Defined	*: All major volume in platoon

Intersection	
Int Delay, s/veh	0

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	0	0	0	116	45	0
Future Vol, veh/h	0	0	0	116	45	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	0	0	0	126	49	0

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	175	49	49	0	-	0
Stage 1	49	-	-	-	-	-
Stage 2	126	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	815	1020	1558	-	-	-
Stage 1	974	-	-	-	-	-
Stage 2	900	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	815	1020	1558	-	-	-
Mov Cap-2 Maneuver	815	-	-	-	-	-
Stage 1	974	-	-	-	-	-
Stage 2	900	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	0	0	0
HCM LOS	A		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1558	-	-	-	-
HCM Lane V/C Ratio	-	-	-	-	-
HCM Control Delay (s/veh)	0	-	0	-	-
HCM Lane LOS	A	-	A	-	-
HCM 95th %tile Q(veh)	0	-	-	-	-

Intersection	
Int Delay, s/veh	0

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	831	2	1	1215	0	0
Future Vol, veh/h	831	2	1	1215	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	0	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	903	2	1	1321	0	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	905	0	1567	453
Stage 1	-	-	-	-	904	-
Stage 2	-	-	-	-	663	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	747	-	102	554
Stage 1	-	-	-	-	355	-
Stage 2	-	-	-	-	474	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	747	-	102	554
Mov Cap-2 Maneuver	-	-	-	-	230	-
Stage 1	-	-	-	-	355	-
Stage 2	-	-	-	-	474	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.01	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	747	-
HCM Lane V/C Ratio	-	-	-	0.001	-
HCM Control Delay (s/veh)	0	-	-	9.8	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection	
Int Delay, s/veh	0

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	829	2	1	1215	0	0
Future Vol, veh/h	829	2	1	1215	0	0
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	901	2	1	1321	0	0

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	903	0	1565	452
Stage 1	-	-	-	-	902	-
Stage 2	-	-	-	-	663	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	748	-	102	555
Stage 1	-	-	-	-	356	-
Stage 2	-	-	-	-	474	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	748	-	102	555
Mov Cap-2 Maneuver	-	-	-	-	286	-
Stage 1	-	-	-	-	356	-
Stage 2	-	-	-	-	474	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.01	0
HCM LOS			A

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	-	-	-	748	-
HCM Lane V/C Ratio	-	-	-	0.001	-
HCM Control Delay (s/veh)	0	-	-	9.8	-
HCM Lane LOS	A	-	-	A	-
HCM 95th %tile Q(veh)	-	-	-	0	-

Intersection	
Int Delay, s/veh	0.4

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1200	41	20	812	15	13
Future Vol, veh/h	1200	41	20	812	15	13
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	97	97	97	97	97	97
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1237	42	21	837	15	13

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1279	0	1718	640
Stage 1	-	-	-	-	1258	-
Stage 2	-	-	-	-	460	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	538	-	81	418
Stage 1	-	-	-	-	231	-
Stage 2	-	-	-	-	602	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	538	-	78	418
Mov Cap-2 Maneuver	-	-	-	-	209	-
Stage 1	-	-	-	-	231	-
Stage 2	-	-	-	-	579	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.29	19.76
HCM LOS			C

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	273	-	-	538	-
HCM Lane V/C Ratio	0.106	-	-	0.038	-
HCM Control Delay (s/veh)	19.8	-	-	12	-
HCM Lane LOS	C	-	-	B	-
HCM 95th %tile Q(veh)	0.4	-	-	0.1	-

Intersection	
Int Delay, s/veh	0.3

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	1	1	2	28	60	2
Future Vol, veh/h	1	1	2	28	60	2
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1	1	2	30	65	2

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	101	66	67	0	-	0
Stage 1	66	-	-	-	-	-
Stage 2	35	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	897	997	1534	-	-	-
Stage 1	956	-	-	-	-	-
Stage 2	988	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	896	997	1534	-	-	-
Mov Cap-2 Maneuver	896	-	-	-	-	-
Stage 1	955	-	-	-	-	-
Stage 2	988	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	8.82	0.49	0
HCM LOS	A		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1534	-	944	-	-
HCM Lane V/C Ratio	0.001	-	0.002	-	-
HCM Control Delay (s/veh)	7.4	-	8.8	-	-
HCM Lane LOS	A	-	A	-	-
HCM 95th %tile Q(veh)	0	-	0	-	-

Intersection	
Int Delay, s/veh	0.2

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1247	9	5	1087	7	7
Future Vol, veh/h	1247	9	5	1087	7	7
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	0	0	-	0	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1355	10	5	1182	8	8

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1365	0	1962	683
Stage 1	-	-	-	-	1360	-
Stage 2	-	-	-	-	602	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	499	-	55	392
Stage 1	-	-	-	-	204	-
Stage 2	-	-	-	-	510	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	499	-	55	392
Mov Cap-2 Maneuver	-	-	-	-	152	-
Stage 1	-	-	-	-	204	-
Stage 2	-	-	-	-	504	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.06	22.66
HCM LOS			C

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	219	-	-	499	-
HCM Lane V/C Ratio	0.069	-	-	0.011	-
HCM Control Delay (s/veh)	22.7	-	-	12.3	-
HCM Lane LOS	C	-	-	B	-
HCM 95th %tile Q(veh)	0.2	-	-	0	-

Intersection	
Int Delay, s/veh	0.1

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1245	9	5	1085	7	7
Future Vol, veh/h	1245	9	5	1085	7	7
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1353	10	5	1179	8	8

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1363	0	1959	682
Stage 1	-	-	-	-	1358	-
Stage 2	-	-	-	-	601	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	500	-	56	393
Stage 1	-	-	-	-	204	-
Stage 2	-	-	-	-	510	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	500	-	55	393
Mov Cap-2 Maneuver	-	-	-	-	183	-
Stage 1	-	-	-	-	204	-
Stage 2	-	-	-	-	505	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.06	20.36
HCM LOS			C

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	250	-	-	500	-
HCM Lane V/C Ratio	0.061	-	-	0.011	-
HCM Control Delay (s/veh)	20.4	-	-	12.3	-
HCM Lane LOS	C	-	-	B	-
HCM 95th %tile Q(veh)	0.2	-	-	0	-

Intersection	
Int Delay, s/veh	1.5

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Traffic Vol, veh/h	1006	35	20	1232	84	42
Future Vol, veh/h	1006	35	20	1232	84	42
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Free	Free	Free	Free	Stop	Stop
RT Channelized	-	None	-	None	-	None
Storage Length	-	-	0	-	0	-
Veh in Median Storage, #	0	-	-	0	2	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	97	97	97	97	97	97
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	1037	36	21	1270	87	43

Major/Minor	Major1		Major2		Minor1	
Conflicting Flow All	0	0	1073	0	1731	537
Stage 1	-	-	-	-	1055	-
Stage 2	-	-	-	-	676	-
Critical Hdwy	-	-	4.14	-	6.84	6.94
Critical Hdwy Stg 1	-	-	-	-	5.84	-
Critical Hdwy Stg 2	-	-	-	-	5.84	-
Follow-up Hdwy	-	-	2.22	-	3.52	3.32
Pot Cap-1 Maneuver	-	-	645	-	~ 79	489
Stage 1	-	-	-	-	296	-
Stage 2	-	-	-	-	467	-
Platoon blocked, %	-	-		-		
Mov Cap-1 Maneuver	-	-	645	-	~ 77	489
Mov Cap-2 Maneuver	-	-	-	-	244	-
Stage 1	-	-	-	-	296	-
Stage 2	-	-	-	-	452	-

Approach	EB	WB	NB
HCM Control Delay, s/v	0	0.17	26.74
HCM LOS			D

Minor Lane/Major Mvmt	NBLn1	EBT	EBR	WBL	WBT
Capacity (veh/h)	293	-	-	645	-
HCM Lane V/C Ratio	0.444	-	-	0.032	-
HCM Control Delay (s/veh)	26.7	-	-	10.8	-
HCM Lane LOS	D	-	-	B	-
HCM 95th %tile Q(veh)	2.2	-	-	0.1	-

Notes			
~: Volume exceeds capacity	$: Delay exceeds 300s	+: Computation Not Defined	*: All major volume in platoon

Intersection	
Int Delay, s/veh	1.3

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Traffic Vol, veh/h	10	10	14	116	50	14
Future Vol, veh/h	10	10	14	116	50	14
Conflicting Peds, #/hr	0	0	0	0	0	0
Sign Control	Stop	Stop	Free	Free	Free	Free
RT Channelized	-	None	-	None	-	None
Storage Length	0	-	-	-	-	-
Veh in Median Storage, #	0	-	-	0	0	-
Grade, %	0	-	-	0	0	-
Peak Hour Factor	92	92	92	92	92	92
Heavy Vehicles, %	2	2	2	2	2	2
Mvmt Flow	11	11	15	126	54	15

Major/Minor	Minor2		Major1		Major2	
Conflicting Flow All	218	62	70	0	-	0
Stage 1	62	-	-	-	-	-
Stage 2	157	-	-	-	-	-
Critical Hdwy	6.42	6.22	4.12	-	-	-
Critical Hdwy Stg 1	5.42	-	-	-	-	-
Critical Hdwy Stg 2	5.42	-	-	-	-	-
Follow-up Hdwy	3.518	3.318	2.218	-	-	-
Pot Cap-1 Maneuver	770	1003	1531	-	-	-
Stage 1	961	-	-	-	-	-
Stage 2	872	-	-	-	-	-
Platoon blocked, %				-	-	-
Mov Cap-1 Maneuver	761	1003	1531	-	-	-
Mov Cap-2 Maneuver	761	-	-	-	-	-
Stage 1	950	-	-	-	-	-
Stage 2	872	-	-	-	-	-

Approach	EB	NB	SB
HCM Control Delay, s/v	9.27	0.79	0
HCM LOS	A		

Minor Lane/Major Mvmt	NBL	NBT	EBLn1	SBT	SBR
Capacity (veh/h)	1531	-	866	-	-
HCM Lane V/C Ratio	0.01	-	0.025	-	-
HCM Control Delay (s/veh)	7.4	-	9.3	-	-
HCM Lane LOS	A	-	A	-	-
HCM 95th %tile Q(veh)	0	-	0.1	-	-

Attachment C: AQ & GHG Assessment

TECHNICAL MEMORANDUM

DATE: April 4, 2025
TO: Andres Cuenca, Stake Sports, LLC
FROM: Haseeb Qureshi and Alyssa Barnett, Urban Crossroads, Inc.
JOB NO: 16467-02 AQ & GHG

SUBJECT: WARNER AVENUE FOOTLAB AIR QUALITY AND GREENHOUSE GAS ASSESSMENT

Urban Crossroads, Inc. has completed the following air quality and greenhouse gas assessment for the Warner Avenue Footlab (Project), which is located at 400 West Warner Avenue, on the southwest corner of West Warner Avenue and S Birch Street in the City of Santa Ana.

PROJECT OVERVIEW

It is our understanding that the Project includes the reuse of an existing 57,705 square-foot (SF) industrial building on a 4.99-acre lot as a soccer training facility.

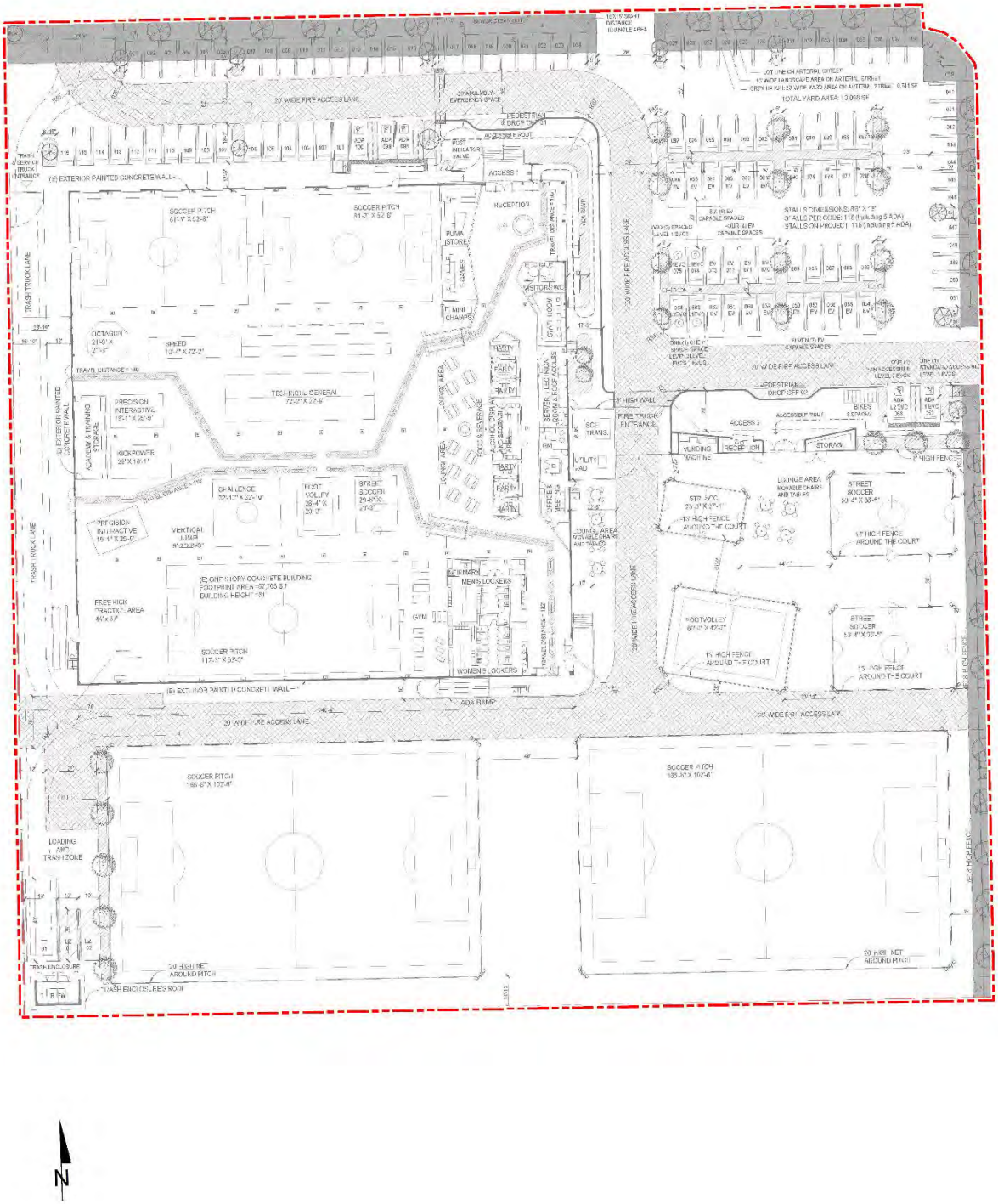
SUMMARY OF FINDINGS

Results of the assessment indicate that the Project at either site would result in a less than significant impact with respect to air quality and greenhouse gases (GHGs).

METHODOLOGY

The California Air Pollution Control Officers Association (CAPCOA) in conjunction with other California air districts, including South Coast Air Quality Management District (SCAQMD), released the California Emission Estimator Model (CalEEMod) 2022 in May 2022. CalEEMod periodically releases updates, as such the latest version available at the time of this report has been utilized in this analysis. The purpose of this model is to calculate construction-source and operational-source criteria pollutant (volatile organic compounds (VOCs), nitrogen oxides (NO_X), sulfur oxides (SO_X), carbon monoxide (CO), particulate matter 10 microns or less (PM_{10}), and particulate matter 2.5 microns or less ($PM_{2.5}$)) and GHG emissions from direct and indirect sources; and quantify applicable air quality and GHG reductions achieved from mitigation measures (12). Accordingly, the latest version of CalEEMod has been used for this Project to determine construction and operational air quality and GHG emissions.

EXHIBIT 1: SITE PLAN



PROJECT AIR QUALITY IMPACTS

AIR QUALITY REGIONAL EMISSIONS THRESHOLDS

The SCAQMD has developed regional significance thresholds for criteria pollutants, as summarized at Table 1 (14). The SCAQMD's California Environmental Quality Act (CEQA) Air Quality Significance Thresholds (March 2023) indicate that any projects in the South Coast Air Basin (SCAB) with daily emissions that exceed any of the indicated thresholds should be considered as having an individually and cumulatively significant air quality impact.

TABLE 1: REGIONAL EMISSIONS SIGNIFICANCE THRESHOLDS

Pollutant	Construction	Operations
NO_X	100 lbs/day	55 lbs/day
VOC	75 lbs/day	55 lbs/day
PM_{10}	150 lbs/day	150 lbs/day
$PM_{2.5}$	55 lbs/day	55 lbs/day
SO_X	150 lbs/day	150 lbs/day
CO	550 lbs/day	550 lbs/day
Pb	3 lbs/day	3 lbs/day

lbs/day = Pounds Per Day
ppm = Parts Per Million
µg/m3 = Micrograms Per Cubic Meter

CONSTRUCTION ACTIVITIES

Construction activities associated with the Project would result in emissions of VOCs, NO_X, SO_X, CO, PM_{10}, and $PM_{2.5}$. Construction related emissions are expected from the following construction activities:

- Demolition
- Site Preparation
- Grading
- Building Construction
- Paving
- Architectural Coating

DEMOLITION ACTIVITIES

Miscellaneous site demolition for the Project will include (i) future landscape, (ii) a small building, (iii) miscellaneous parking lot lights, and (iv) interior office space. The existing building and parking lot will remain intact. As a conservative estimate, this analysis assumes to up to 620 tons of debris[1] will be generated from demolition activities.

GRADING ACTIVITIES

Dust is typically a major concern during grading activities. Because such emissions are not amenable to collection and discharge through a controlled source, they are called "fugitive emissions." Fugitive dust emissions rates vary as a function of many parameters (soil silt, soil moisture, wind speed, area disturbed, number of vehicles, depth of disturbance or excavation, etc.). CalEEMod was utilized to calculate fugitive dust emissions resulting from this phase of activity. This analysis assumes that earthwork activities are expected to balance on site and no import or export of soils would be required.

CONSTRUCTION DURATION

For purposes of analysis, construction of Project is expected to commence in September 2025 and would last through February 2026. The construction schedule utilized in the analysis represents a "worst-case" analysis scenario should construction occur any time after the respective dates since emission factors for construction decrease as time passes and the analysis year increases due to emission regulations becoming more stringent[2]. The duration of construction activity and associated equipment represents a reasonable approximation of the expected construction fleet as required per *CEQA Guidelines* (16).

TABLE 2: CONSTRUCTION DURATION

Construction Activity	Start Date	End Date	Days
Demolition	9/1/2025	9/29/2025	20
Site Preparation	9/30/2025	10/14/2025	10
Site & Tenant Improvements	10/15/2025	2/3/2026	80
Landscape Median, Misc. Hardscape, & Access Ramp	1/7/2026	2/3/2026	20
Architectural Coating	1/7/2026	2/3/2026	20

[1] This amount is a conservative estimate that accounts for future landscape, a small exterior building, miscellaneous parking lot lights, and interior office space. Demolition quantities for the project were calculated consistent with CalEEMod's calculation procedures, with tonnage determined by converting building square footage and asphalt/concrete area based on the tonnage-to-floor space ratio from a 1976 analysis by Murphy and Chatterjee.

[2] As shown in the CalEEMod User's Guide Version 2022, Appendix G "Table G-11. Statewide Average Annual Offroad Equipment Emission Factors" as the analysis year increases, emission factors for the same equipment pieces decrease due to the natural turnover of older equipment being replaced by newer less polluting equipment and new regulatory requirements.

CONSTRUCTION EQUIPMENT

Equipment used for construction of the Project is shown in Table 3.

TABLE 3: CONSTRUCTION EQUIPMENT

Construction Activity	Equipment	Quantity	Hours
Demolition	Concrete/Industrial Saws	1	8
	Excavators	3	8
	Rubber Tired Dozers	2	8
Site Preparation	Rubber Tired Dozers	3	8
	Crawler Tractors	4	8
Site & Tenant Improvements	Cranes	1	8
	Forklifts	3	8
	Generator Sets	1	8
	Tractors/Loaders/Backhoes	3	8
	Welders	1	8
Landscape Median, Misc. Hardscape, & Access Ramp	Pavers	1	8
	Paving Equipment	2	8
	Rollers	2	8
	Tractors/Loaders/Backhoes	1	8
	Cement and Mortar Mixers	2	8
Architectural Coating	Air Compressors	1	8

REGIONAL CONSTRUCTION EMISSIONS

The estimated maximum daily construction emissions without mitigation are summarized in Table 4. Under the assumed scenario, emissions resulting from the Project construction would not exceed thresholds established by the SCAQMD for emissions of any criteria pollutant. Project construction-source emissions impacts would therefore be less-than-significant. Detailed construction model outputs are presented in Appendix 1.

TABLE 4: CONSTRUCTION EMISSIONS SUMMARY

Year	Emissions (lbs/day)					
	VOC	NO_X	CO	SO_2	PM_{10}	$PM_{2.5}$
Summer						
2025	4.11	37.60	33.40	0.05	7.83	4.52
Winter						
2025	4.11	37.60	33.30	0.05	7.83	4.52
2026	5.74	19.40	26.90	0.04	1.02	0.75
Maximum Daily Emissions	5.74	37.60	33.40	0.05	7.83	4.52
SCAQMD Regional Thresholds	75	100	550	150	150	55
Threshold Exceeded?	NO	NO	NO	NO	NO	NO

Regional Operational Emissions

Operational emissions associated with the Project are summarized in Table 5. Project operational-source emissions would not exceed the numerical thresholds of significance established by the SCAQMD for any criteria pollutant, a less than significant impact would occur for Project-related operational-source emissions and no mitigation is required.

Table 5: Peak Operational Emissions Summary

Source	Emissions (lbs/day)					
	VOC	NO_X	CO	SO_2	PM_{10}	$PM_{2.5}$
Summer						
Mobile	11.50	8.44	97.20	0.25	24.00	6.20
Area	1.83	0.02	2.53	<0.005	<0.005	<0.005
Energy	0.04	0.67	0.56	<0.005	0.05	0.05
Maximum Daily Emissions	13.37	9.13	100.29	0.25	24.05	6.25
SCAQMD Regional Thresholds	55	55	550	150	150	55
Threshold Exceeded?	NO	NO	NO	NO	NO	NO
Winter						
Mobile	11.40	9.17	90.40	0.24	24.00	6.20
Area	1.42	0.00	0.00	0.00	0.00	0.00
Energy	0.04	0.67	0.56	0.00	0.05	0.05
Maximum Daily Emissions	12.86	9.84	90.96	0.24	24.05	6.25
SCAQMD Regional Thresholds	55	55	550	150	150	55
Threshold Exceeded?	NO	NO	NO	NO	NO	NO

Air Quality Localized Emissions Thresholds

For this Project, the appropriate source receptor area (SRA) for the localized significance thresholds (LST) analysis is the SCAQMD Central Orange County monitoring station (SRA 17). LSTs apply to CO, NO_2, PM_{10}, and $PM_{2.5}$. The SCAQMD produced look-up tables for projects less than or equal to 5 acres in size. The SCAQMD's screening look-up tables are utilized in determining localized impacts. It should be noted that since the look-up tables identify thresholds at only 1 acre, 2 acres, and 5 acres, linear regression has been utilized to determine localized significance thresholds. Consistent with SCAQMD guidance, the thresholds presented in Table 6 were calculated by interpolating the threshold values for the Project's disturbed acreage.

The acres disturbed is based on the equipment list and days in the demolition, site preparation, mass grading, and fine grading phase according to the anticipated maximum number of acres a given piece of equipment can pass over in an 8-hour workday. The equipment-specific grading rates are summarized in the CalEEMod user's guide, Appendix A: Calculation Details for CalEEMod (15). It should be noted that the disturbed area per day is representative of a piece of equipment making multiple passes over the same land area. In other words, one Rubber Tired Dozer can make multiple passes over the same land area totaling 0.5 acres in a given 8-hour day. Appendix A of the CalEEMod User Manual only identifies equipment-specific grading rates for Crawler Tractors, Graders, Rubber

Tired Dozers, and Scrapers; therefore, Tractors/Loaders/Backhoes equipment that was included in the site preparation and grading phase was replaced with Crawler Tractors. For analytical purposes, emissions associated with peak demolition, site preparation, and grading activities are considered for purposes of LSTs since this phase represents the maximum localized emissions that would occur. The Project's construction activities could disturb a maximum of approximately 1 acre per day for demolition, 3.5 acres per day for site preparation, and 2.5 acres per day for grading activities. Any other construction phases of development would result in lesser emissions and consequently lesser impacts than what is disclosed herein. As such, Table 6 presents thresholds for localized construction and operational emissions.

TABLE 6: MAXIMUM DAILY LOCALIZED CONSTRUCTION EMISSIONS THRESHOLDS

Activity	Emissions (lbs/day)			
	NO_X	CO	PM_{10}	$PM_{2.5}$
Demolition	81	485	10	4
Site Preparation	149	984	25	7

LOCALIZED CONSTRUCTION EMISSIONS

The analysis makes use of methodology included in the SCAQMD *Final Localized Significance Threshold Methodology* (LST Methodology) (18). The SCAQMD has established that impacts to air quality are significant if there is a potential to contribute or cause localized exceedances of the federal and/or state ambient air quality standards (National Ambient Air Quality Standards (NAAQS)/California Ambient Air Quality Standards (CAAQS). Collectively, these are referred to as LSTs. The SCAQMD established LSTs in response to the SCAQMD Governing Board's Environmental Justice Initiative I-4[3]. LSTs represent the maximum emissions from a project that will not cause or contribute to an exceedance of the most stringent applicable federal or state ambient air quality standard at the sensitive receptor. The SCAQMD states that lead agencies can use the LSTs as another indicator of significance in its air quality impact analyses. It should be noted that SCAQMD also states that Projects that are statutorily or categorically exempt under CEQA would not be subject to LST analyses.

Receptors in the Project study area are described below and shown in Exhibit 2. Localized air quality impacts were evaluated at sensitive receptor land uses nearest the Project site. All distances are measured from the Project site boundary to the outdoor living areas (e.g., backyards) or at the building façade, whichever is closer to the Project site.

- Location R1 represents the existing residence at 2246 South Van Ness Avenue, approximately 149 feet northwest of the Project site.
- Location R2 represents the existing residence at 2335 South Van Ness Avenue, approximately 223 feet north of the Project site.

[3] The purpose of SCAQMD's Environmental Justice program is to ensure that everyone has the right to equal protection from air pollution and fair access to the decision-making process that works to improve the quality of air within their communities. Further, the SCAQMD defines Environmental Justice as "…equitable environmental policymaking and enforcement to protect the health of all residents, regardless of age, culture, ethnicity, gender, race, socioeconomic status, or geographic location, from the health effects of air pollution."

- Location R3 represents a commercial building located at 417 West Warner Avenue, approximately 102 feet north of the Project site.
- Location R4 represents the Esqueda Elementary School located at 2240 South Main Street, approximately 239 feet northeast of the Project site.
- Location R5 represents the Las Gueritas Mexican restaurant located at 230 West Warner Avenue, approximately 89 feet east of the Project site.
- Location R6 represents the Tibbetts Paint store located at 2337 South Birch Street, approximately 78 feet east of the Project site.
- Location R7 represents Syco Enterprise, Inc. shopping service warehouse located at 500 West Warner Avenue, approximately 63 feet west of the Project site.

The SCAQMD recommends that the nearest sensitive receptor be considered when determining the Project's potential to cause an individual or cumulatively significant impact. The nearest land use where an individual could remain for 24 hours to the Project site has been used to determine localized construction and operational air quality impacts for emissions of PM_{10} and $PM_{2.5}$ (since PM_{10} and $PM_{2.5}$ thresholds are based on a 24-hour averaging time). The nearest residential home is represented by R1, located at 2246 South Can Ness, approximately 149 feet (45 meters) northwest of the Project site. As such, for evaluation of localized PM_{10} and $PM_{2.5}$, a 45-meter distance will be used.

As previously stated, and consistent with LST Methodology, the nearest industrial/commercial use to the Project site is used to determine construction and operational LST air impacts for emissions of NO_X and CO as the averaging periods for these pollutants are shorter (8 hours or less) and it is reasonable to assume that an individual could be present at these sites for periods of one to 8 hours. The Syco Enterprise, Inc. shopping service warehouse is the nearest commercial/industrial use and is located at 500 West Warner Avenue, approximately 63 feet (19 meters) west of the Project site. It should be noted that the *LST Methodology* explicitly states that "*It is possible that a project may have receptors closer than 25 meters. Projects with boundaries located closer than 25 meters to the nearest receptor should use the LSTs for receptors located at 25 meters* (18)." As such, for evaluation of localized NO_X and CO, a 25-meter distance will be used.

Table 7 identifies the localized impacts at the nearest receptor location in the vicinity of the Project. Outputs from the model runs for construction LSTs are provided in Appendix 1. For analytical purposes, emissions associated with peak demolition, site preparation, and grading activities are considered for purposes of LSTs since these phases represent the maximum localized emissions that would occur. Any other construction phases of development that overlap would result in lesser emissions and consequently lesser impacts than what is disclosed herein. As shown in Table 7, emissions resulting from the construction will not exceed the numerical thresholds of significance established by the SCAQMD for any criteria pollutant. Thus, a less than significant impact would occur for localized Project-related construction-source emissions and no mitigation is required.

EXHIBIT 2: RECEPTOR LOCATIONS

TABLE 7: PROJECT LOCALIZED CONSTRUCTION IMPACTS

Activity	Year	Scenario	NO_X	CO	PM_{10}	$PM_{2.5}$
Demolition	2025	Summer	22.20	19.90	1.35	0.90
		Winter	n/a	n/a	n/a	n/a
		Maximum Daily Emissions	22.20	19.90	1.35	0.90
		SCAQMD Regional Thresholds	81	485	10	4
		Threshold Exceeded?	NO	NO	NO	NO
Site Preparation	2025	Summer	37.50	32.40	7.59	4.47
		Winter	37.50	32.40	7.59	4.47
		Maximum Daily Emissions	37.50	32.40	7.59	4.47
		SCAQMD Regional Thresholds	149	984	25	7
		Threshold Exceeded?	NO	NO	NO	NO

LOCALIZED OPERATIONAL EMISSIONS

The proposed Project is to consist of the reuse of an existing 57,705 SF industrial building on a 4.99-acre lot as a soccer training facility. According to SCAQMD LST methodology, LSTs would apply to the operational phase of a proposed project, if the project includes stationary sources, or attracts mobile sources that may spend long periods queuing and idling at the site (e.g., transfer facilities and warehouse buildings). The proposed project does not include such uses, and thus, due to the lack of significant stationary source emissions, no LST analysis is needed for operations.

PROJECT GREENHOUSE GAS IMPACTS

A numerical threshold for determining the significance of GHG emissions in the South Coast Air Basin (SCAB) has not been established by the SCAQMD for Projects where it is not the lead agency. As an interim threshold based on guidance provided in the California Air Pollution Control Officers Association (CAPCOA) *CEQA and Climate Change* handbook, the City has opted to use a non-zero threshold approach based on Approach 2 of the handbook. Threshold 2.5 (Unit-Based Thresholds Based on Market Capture) establishes a numerical threshold based on capture of approximately 90% of emissions from future development. The latest threshold developed by SCAQMD using this method is 3,000 $MTCO_2e$/yr for all projects (51).

The estimated GHG emissions for Project land use are summarized in Table 8. The estimated GHG emissions include emissions from Carbon Dioxide (CO_2), Methane (CH_4), Nitrous Oxide (N_2O), and Refrigerants (R). As shown in Table 8, the Project would generate a total of approximately 2,018.80 $MTCO_2e$/yr. As such, the Project would not exceed the SCAQMD's numeric threshold of 3,000 $MTCO_2e$/yr if it were applied. Thus, the Project would not have the potential to result in a cumulatively considerable impact with respect to GHG emissions. Detailed construction and operation model outputs are presented in Appendix 1.

TABLE 8: PROJECT GHG EMISSIONS

Source	CO_2	CH_4	N_2O	R	Total CO_2E
Annual construction emissions amortized over 30 years	5.99	3.33E-04	0.00	3.33E-04	6.00
Mobile	1,702.00	0.08	0.07	2.63	1,727.00
Area	1.18	0.00	0.00	0.00	1.19
Energy	222.00	0.02	0.00	0.00	223.00
Water	34.80	0.82	0.02	0.00	61.10
Waste	0.14	0.01	0.00	0.00	0.50
Refrigeration	0.00	0.00	0.00	0.01	0.01
Total CO_2E (All Sources)	2,018.80				

CONCLUSION

Results of the assessment indicate that the Project is not anticipated to result in a significant impact during construction or operational activities associated with air quality and GHG and no mitigation is required.

If you have any questions, please contact me directly at hqureshi@urbanxroads.com.

REFERENCES

1. **California Air Pollution Control Officers Association (CAPCOA).** California Emissions Estimator Model (CalEEMod). [Online] May 2022. www.caleemod.com.

2. **South Coast Air Quality Management District (SCAQMD).** SCAQMD Air Quality Significance Thresholds. [Online] https://www.aqmd.gov/docs/default-source/ceqa/handbook/south-coast-aqmd-air-quality-significance-thresholds.pdf.

3. **State of California.** *2020 CEQA California Environmental Quality Act.* 2020.

4. **California Air Pollution Control Officers Association (CAPCOA).** Appendix A: Calculation Details for CalEEMod. *CalEEMod.* [Online] http://www.aqmd.gov/docs/default-source/caleemod/02_appendix-a2016-3-2.pdf?sfvrsn=6.

5. **South Coast Air Quality Management District.** *Localized Significance Thresholds Methodology.* s.l. : South Coast Air Quality Managment District, 2003.

6. —. BOARD MEETING DATE: December 5, 2008 Agenda No. 31. *South Coast Air Quality Management District.* [Online] December 5, 2008. http://www.aqmd.gov/hb/2008/December/081231a.htm .

APPENDIX 1:

CALEEMOD OUTPUTS

Warner Ave. Footlab (Construction) Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Warner Ave. Footlab (Construction)
Construction Start Date	9/1/2025
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	18.6
Location	33.71543858302745, -117.87240998162531
County	Orange
City	Santa Ana
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	6820
EDFZ	7
Electric Utility	Southern California Edison
Gas Utility	Southern California Gas
App Version	2022.1.1.29

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Arena	0.53	1000sqft	0.01	525	0.00	—	—	—
Other Non-Asphalt Surfaces	41.3	1000sqft	0.95	0.00	0.00	—	—	—

Parking Lot	116	Space	0.41	0.00	0.00	—	—	—
Other Asphalt Surfaces	149	1000sqft	3.43	0.00	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.1. Construction Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.89	4.11	37.6	33.4	0.05	1.93	5.90	7.83	1.78	2.74	4.52	—	5,792	5,792	0.23	0.13	1.98	5,816
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	6.16	5.74	37.6	33.3	0.05	1.93	5.90	7.83	1.78	2.74	4.52	—	5,781	5,781	0.23	0.06	0.03	5,804
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.52	0.43	4.02	4.23	0.01	0.17	0.21	0.38	0.16	0.08	0.24	—	795	795	0.03	0.01	0.06	799
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.09	0.08	0.73	0.77	< 0.005	0.03	0.04	0.07	0.03	0.02	0.04	—	132	132	0.01	< 0.005	0.01	132

2.2. Construction Emissions by Year, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Year	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e

Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	4.89	4.11	37.6	33.4	0.05	1.93	5.90	7.83	1.78	2.74	4.52	—	5,792	5,792	0.23	0.13	1.98	5,816
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	4.89	4.11	37.6	33.3	0.05	1.93	5.90	7.83	1.78	2.74	4.52	—	5,781	5,781	0.23	0.06	0.03	5,804
2026	6.16	5.74	19.4	26.9	0.04	0.75	0.27	1.02	0.69	0.06	0.75	—	4,688	4,688	0.18	0.05	0.03	4,708
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.52	0.43	4.02	4.23	0.01	0.17	0.21	0.38	0.16	0.08	0.24	—	795	795	0.03	0.01	0.06	799
2026	0.35	0.33	1.19	1.64	< 0.005	0.05	0.01	0.06	0.04	< 0.005	0.05	—	288	288	0.01	< 0.005	0.02	290
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2025	0.09	0.08	0.73	0.77	< 0.005	0.03	0.04	0.07	0.03	0.02	0.04	—	132	132	0.01	< 0.005	0.01	132
2026	0.06	0.06	0.22	0.30	< 0.005	0.01	< 0.005	0.01	0.01	< 0.005	0.01	—	47.7	47.7	< 0.005	< 0.005	< 0.005	47.9

3. Construction Emissions Details

3.1. Demolition (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	2.86	2.40	22.2	19.9	0.03	0.92	—	0.92	0.84	—	0.84	—	3,425	3,425	0.14	0.03	—	3,437
Demolition	—	—	—	—	—	—	0.43	0.43	—	0.06	0.06	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.16	0.13	1.22	1.09	< 0.005	0.05	—	0.05	0.05	—	0.05	—	188	188	0.01	< 0.005	—	188
Demolition	—	—	—	—	—	—	0.02	0.02	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.22	0.20	< 0.005	0.01	—	0.01	0.01	—	0.01	—	31.1	31.1	< 0.005	< 0.005	—	31.2
Demolition	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.05	0.84	0.00	0.00	0.20	0.20	0.00	0.05	0.05	—	199	199	< 0.005	0.01	0.75	202
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	31.9	31.9	< 0.005	< 0.005	0.09	33.3
Hauling	0.05	0.01	0.66	0.29	< 0.005	0.01	0.14	0.15	0.01	0.04	0.05	—	540	540	0.04	0.09	1.14	569
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	10.5	10.5	< 0.005	< 0.005	0.02	10.7
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.75	1.75	< 0.005	< 0.005	< 0.005	1.82
Hauling	< 0.005	< 0.005	0.04	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	29.6	29.6	< 0.005	< 0.005	0.03	31.1
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.74	1.74	< 0.005	< 0.005	< 0.005	1.77
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.29	0.29	< 0.005	< 0.005	< 0.005	0.30
Hauling	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.90	4.90	< 0.005	< 0.005	< 0.005	5.15

3.3. Site Preparation (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	4.82	4.05	37.5	32.4	0.05	1.93	—	1.93	1.78	—	1.78	—	5,528	5,528	0.22	0.04	—	5,547
Dust From Material Movement	—	—	—	—	—	—	5.66	5.66	—	2.69	2.69	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	4.82	4.05	37.5	32.4	0.05	1.93	—	1.93	1.78	—	1.78	—	5,528	5,528	0.22	0.04	—	5,547

Dust From Material Movement	—	—	—	—	—	—	5.66	5.66	—	2.69	2.69	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.13	0.11	1.03	0.89	< 0.005	0.05	—	0.05	0.05	—	0.05	—	151	151	0.01	< 0.005	—	152
Dust From Material Movement	—	—	—	—	—	—	0.16	0.16	—	0.07	0.07	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.19	0.16	< 0.005	0.01	—	0.01	0.01	—	0.01	—	25.1	25.1	< 0.005	< 0.005	—	25.2
Dust From Material Movement	—	—	—	—	—	—	0.03	0.03	—	0.01	0.01	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.06	0.06	0.98	0.00	0.00	0.23	0.23	0.00	0.05	0.05	—	232	232	< 0.005	0.01	0.88	236
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	31.9	31.9	< 0.005	< 0.005	0.09	33.3
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.06	0.07	0.85	0.00	0.00	0.23	0.23	0.00	0.05	0.05	—	221	221	< 0.005	0.01	0.02	224
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	31.9	31.9	< 0.005	< 0.005	< 0.005	33.3
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	6.14	6.14	< 0.005	< 0.005	0.01	6.22
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.87	0.87	< 0.005	< 0.005	< 0.005	0.91
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.02	1.02	< 0.005	< 0.005	< 0.005	1.03
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.14	0.14	< 0.005	< 0.005	< 0.005	0.15
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.5. Site & Tenant Improvements (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.45	1.21	11.3	14.1	0.03	0.47	—	0.47	0.43	—	0.43	—	2,630	2,630	0.11	0.02	—	2,639
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.22	0.19	1.73	2.16	< 0.005	0.07	—	0.07	0.07	—	0.07	—	402	402	0.02	< 0.005	—	403
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.04	0.03	0.32	0.39	< 0.005	0.01	—	0.01	0.01	—	0.01	—	66.5	66.5	< 0.005	< 0.005	—	66.7
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	2.79	2.79	< 0.005	< 0.005	< 0.005	2.82
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	31.9	31.9	< 0.005	< 0.005	< 0.005	33.3
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.43	0.43	< 0.005	< 0.005	< 0.005	0.44
Vendor	< 0.005	< 0.005	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	4.87	4.87	< 0.005	< 0.005	0.01	5.08
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.07	0.07	< 0.005	< 0.005	< 0.005	0.07
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.81	0.81	< 0.005	< 0.005	< 0.005	0.84
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.7. Site & Tenant Improvements (2026) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.38	1.16	10.7	14.1	0.03	0.41	—	0.41	0.38	—	0.38	—	2,630	2,630	0.11	0.02	—	2,639
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.08	0.71	0.94	< 0.005	0.03	—	0.03	0.03	—	0.03	—	175	175	0.01	< 0.005	—	176
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.01	0.13	0.17	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	29.0	29.0	< 0.005	< 0.005	—	29.1
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	2.73	2.73	< 0.005	< 0.005	< 0.005	2.76
Vendor	< 0.005	< 0.005	0.03	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	31.4	31.4	< 0.005	< 0.005	< 0.005	32.7
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.18	0.18	< 0.005	< 0.005	< 0.005	0.19
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	2.09	2.09	< 0.005	< 0.005	< 0.005	2.18
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.03
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.35	0.35	< 0.005	< 0.005	< 0.005	0.36
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.9. Landscape Median, Misc. Hardscape, & Access Ramp (2026) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.99	0.83	7.46	10.4	0.02	0.31	—	0.31	0.28	—	0.28	—	1,598	1,598	0.06	0.01	—	1,604
Paving	0.50	0.50	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.05	0.05	0.41	0.57	< 0.005	0.02	—	0.02	0.02	—	0.02	—	87.6	87.6	< 0.005	< 0.005	—	87.9
Paving	0.03	0.03	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.07	0.10	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	14.5	14.5	< 0.005	< 0.005	—	14.5
Paving	0.01	0.01	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.07	0.07	0.07	0.91	0.00	0.00	0.26	0.26	0.00	0.06	0.06	—	248	248	< 0.005	0.01	0.02	251
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.05	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	13.8	13.8	< 0.005	< 0.005	0.02	13.9
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	2.28	2.28	< 0.005	< 0.005	< 0.005	2.31
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.11. Architectural Coating (2026) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.19	0.16	1.14	1.51	< 0.005	0.03	—	0.03	0.03	—	0.03	—	178	178	0.01	< 0.005	—	179
Architectural Coatings	3.02	3.02	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.06	0.08	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	9.75	9.75	< 0.005	< 0.005	—	9.79
Architectural Coatings	0.17	0.17	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.01	0.02	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.61	1.61	< 0.005	< 0.005	—	1.62
Architectural Coatings	0.03	0.03	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.55	0.55	< 0.005	< 0.005	< 0.005	0.55
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.03	0.03	< 0.005	< 0.005	< 0.005	0.03
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.01	0.01	< 0.005	< 0.005	< 0.005	0.01
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

4. Operations Emissions Details

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
Demolition	Demolition	9/1/2025	9/29/2025	5.00	20.0	—
Site Preparation	Site Preparation	9/30/2025	10/14/2025	5.00	10.0	—
Site & Tenant Improvements	Building Construction	10/15/2025	2/3/2026	5.00	80.0	—
Landscape Median, Misc. Hardscape, & Access Ramp	Paving	1/7/2026	2/3/2026	5.00	20.0	—
Architectural Coating	Architectural Coating	1/7/2026	2/3/2026	5.00	20.0	—

5.2. Off-Road Equipment

5.2.1. Unmitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
Demolition	Concrete/Industrial Saws	Diesel	Average	1.00	8.00	33.0	0.73
Demolition	Excavators	Diesel	Average	3.00	8.00	36.0	0.38
Demolition	Rubber Tired Dozers	Diesel	Average	2.00	8.00	367	0.40

Site Preparation	Rubber Tired Dozers	Diesel	Average	3.00	8.00	367	0.40
Site Preparation	Crawler Tractors	Diesel	Average	4.00	8.00	87.0	0.43
Site & Tenant Improvements	Cranes	Diesel	Average	1.00	8.00	367	0.29
Site & Tenant Improvements	Forklifts	Diesel	Average	3.00	8.00	82.0	0.20
Site & Tenant Improvements	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Site & Tenant Improvements	Tractors/Loaders/Backhoes	Diesel	Average	3.00	8.00	84.0	0.37
Site & Tenant Improvements	Welders	Diesel	Average	1.00	8.00	46.0	0.45
Landscape Median, Misc. Hardscape, & Access Ramp	Pavers	Diesel	Average	1.00	8.00	81.0	0.42
Landscape Median, Misc. Hardscape, & Access Ramp	Paving Equipment	Diesel	Average	2.00	8.00	89.0	0.36
Landscape Median, Misc. Hardscape, & Access Ramp	Rollers	Diesel	Average	2.00	8.00	36.0	0.38
Landscape Median, Misc. Hardscape, & Access Ramp	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	84.0	0.37
Landscape Median, Misc. Hardscape, & Access Ramp	Cement and Mortar Mixers	Diesel	Average	2.00	8.00	10.0	0.56
Architectural Coating	Air Compressors	Diesel	Average	1.00	8.00	37.0	0.48

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Demolition	—	—	—	—

Demolition	Worker	15.0	18.5	LDA,LDT1,LDT2
Demolition	Vendor	1.00	10.2	HHDT,MHDT
Demolition	Hauling	7.75	20.0	HHDT
Demolition	Onsite truck	—	—	HHDT
Site Preparation	—	—	—	—
Site Preparation	Worker	17.5	18.5	LDA,LDT1,LDT2
Site Preparation	Vendor	1.00	10.2	HHDT,MHDT
Site Preparation	Hauling	0.00	20.0	HHDT
Site Preparation	Onsite truck	—	—	HHDT
Site & Tenant Improvements	—	—	—	—
Site & Tenant Improvements	Worker	0.22	18.5	LDA,LDT1,LDT2
Site & Tenant Improvements	Vendor	1.00	10.2	HHDT,MHDT
Site & Tenant Improvements	Hauling	0.00	20.0	HHDT
Site & Tenant Improvements	Onsite truck	—	—	HHDT
Landscape Median, Misc. Hardscape, & Access Ramp	—	—	—	—
Landscape Median, Misc. Hardscape, & Access Ramp	Worker	20.0	18.5	LDA,LDT1,LDT2
Landscape Median, Misc. Hardscape, & Access Ramp	Vendor	—	10.2	HHDT,MHDT
Landscape Median, Misc. Hardscape, & Access Ramp	Hauling	0.00	20.0	HHDT
Landscape Median, Misc. Hardscape, & Access Ramp	Onsite truck	—	—	HHDT
Architectural Coating	—	—	—	—
Architectural Coating	Worker	0.04	18.5	LDA,LDT1,LDT2
Architectural Coating	Vendor	—	10.2	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	0.00	0.00	788	263	12,509

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (cy)	Material Exported (cy)	Acres Graded (acres)	Material Demolished (Ton of Debris)	Acres Paved (acres)
Demolition	0.00	0.00	0.00	620	—
Site Preparation	—	—	35.0	0.00	—
Landscape Median, Misc. Hardscape, & Access Ramp	0.00	0.00	0.00	0.00	4.79

5.6.2. Construction Earthmoving Control Strategies

Control Strategies Applied	Frequency (per day)	PM10 Reduction	PM2.5 Reduction
Water Exposed Area	3	74%	74%
Water Demolished Area	2	36%	36%

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Arena	0.00	0%
Other Non-Asphalt Surfaces	0.95	0%

Parking Lot	0.41	100%
Other Asphalt Surfaces	3.43	100%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2025	0.00	349	0.03	< 0.005
2026	0.00	346	0.03	< 0.005

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)

6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	9.03	annual days of extreme heat
Extreme Precipitation	3.50	annual days with precipitation above 20 mm
Sea Level Rise	—	meters of inundation depth
Wildfire	1.31	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	57.0
AQ-PM	70.7

AQ-DPM	86.4
Drinking Water	46.5
Lead Risk Housing	79.9
Pesticides	39.8
Toxic Releases	88.8
Traffic	93.8
Effect Indicators	—
CleanUp Sites	99.4
Groundwater	98.3
Haz Waste Facilities/Generators	98.7
Impaired Water Bodies	0.00
Solid Waste	59.2
Sensitive Population	—
Asthma	59.4
Cardio-vascular	40.8
Low Birth Weights	76.1
Socioeconomic Factor Indicators	—
Education	74.3
Housing	16.9
Linguistic	61.5
Poverty	53.9
Unemployment	41.8

7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	40.56204286

Employed	40.65186706
Median HI	66.55973309
Education	—
Bachelor's or higher	53.18875914
High school enrollment	100
Preschool enrollment	37.11022713
Transportation	—
Auto Access	65.16104196
Active commuting	72.75760298
Social	—
2-parent households	46.77274477
Voting	13.94841524
Neighborhood	—
Alcohol availability	15.19312203
Park access	81.35506224
Retail density	97.31810599
Supermarket access	16.56614911
Tree canopy	22.59720262
Housing	—
Homeownership	14.03823945
Housing habitability	20.06929296
Low-inc homeowner severe housing cost burden	13.64044655
Low-inc renter severe housing cost burden	75.42666496
Uncrowded housing	11.86962659
Health Outcomes	—
Insured adults	22.21224176
Arthritis	95.5
Asthma ER Admissions	53.4

High Blood Pressure	93.3
Cancer (excluding skin)	94.8
Asthma	65.7
Coronary Heart Disease	90.3
Chronic Obstructive Pulmonary Disease	89.8
Diagnosed Diabetes	67.4
Life Expectancy at Birth	30.3
Cognitively Disabled	56.3
Physically Disabled	73.0
Heart Attack ER Admissions	60.6
Mental Health Not Good	45.5
Chronic Kidney Disease	73.0
Obesity	52.9
Pedestrian Injuries	93.3
Physical Health Not Good	53.6
Stroke	88.3
Health Risk Behaviors	—
Binge Drinking	8.9
Current Smoker	48.5
No Leisure Time for Physical Activity	43.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	26.6
Elderly	97.5
English Speaking	36.0
Foreign-born	82.9
Outdoor Workers	26.2

Climate Change Adaptive Capacity	—
Impervious Surface Cover	19.4
Traffic Density	94.8
Traffic Access	23.0
Other Indices	—
Hardship	66.4
Other Decision Support	—
2016 Voting	36.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	86.0
Healthy Places Index Score for Project Location (b)	44.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	Yes
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.
b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification

Land Use	Parking stall dimensions assumed to be 8.5' x 18'
Construction: Construction Phases	Construction based on a 2026 Opening Year
Construction: Off-Road Equipment	Crawler Tractors used in lieu of Tractors/Loaders/Backhoes
Construction: Trips and VMT	Vendor Trips adjusted based on CalEEMod defaults for Building Construction and number of days for Demolition, Site Preparation, Grading, and Building Construction.
Construction: Architectural Coatings	Rule 1113
Operations: Vehicle Data	Trip rates based on ITE LU Code 488
Operations: Refrigerants	As of 1 January 2022, new commercial refrigeration equipment may not use refrigerants with a GWP of 150 or greater. Further, R-404A (the CalEEMod default) is unacceptable for new supermarket and cold storage systems as of 1 January 2019 and 2023, respectively. Beginning 1 January 2025, all new air conditioning equipment may not use refrigerants with a GWP of 750 or greater.

Warner Ave. Footlab (Operations) Detailed Report

Table of Contents

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Warner Ave. Footlab (Operations)
Operational Year	2026
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	2.50
Precipitation (days)	18.6
Location	33.71543858302745, -117.87240998162531
County	Orange
City	Santa Ana
Air District	South Coast AQMD
Air Basin	South Coast
TAZ	6820
EDFZ	7
Electric Utility	Southern California Edison
Gas Utility	Southern California Gas
App Version	2022.1.1.29

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Arena	58.2	1000sqft	1.34	58,230	0.00	—	—	—
Other Non-Asphalt Surfaces	41.3	1000sqft	0.95	0.00	0.00	—	—	—

Parking Lot	116	Space	0.41	0.00	0.00	—	—	—
Other Asphalt Surfaces	101	1000sqft	2.31	0.00	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.4. Operations Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	14.5	13.3	9.13	100	0.26	0.21	23.9	24.1	0.20	6.06	6.25	48.9	27,216	27,265	6.28	1.10	89.4	27,839
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	14.0	12.8	9.84	90.9	0.25	0.20	23.9	24.1	0.19	6.06	6.25	48.9	26,218	26,267	6.33	1.14	2.37	26,768
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	6.91	6.38	4.50	40.4	0.10	0.12	9.71	9.82	0.11	2.46	2.58	48.9	11,793	11,842	5.63	0.55	15.9	12,161
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	1.26	1.17	0.82	7.37	0.02	0.02	1.77	1.79	0.02	0.45	0.47	8.10	1,952	1,961	0.93	0.09	2.64	2,013

2.5. Operations Emissions by Sector, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Sector	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	12.6	11.5	8.44	97.2	0.25	0.15	23.9	24.0	0.14	6.06	6.20	—	25,700	25,700	1.13	0.97	89.3	26,107
Area	1.87	1.83	0.02	2.53	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.4	10.4	< 0.005	< 0.005	—	10.5
Energy	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	1,343	1,343	0.12	0.01	—	1,349
Water	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Waste	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Total	14.5	13.3	9.13	100	0.26	0.21	23.9	24.1	0.20	6.06	6.25	48.9	27,216	27,265	6.28	1.10	89.4	27,839
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	12.5	11.4	9.17	90.4	0.24	0.15	23.9	24.0	0.14	6.06	6.20	—	24,712	24,712	1.17	1.02	2.32	25,047
Area	1.42	1.42	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Energy	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	1,343	1,343	0.12	0.01	—	1,349
Water	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Waste	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Total	14.0	12.8	9.84	90.9	0.25	0.20	23.9	24.1	0.19	6.06	6.25	48.9	26,218	26,267	6.33	1.14	2.37	26,768
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	5.11	4.64	3.81	38.1	0.10	0.06	9.71	9.77	0.06	2.46	2.52	—	10,280	10,280	0.48	0.42	15.9	10,433
Area	1.73	1.70	0.01	1.73	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	7.13	7.13	< 0.005	< 0.005	—	7.16
Energy	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	1,343	1,343	0.12	0.01	—	1,349
Water	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Waste	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Total	6.91	6.38	4.50	40.4	0.10	0.12	9.71	9.82	0.11	2.46	2.58	48.9	11,793	11,842	5.63	0.55	15.9	12,161
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Mobile	0.93	0.85	0.70	6.95	0.02	0.01	1.77	1.78	0.01	0.45	0.46	—	1,702	1,702	0.08	0.07	2.63	1,727
Area	0.32	0.31	< 0.005	0.32	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.18	1.18	< 0.005	< 0.005	—	1.19
Energy	0.01	0.01	0.12	0.10	< 0.005	0.01	—	0.01	0.01	—	0.01	—	222	222	0.02	< 0.005	—	223
Water	—	—	—	—	—	—	—	—	—	—	—	7.96	26.8	34.8	0.82	0.02	—	61.1
Waste	—	—	—	—	—	—	—	—	—	—	—	0.14	0.00	0.14	0.01	0.00	—	0.50
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.01	0.01
Total	1.26	1.17	0.82	7.37	0.02	0.02	1.77	1.79	0.02	0.45	0.47	8.10	1,952	1,961	0.93	0.09	2.64	2,013

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	12.6	11.5	8.44	97.2	0.25	0.15	23.9	24.0	0.14	6.06	6.20	—	25,700	25,700	1.13	0.97	89.3	26,107
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Total	12.6	11.5	8.44	97.2	0.25	0.15	23.9	24.0	0.14	6.06	6.20	—	25,700	25,700	1.13	0.97	89.3	26,107
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Arena	12.5	11.4	9.17	90.4	0.24	0.15	23.9	24.0	0.14	6.06	6.20	—	24,712	24,712	1.17	1.02	2.32	25,047
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Total	12.5	11.4	9.17	90.4	0.24	0.15	23.9	24.0	0.14	6.06	6.20	—	24,712	24,712	1.17	1.02	2.32	25,047
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	0.93	0.85	0.70	6.95	0.02	0.01	1.77	1.78	0.01	0.45	0.46	—	1,702	1,702	0.08	0.07	2.63	1,727
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.93	0.85	0.70	6.95	0.02	0.01	1.77	1.78	0.01	0.45	0.46	—	1,702	1,702	0.08	0.07	2.63	1,727

4.2. Energy

4.2.1. Electricity Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	—	530	530	0.05	0.01	—	533

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	14.8	14.8	< 0.005	< 0.005	—	14.9
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	—	545	545	0.05	0.01	—	548
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	—	530	530	0.05	0.01	—	533
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	14.8	14.8	< 0.005	< 0.005	—	14.9
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	—	545	545	0.05	0.01	—	548
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	—	87.7	87.7	0.01	< 0.005	—	88.2
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	2.46	2.46	< 0.005	< 0.005	—	2.47
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	—	90.2	90.2	0.01	< 0.005	—	90.7

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	799	799	0.07	< 0.005	—	801
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Total	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	799	799	0.07	< 0.005	—	801
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	799	799	0.07	< 0.005	—	801
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Total	0.07	0.04	0.67	0.56	< 0.005	0.05	—	0.05	0.05	—	0.05	—	799	799	0.07	< 0.005	—	801
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	0.01	0.01	0.12	0.10	< 0.005	0.01	—	0.01	0.01	—	0.01	—	132	132	0.01	< 0.005	—	133

Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Total	0.01	0.01	0.12	0.10	< 0.005	0.01	—	0.01	0.01	—	0.01	—	132	132	0.01	< 0.005	—	133

4.3. Area Emissions by Source

4.3.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Consumer Products	1.26	1.26	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	0.16	0.16	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.45	0.42	0.02	2.53	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.4	10.4	< 0.005	< 0.005	—	10.5
Total	1.87	1.83	0.02	2.53	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	10.4	10.4	< 0.005	< 0.005	—	10.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Consumer	1.26	1.26	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	0.16	0.16	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	1.42	1.42	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Consumer Products	0.23	0.23	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	0.03	0.03	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.06	0.05	< 0.005	0.32	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.18	1.18	< 0.005	< 0.005	—	1.19
Total	0.32	0.31	< 0.005	0.32	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.18	1.18	< 0.005	< 0.005	—	1.19

4.4. Water Emissions by Land Use

4.4.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	48.1	162	210	4.94	0.12	—	369
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	7.96	26.8	34.8	0.82	0.02	—	61.1
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	7.96	26.8	34.8	0.82	0.02	—	61.1

4.5. Waste Emissions by Land Use

4.5.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	0.86	0.00	0.86	0.09	0.00	—	3.02
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	0.14	0.00	0.14	0.01	0.00	—	0.50
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Total	—	—	—	—	—	—	—	—	—	—	—	0.14	0.00	0.14	0.01	0.00	—	0.50

4.6. Refrigerant Emissions by Land Use

4.6.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.06	0.06
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Arena	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.01	0.01
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.01	0.01

4.7. Offroad Emissions By Equipment Type

4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipm Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.8. Stationary Emissions By Equipment Type

4.8.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.9. User Defined Emissions By Equipment Type

4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.9. Operational Mobile Sources

5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Arena	642	3,644	3,644	547,383	5,943	33,732	33,732	5,067,168

Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Other Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
0	0.00	87,345	29,115	9,582

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	250

5.11. Operational Energy Consumption

5.11.1. Unmitigated

Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Arena	558,585	346	0.0330	0.0040	2,492,357
Other Non-Asphalt Surfaces	0.00	346	0.0330	0.0040	0.00
Parking Lot	15,645	346	0.0330	0.0040	0.00

Other Asphalt Surfaces	0.00	346	0.0330	0.0040	0.00

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Arena	25,083,744	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Parking Lot	0.00	0.00
Other Asphalt Surfaces	0.00	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Arena	1.60	—
Other Non-Asphalt Surfaces	0.00	—
Parking Lot	0.00	—
Other Asphalt Surfaces	0.00	—

5.14. Operational Refrigeration and Air Conditioning Equipment

5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Arena	Other commercial A/C and heat pumps	User Defined	750	< 0.005	4.00	4.00	18.0
Arena	Stand-alone retail refrigerators and freezers	User Defined	150	0.04	1.00	0.00	1.00

Arena	Walk-in refrigerators and freezers	User Defined	150	< 0.005	7.50	7.50	20.0

5.15. Operational Off-Road Equipment

5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor

5.16. Stationary Sources

5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor

5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)

5.17. User Defined

Equipment Type	Fuel Type

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres

5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres

5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)

6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	9.03	annual days of extreme heat
Extreme Precipitation	3.50	annual days with precipitation above 20 mm
Sea Level Rise	—	meters of inundation depth
Wildfire	1.31	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.
Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (Radke et al., 2017, CEC-500-2017-008), and consider inundation location and depth for the San Francisco Bay, the Sacramento-San Joaquin River Delta and California coast resulting different increments of sea level rise coupled with extreme storm events. Users may select from four scenarios to view the range in potential inundation depth for the grid cell. The four scenarios are: No rise, 0.5 meter, 1.0 meter, 1.41 meters
Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.
The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.
The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	57.0
AQ-PM	70.7
AQ-DPM	86.4
Drinking Water	46.5
Lead Risk Housing	79.9
Pesticides	39.8
Toxic Releases	88.8
Traffic	93.8
Effect Indicators	—
CleanUp Sites	99.4
Groundwater	98.3
Haz Waste Facilities/Generators	98.7
Impaired Water Bodies	0.00
Solid Waste	59.2
Sensitive Population	—
Asthma	59.4
Cardio-vascular	40.8
Low Birth Weights	76.1
Socioeconomic Factor Indicators	—

Education	74.3
Housing	16.9
Linguistic	61.5
Poverty	53.9
Unemployment	41.8

7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	40.56204286
Employed	40.65186706
Median HI	66.55973309
Education	—
Bachelor's or higher	53.18875914
High school enrollment	100
Preschool enrollment	37.11022713
Transportation	—
Auto Access	65.16104196
Active commuting	72.75760298
Social	—
2-parent households	46.77274477
Voting	13.94841524
Neighborhood	—
Alcohol availability	15.19312203
Park access	81.35506224
Retail density	97.31810599
Supermarket access	16.56614911

Tree canopy	22.59720262
Housing	—
Homeownership	14.03823945
Housing habitability	20.06929296
Low-inc homeowner severe housing cost burden	13.64044655
Low-inc renter severe housing cost burden	75.42666496
Uncrowded housing	11.86962659
Health Outcomes	—
Insured adults	22.21224176
Arthritis	95.5
Asthma ER Admissions	53.4
High Blood Pressure	93.3
Cancer (excluding skin)	94.8
Asthma	65.7
Coronary Heart Disease	90.3
Chronic Obstructive Pulmonary Disease	89.8
Diagnosed Diabetes	67.4
Life Expectancy at Birth	30.3
Cognitively Disabled	56.3
Physically Disabled	73.0
Heart Attack ER Admissions	60.6
Mental Health Not Good	45.5
Chronic Kidney Disease	73.0
Obesity	52.9
Pedestrian Injuries	93.3
Physical Health Not Good	53.6
Stroke	88.3
Health Risk Behaviors	—

Binge Drinking	8.9
Current Smoker	48.5
No Leisure Time for Physical Activity	43.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	26.6
Elderly	97.5
English Speaking	36.0
Foreign-born	82.9
Outdoor Workers	26.2
Climate Change Adaptive Capacity	—
Impervious Surface Cover	19.4
Traffic Density	94.8
Traffic Access	23.0
Other Indices	—
Hardship	66.4
Other Decision Support	—
2016 Voting	36.0

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	86.0
Healthy Places Index Score for Project Location (b)	44.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	Yes
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.
b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification
Land Use	Parking stall dimensions are 8.5' x 18'
Construction: Construction Phases	Construction based on a 2026 Opening Year
Construction: Off-Road Equipment	Crawler Tractors used in lieu of Tractors/Loaders/Backhoes
Construction: Trips and VMT	Vendor Trips adjusted based on CalEEMod defaults for Building Construction and number of days for Demolition, Site Preparation, Grading, and Building Construction.
Construction: Architectural Coatings	Rule 1113
Operations: Vehicle Data	Trip rates based on ITE LU Code 488
Operations: Refrigerants	As of 1 January 2022, new commercial refrigeration equipment may not use refrigerants with a GWP of 150 or greater. Further, R-404A (the CalEEMod default) is unacceptable for new supermarket and cold storage systems as of 1 January 2019 and 2023, respectively. Beginning 1 January 2025, all new air conditioning equipment may not use refrigerants with a GWP of 750 or greater.

Attachment D: Noise Assessment

TECHNICAL MEMORANDUM

DATE: April 7, 2025
TO: Andres Cuenca, Stake Sports, LLC
FROM: Bill Maddux, Urban Crossroads, Inc.
JOB NO: 16558-04 Noise Memo.docx

SUBJECT: WARNER AVENUE FOOTLAB NOISE ASSESSMENT

Urban Crossroads, Inc. has completed the following Noise Assessment for the Warner Avenue Footlab (Project), which is at 400 West Warner Avenue, on the southwest corner of West Warner Avenue and South Birtch Street in the City of Santa Ana, as shown in Exhibit 1.

PROJECT OVERVIEW

It is our understanding that the Project includes the reuse of an existing 57,705 square-foot (SF) industrial building on a 4.99-acre lot as a soccer training facility. The Project site plan is shown in Exhibit 2

SUMMARY OF FINDINGS

The Noise Assessment shows that the Project will not exceed the established City of Santa Ana operational and construction thresholds. Therefore, the Project noise impacts are considered *less than significant* at the nearby noise-sensitive receiver locations.

NOISE FUNDAMENTALS

Noise is simply defined as "unwanted sound." Sound becomes unwanted when it interferes with normal activities, when it causes actual physical harm or when it has adverse effects on health. Noise is measured on a logarithmic scale of sound pressure level known as a decibel (dB). A-weighted decibels (dBA) approximate the subjective response of the human ear to broad frequency noise source by discriminating against very low and very high frequencies of the audible spectrum. They are adjusted to reflect only those frequencies which are audible to the human ear. Exhibit 3 presents a summary of the typical noise levels and their subjective loudness and effects that are described in more detail below.

Since the range of intensities that the human ear can detect is so large, the scale frequently used to measure intensity is a scale based on multiples of 10, the logarithmic scale. The scale for measuring intensity is the decibel scale. Each interval of 10 decibels indicates a sound energy ten times greater than before, which is perceived by the human ear as being roughly twice as loud. (1) The most common sounds vary between 40 dBA (very quiet) to 100 dBA (very loud). Normal conversation at three feet is roughly at 60 dBA, while loud jet flyover noises equate to 110 dBA at approximately 1,000 feet, which can cause serious discomfort. (2) Another important aspect of noise is the duration of the sound and the way it is described and distributed in time.

EXHIBIT 1: LOCATION MAP

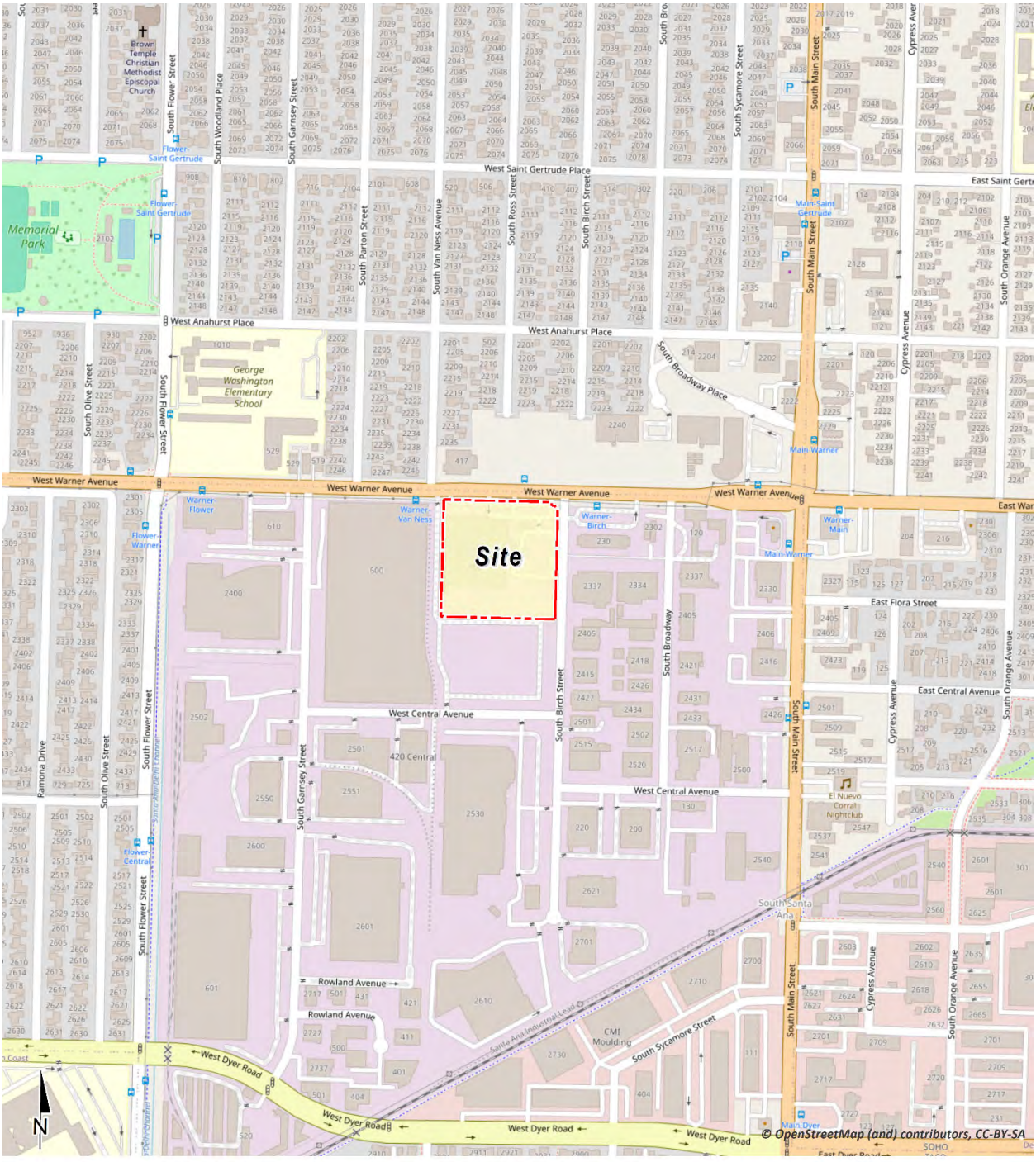


EXHIBIT 2: SITE PLAN

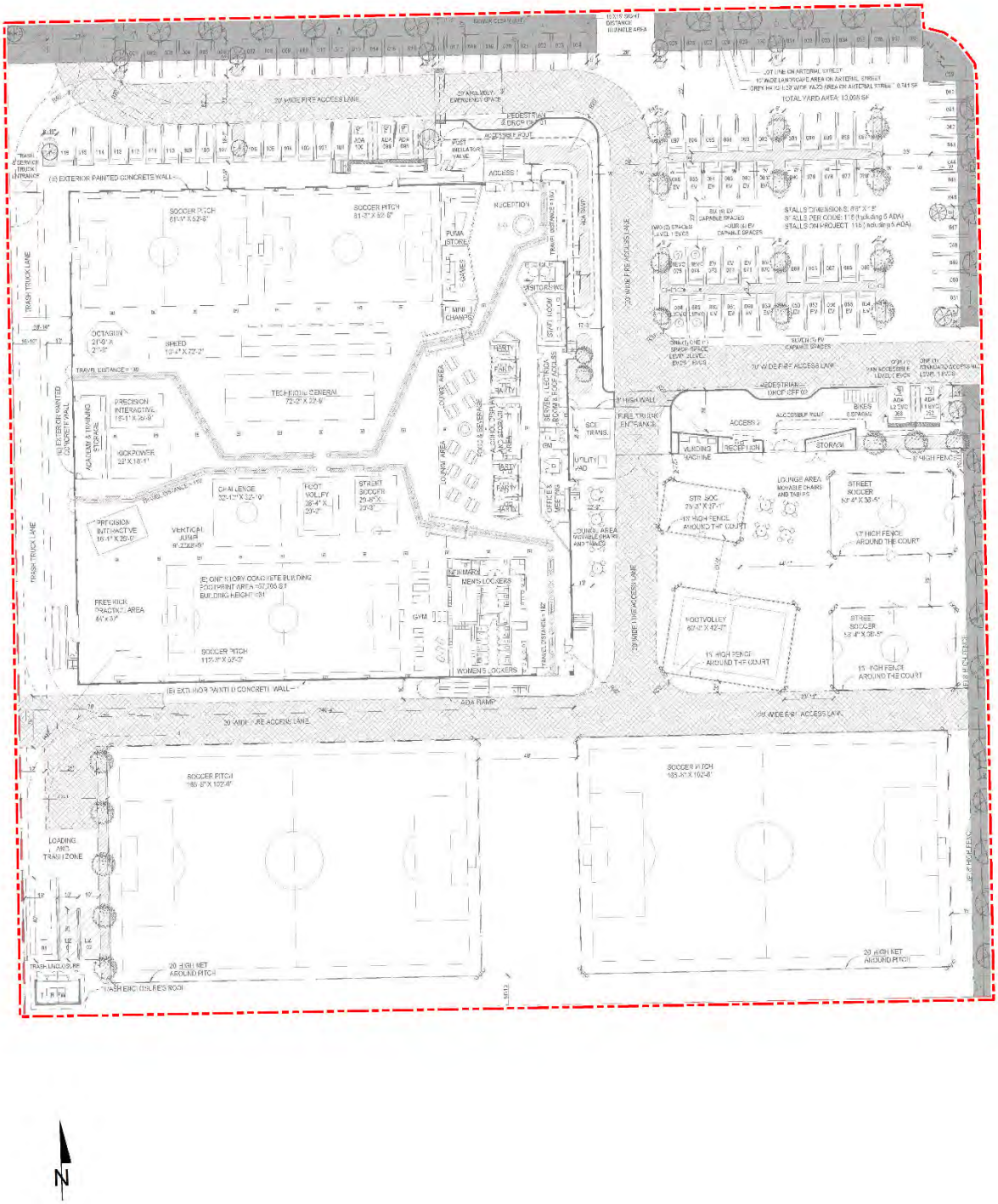


EXHIBIT 3: TYPICAL NOISE LEVELS

COMMON OUTDOOR ACTIVITIES	COMMON INDOOR ACTIVITIES	A - WEIGHTED SOUND LEVEL dBA	SUBJECTIVE LOUDNESS	EFFECTS OF NOISE
THRESHOLD OF PAIN		140	INTOLERABLE OR DEAFENING	HEARING LOSS
NEAR JET ENGINE		130		
		120		
JET FLY-OVER AT 300m (1000 ft)	ROCK BAND	110		
LOUD AUTO HORN		100	VERY NOISY	
GAS LAWN MOWER AT 1m (3 ft)		90		
DIESEL TRUCK AT 15m (50 ft), at 80 km/hr (50 mph)	FOOD BLENDER AT 1m (3 ft)	80		SPEECH INTERFERENCE
NOISY URBAN AREA, DAYTIME	VACUUM CLEANER AT 3m (10 ft)	70	LOUD	
HEAVY TRAFFIC AT 90m (300 ft)	NORMAL SPEECH AT 1m (3 ft)	60		
QUIET URBAN DAYTIME	LARGE BUSINESS OFFICE	50	MODERATE	SLEEP DISTURBANCE
QUIET URBAN NIGHTTIME	THEATER, LARGE CONFERENCE ROOM (BACKGROUND)	40		
QUIET SUBURBAN NIGHTTIME	LIBRARY	30	FAINT	NO EFFECT
QUIET RURAL NIGHTTIME	BEDROOM AT NIGHT, CONCERT HALL (BACKGROUND)	20		
	BROADCAST/RECORDING STUDIO	10	VERY FAINT	
LOWEST THRESHOLD OF HUMAN HEARING	LOWEST THRESHOLD OF HUMAN HEARING	0		

OFF-SITE TRAFFIC NOISE ANALYSIS

The Warner Avenue Footlab Traffic Assessment, prepared by Translutions, Inc. on January 24, 2025, shows that the proposed Project will generate 11 A.M. peak-hour trips and 95 P.M. peak-hour trips. Based on the traffic counts for Warner Avenue and Birch Street, Warner Avenue has an A.M. peak-hour traffic volume of 2,073 and a P.M. peak-hour traffic volume of 2,293. The additional project-related traffic would result in a less than 1 dBA CNEL increase in traffic noise along Warner Avenue. Therefore, land uses adjacent to the study area roadway segments would experience *less than significant* noise level impacts due to the Project-related traffic noise levels.

RECEIVER LOCATIONS

To assess the potential for noise impacts, the following receiver locations, as shown in Exhibit 3, were identified as representative locations for analysis. Sensitive uses or receivers are generally defined as locations where people reside or where the presence of unwanted sound could otherwise adversely affect the use of the land. To describe the potential off-site Project noise levels, three receiver locations in the vicinity of the Project site were identified, including the location of the nearest existing noise-sensitive residential receiver (R1), located approximately 149 feet south of the Project site boundary.

The selection of receiver locations is based on FHWA guidelines and is consistent with additional guidance provided by Caltrans and the FTA. Other sensitive land uses in the Project study area that are located at greater distances than those identified in this noise study will experience lower noise levels than those presented in this report due to the additional attenuation from distance and the shielding of intervening structures.

NOISE PREDICTION MODEL

To fully describe the exterior operational noise levels from the Project, Urban Crossroads, Inc. developed a noise prediction model using the CadnaA (Computer Aided Noise Abatement) computer program. CadnaA can analyze multiple types of noise sources using the spatially accurate Project site plan, georeferenced Nearmap aerial imagery, topography, buildings, and barriers in its calculations to predict outdoor noise levels. Using the ISO 9613-2 protocol, CadnaA will calculate the distance from each noise source to the noise receiver locations, using the ground absorption, distance, and barrier/building attenuation inputs to provide a summary of the noise level at each receiver and the partial noise level contributions by noise source. The noise level calculations provided in this noise assessment account for the distance attenuation provided due to geometric spreading, when sound from a localized stationary source (i.e., a point source) propagates uniformly outward in a spherical pattern. A default ground attenuation factor of 0.5 was used in the CadnaA noise analysis to account for mixed ground representing a combination of hard and soft surfaces.

OPERATIONAL NOISE ANALYSIS

This section analyzes the potential stationary-source operational noise impacts at the nearby receiver locations resulting from the operation of the proposed Warner Avenue Footlab Project.

OPERATIONAL NOISE STANDARDS

The City of Santa Ana noise control guidelines for determining and mitigating non-transportation or stationary noise source impacts from operations in neighboring residential areas are found in the Municipal Code [Section 18-312]. Section 18-312 indicates, "*The following noise standards, unless otherwise specifically indicated, shall apply to all residential property within a designated noise zone.*" The performance standards found in Section 18-312 limit the exterior noise level to 55 dBA L_{eq} during daytime hours (7 a.m. – 10 p.m.) and 50 dBA L_{eq} during nighttime hours at residential receiver locations The City of Santa Ana noise ordinance is included in Appendix A.

OPERATIONAL NOISE SOURCES

The Project-related exterior noise sources are expected to include roof-top air conditioning units, trash enclosure activity, and parking lot vehicle movements. To estimate the Project operational noise impacts, reference noise level measurements were collected from similar types of activities to represent the noise levels expected with the development of the proposed Project. While sound pressure levels (e.g., L_{eq}) quantify in decibels the intensity of given sound sources at a reference distance, sound power levels (L_w) are connected to the sound source and are independent of distance. Sound pressure levels vary substantially with distance from the source and diminish because of intervening obstacles and barriers, air absorption, wind, and other factors. Sound power is the acoustical energy emitted by the sound source and is an absolute value that is not affected by the environment. The Project reference operational and sound power levels are summarized below in Table 1. The reference project operational noise levels are based on the Project-related noise source activities shown in Exhibit 4.

EXHIBIT 3: RECEIVER LOCATIONS

TABLE 1: REFERENCE OPERATIONAL NOISE LEVELS

Noise Source[1]	Noise Source Height (Feet)	Min./ Hour[2]		Reference Noise Level (dBA L_{eq}) @ 50 Feet	Sound Power Level (dBA)[3]
		Day	Night		
Loading Activity	8'	60	0	72.1	103.7
Roof-Top Air Conditioning Units	5'	39	28	57.2	88.8
Trash Enclosure Activity	5'	10	0	57.4	89.0
Parking Lot Vehicle Movements	5'	60	0	49.5	81.1
Soccer Games	5'	60	0	58.4	90.0

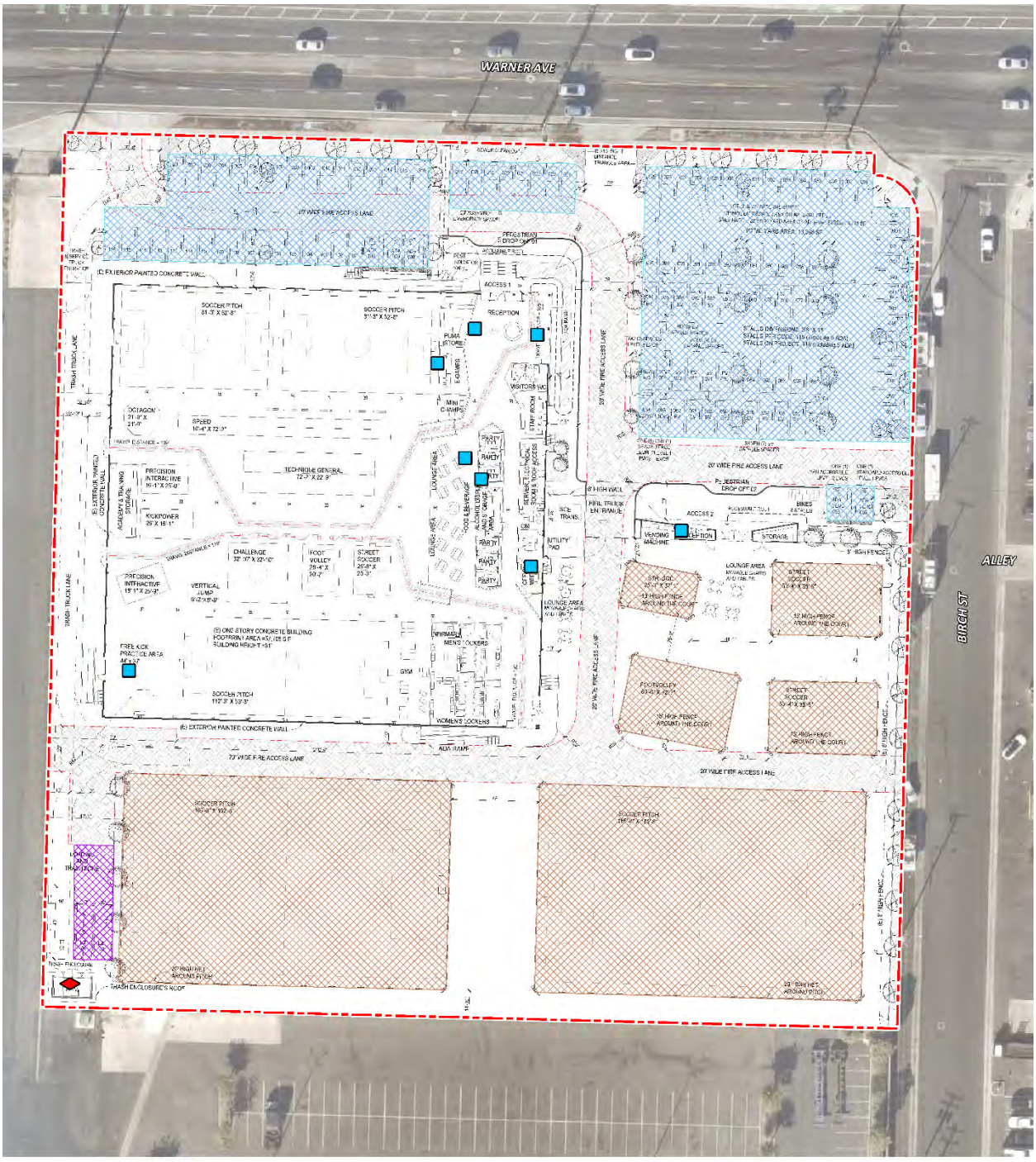
[1] As measured by Urban Crossroads, Inc.
[2] Anticipated duration (minutes within the hour) of noise activity during typical hourly conditions expected at the Project site. "Daytime" = 7:00 a.m. - 10:00 p.m.; "Nighttime" = 10:00 p.m. - 7:00 a.m.
[3] Sound power level represents the total amount of acoustical energy (noise level) produced by a sound source independent of distance or surroundings. Sound power levels calculated using the CadnaA noise model at the reference distance to the noise source.

CADNAA NOISE PREDICTION MODEL

To fully describe the exterior operational noise levels from the Project, Urban Crossroads, Inc. developed a noise prediction model using the CadnaA (Computer Aided Noise Abatement) computer program. CadnaA can analyze multiple types of noise sources using the spatially accurate Project site plan, georeferenced Nearmap aerial imagery, topography, buildings, and barriers in its calculations to predict outdoor noise levels. Using the ISO 9613-2 protocol, CadnaA will calculate the distance from each noise source to the noise receiver locations, using the ground absorption, distance, and barrier/building attenuation inputs to provide a summary of the noise level at each receiver and the partial noise level contributions by noise source.

Consistent with the ISO 9613-2 protocol, the CadnaA noise prediction model relies on the reference sound power level (Lw) to describe individual noise sources. While sound pressure levels (e.g., Leq) quantify in decibels the intensity of given sound sources at a reference distance, sound power levels (Lw) are connected to the sound source and are independent of distance. Sound pressure levels vary substantially with distance from the source and diminish because of intervening obstacles and barriers, air absorption, wind, and other factors. Sound power is the acoustical energy emitted by the sound source and is an absolute value that is not affected by the environment. The operational noise level calculations provided in this noise study account for the distance attenuation provided due to geometric spreading, when sound from a localized stationary source (i.e., a point source) propagates uniformly outward in a spherical pattern. A default ground attenuation factor of 0.5 was used in the noise analysis to account for mixed ground representing a combination of hard and soft surfaces. Appendix B includes the detailed noise dBA Leq model inputs used to estimate the Project operational noise levels presented in this section.

EXHIBIT 4: OPERATIONAL NOISE SOURCE LOCATIONS



PROJECT OPERATIONAL NOISE LEVELS

Using the reference noise levels to represent the Project operations that include roof-top air conditioning units, trash enclosure activity, and parking lot vehicle movements, Urban Crossroads, Inc. calculated the operational source noise levels that are expected to be generated at the Project site and the Project-related noise level increases that would be experienced at each of the sensitive receiver locations. Table 2 shows the Project operational noise levels during the daytime hours of 7:00 a.m. to 10:00 p.m. The daytime hourly noise levels at the off-site receiver locations are expected to range from 43.6 to 48.7 dBA L_{eq}.

TABLE 2: DAYTIME PROJECT OPERATIONAL NOISE LEVELS

Noise Source[1]	Operational Noise Levels by Receiver Location (dBA Leq)		
	R1	R2	R3
Loading Dock Activity	48.0	41.7	35.2
Roof-Top Air Conditioning Units	38.9	40.3	39.6
Trash Enclosure Activity	31.1	26.8	19.9
Parking Lot Vehicle Movements	33.0	33.9	32.8
Soccer Games	28.1	29.9	39.3
Total (All Noise Sources)	48.7	44.7	43.6

[1] See Exhibit 4 for the noise source locations. CadnaA noise model calculations are included in Appendix B.

Table 3 shows the Project operational noise levels during the nighttime hours of 10:00 p.m. to 7:00 a.m. The nighttime hourly noise levels at the existing off-site receiver locations are expected to range from 37.2 to 38.1 dBA Leq. The differences between the daytime and nighttime noise levels are primarily related to the estimated duration of noise activity, as outlined in Table 1. Appendix B includes the detailed noise model inputs.

TABLE 3: NIGHTTIME PROJECT OPERATIONAL NOISE LEVELS

Noise Source[1]	Operational Noise Levels by Receiver Location (dBA Leq)		
	R1	R2	R3
Loading Dock Activity	0.0	0.0	0.0
Roof-Top Air Conditioning Units	36.5	37.9	37.2
Trash Enclosure Activity	28.7	24.4	17.5
Parking Lot Vehicle Movements	0.0	0.0	0.0
Soccer Games	0.0	0.0	0.0
Total (All Noise Sources)	37.2	38.1	37.2

[1] See Exhibit 4 for the noise source locations. CadnaA noise model calculations are included in Appendix B.

OPERATIONAL NOISE LEVEL COMPLIANCE

Using the reference noise levels to represent the proposed Project operations, Urban Crossroads, Inc. calculated the operational source noise levels and the Project-related noise level increases that would be experienced at each of the sensitive receiver locations.

To demonstrate compliance with local noise regulations, the Project-only operational noise levels are evaluated against exterior noise level thresholds based on the City of Santa Ana exterior noise level standards at nearby noise-sensitive receiver locations. Table 4 shows the operational noise levels associated with the Project will not exceed the City of Santa Ana 55 dBA L_{eq} daytime or the 50 dBA L_{eq} nighttime exterior noise level standards. Therefore, the operational noise impacts are considered *less than significant* at the nearby noise-sensitive receiver locations.

TABLE 4: OPERATIONAL NOISE LEVEL COMPLIANCE

Receiver Location[1]	Land Use	Project Operational Noise Levels (dBA Leq)[2]		Noise Level Standards (dBA Leq)[3]		Noise Level Standards Exceeded?[4]	
		Daytime	Nighttime	Daytime	Nighttime	Daytime	Nighttime
R1	Residential	48.7	37.2	55	50	No	No
R2	Residential	44.7	38.1	55	50	No	No
R3	School	43.6	37.2	55	50	No	No

[1] See Exhibit 3 for the receiver locations.
[2] Proposed Project operational noise calculations are included in Appendix B.
[3] Exterior noise level standards.
[4] Do the estimated Project operational noise source activities exceed the noise level standards?
[5] Receiver locations do not include any noise sensitive nighttime use.
"Daytime" = 7:00 a.m. - 10:00 p.m.; "Nighttime" = 10:00 p.m. - 7:00 a.m.

CONSTRUCTION NOISE ANALYSIS

This section analyzes potential impacts resulting from the short-term construction activities associated with the development of the Project. Exhibit 5 illustrates the on-site construction noise source activity in relation to the nearest sensitive receiver locations, as previously shown in Exhibit 3.

CONSTRUCTION NOISE STANDARDS

The City of Santa Ana has set restrictions to control noise impacts associated with the construction of the proposed Project. According to Section 18-314(e) of the city's Municipal Code, Noise sources associated with the construction, repair, remodeling, or grading of any real property, provided said activities do not take place between the hours of 8:00 p.m. and 7:00 a.m. on weekdays, including Saturday, or any time on Sunday or a federal holiday are exempt from the noise ordinance. (3) Project construction noise levels are, therefore, considered exempt from municipal regulation if activities occur within the hours specified in the City of Santa Ana Municipal Code, Section 18-314(e). However, neither the General Plan nor the Municipal Code establishes numeric maximum acceptable construction source noise levels at potentially affected receivers for CEQA analysis purposes. Therefore, a numerical construction threshold based on the Federal Transit Administration (FTA) Transit Noise and Vibration Impact Assessment Manual is used for the analysis of daytime construction impacts. The FTA considers a daytime exterior construction noise level of 80 dBA Leq as a reasonable threshold for noise-sensitive residential land use. (4)

EXHIBIT 5: CONSTRUCTION NOISE SOURCE LOCATIONS

Construction Noise Levels

The FTA *Transit Noise and Vibration Impact Assessment Manual* recognizes that construction projects are accomplished in several different stages and outlines the procedures for assessing noise impacts during construction. Each stage has a specific equipment mix, depending on the work to be completed during that stage. As a result of the equipment mix, each stage has its own noise characteristics; some stages have higher continuous noise levels than others, and some have higher impact noise levels than others. The Project construction activities are expected to occur in the following stages:

- Demolition
- Grading
- Site Preparation
- Building Construction
- Architectural Coating
- Paving

Construction Reference Noise Levels

To describe construction noise activities, this construction noise analysis was prepared using reference construction equipment noise levels from the Federal Highway Administration (FHWA) published the Roadway Construction Noise Model (RCNM), which includes a national database of construction equipment reference noise emission levels. (5) The RCNM equipment database provides a comprehensive list of the noise-generating characteristics of specific types of construction equipment. In addition, the database provides an acoustical usage factor to estimate the fraction of time each piece of construction equipment is operating at full power (i.e., its loudest condition) during a construction operation. According to the EPA, FTA, and FHWA, the overall construction noise level is governed primarily by the noisiest pieces of equipment. The quieter pieces do not affect the overall level, but they do reduce the magnitude of the fluctuations in the noise level. Therefore, a rough estimate of the noise level need only include the noisiest pieces of equipment expected at the site. (6) (4) (7) Consistent with FHWA and FTA guidance for detailed construction noise assessment, Table 5 presents the combined noise levels for the loudest construction activities expected for each stage, assuming all equipment operates simultaneously.

Construction Noise Analysis

Construction projects involve various stages, and activities frequently shift from one location to another. For example, during site preparation and grading, noise-generating activities may concentrate in an area for a short period to remove an obstruction, while the majority of the grading involves the equipment moving back and forth in a predictable pattern throughout the site; building construction and foundation work generally concentrate near the building footprint, while paving generally involves a predictable pattern of movement throughout the site. Therefore, construction activities are best evaluated as multiple moving point sources within the construction area since the speed and power of the equipment vary, and the equipment constantly changes position in terms of its distance and direction relative to the receivers. (4) (8) Using the reference construction equipment noise levels and the CadnaA noise prediction model, calculations of the Project construction noise level impacts by phase at the nearby sensitive receiver locations were completed.

TABLE 5: CONSTRUCTION EQUIPMENT REFERENCE NOISE LEVELS

Construction Stage	Reference Construction Equipmnet[1]	Reference Noise Level @ 50 Feet (dBA L_{eq})	Composite Reference Noise Level (dBA L_{eq})[2]	Reference Power Level (dBA L_w)[3]
Demolition	Jack Hammer	82	86.2	117.9
	Concrete Saw	83		
	Dozer	78		
Site Preparation	Tractor	80	84.0	115.6
	Backhoe	74		
	Grader	81		
Grading	Scraper	80	83.3	114.9
	Excavator	77		
	Dozer	78		
Building Construction	Crane	73	81.1	112.8
	Tractor	80		
	Welder/Torch	70		
Architectural Coating	Man Lift	68	79.8	111.4
	Compressor (air)	74		
	Generator	78		
Paving	Paver	74	77.8	109.5
	Dump Truck	72		
	Roller	73		

[1] FHWA Road Construction Noise Model.
[2] Represents the combined noise level for all equipment assuming they operate at the same time consistent with FTA Transit Noise and Vibration Impact Assessment guidance.
[3] Sound power level represents the total amount of acoustical energy (noise level) produced by a sound source independent of distance or surroundings.

To account for the dynamic nature of construction activities, the CadnaA construction noise analysis evaluates the noise source activities as multiple moving point sources, or construction crews, within the limits of construction. Construction impacts are based on the loudest activity and the highest noise level calculated at each receiver location. As shown in Table 6, the construction noise levels are expected to range from 53.4 to 61.1 dBA L_{eq} at the nearby receiver locations. Appendix C includes the detailed CadnaA construction noise model inputs.

TABLE 6: CONSTRUCTION EQUIPMENT NOISE LEVEL SUMMARY

Receiver Location[1]	Construction Noise Levels (dBA L_{eq})					
	Site Preparation	Grading	Building Construction	Paving	Architectural Coating	Highest Levels[2]
R1	61.1	60.4	58.2	55.0	56.9	61.1
R2	60.5	59.8	57.6	54.4	56.3	60.5
R3	59.5	58.8	56.6	53.4	55.3	59.5

[1] Construction noise source and receiver locations are shown in Exhibit 5.
[2] Construction noise level calculations based on distance from the construction activity, which is measured from the Project site boundary to the nearest receiver locations. CadnaA construction noise model inputs are included in Appendix C.

CONSTRUCTION NOISE COMPLIANCE

To evaluate whether the Project will generate potentially significant short-term noise levels at nearest receiver locations, a construction-related daytime noise level threshold of 80 dBA L_{eq} is used as a reasonable threshold to assess the daytime construction noise level impacts. The construction noise analysis shows that the nearest receiver locations will satisfy the reasonable daytime 80 dBA L_{eq} significance threshold during Project construction activities as shown in Table 7. Therefore, the noise impacts due to Project construction noise are considered less than significant at all receiver locations.

TABLE 7: CONSTRUCTION NOISE LEVEL COMPLIANCE

Receiver Location[1]	Construction Noise Levels (dBA L_{eq})		
	Highest Construction Noise Levels[2]	Threshold[3]	Threshold Exceeded?[4]
R1	61.1	80	No
R2	60.5	80	No
R3	59.5	80	No

[1] Construction noise source and receiver locations are shown in Exhibit 5.
[2] Highest construction noise level calculations based on distance from the construction noise source activity to the nearest receiver locations as shown in Table 6.
[3] Construction noise level thresholds based on FTA Guidance, 2018.
[4] Do the estimated Project construction noise levels exceed the construction noise level threshold?

CONSTRUCTION VIBRATION ANALYSIS

Construction activity can result in varying degrees of ground vibration, depending on the equipment and methods employed. Operation of construction equipment causes ground vibrations that spread through the ground and diminish in strength with distance. Ground vibration levels associated with various types of construction equipment are summarized in Table 8. Based on the representative vibration levels presented for various construction equipment types, it is possible to estimate the potential for human response (annoyance) and building damage using the following vibration assessment methods defined by the FTA. To describe the vibration impacts, the FTA provides the following equation: $PPV_{equip} = PPV_{ref} \times (25/D)^{1.5}$

TABLE 8: VIBRATION SOURCE LEVELS FOR CONSTRUCTION EQUIPMENT

Equipment	PPV (in/sec) at 25 feet
Small bulldozer	0.003
Jackhammer	0.035
Loaded Trucks	0.076
Large bulldozer	0.089
Vibratory Roller	0.210

Federal Transit Administration, Transit Noise and Vibration Impact Assessment Manual

Using the vibration source level of construction equipment provided in Table 8 and the construction vibration assessment methodology published by the FTA, it is possible to estimate the Project vibration impacts. Table 9 presents the expected Project-related vibration levels at the nearby receiver locations. At distances ranging from 149 to 239 feet from Project construction activities, construction vibration velocity levels are estimated to range from less than 0.01 to 0.01 PPV (in/sec). Based on the maximum acceptable continuous vibration threshold of 0.30 PPV (in/sec), the typical Project construction vibration levels will fall below the thresholds at all the noise-sensitive receiver locations. Therefore, the Project-related vibration impacts are considered *less than significant* during typical construction activities at the Project site.

TABLE 9: PROJECT CONSTRUCTION VIBRATION LEVELS

Location[1]	Distance to Const. Activity (Feet)[2]	Typical Construction Vibration Levels PPV (in/sec)[3]						Thresholds PPV (in/sec)[4]	Thresholds Exceeded?[5]
		Small bulldozer	Jack-hammer	Loaded Trucks	Large bulldozer	Vibratory Roller	Highest Vibration Level		
R1	149'	0.00	0.00	0.01	0.01	0.01	0.01	0.30	No
R2	223'	0.00	0.00	0.00	0.00	0.01	0.01	0.30	No
R3	239'	0.00	0.00	0.00	0.00	0.01	0.01	0.30	No

[1] Construction noise source and receiver locations are shown in Exhibit 5.
[2] Distance from receiver building facade to Project construction boundary (Project site boundary).
[3] Based on the Vibration Source Levels of Construction Equipment (Table 8).
[4] Caltrans Transportation and Construction Vibration Guidance Manual, April 2020, Table 19, p. 38.
[5] Does the peak vibration exceed the acceptable vibration thresholds?
"PPV" = Peak Particle Velocity

REFERENCES

1. **California Department of Transportation Environmental Program.** *Technical Noise Supplement - A Technical Supplement to the Traffic Noise Analysis Protocol.* Sacramento, CA : s.n., September 2013.

2. **Environmental Protection Agency Office of Noise Abatement and Control.** *Information on Levels of Environmental Noise Requisite to Protect Public Health and Welfare with an Adequate Margin of Safety.* March 1974. EPA/ONAC 550/9/74-004.

3. **City of Santa Ana.** Municipal Code, Chapter 18, Article VI - Noise Control. *Santa Ana Municode Codification.* [Online] 1978. https://library.municode.com/ca/santa_ana/codes/code_of_ordinances?nodeId=PTIITHCO_CH18HESA_ARTVINOCO.

4. **U.S. Department of Transportation, Federal Transit Administration.** *Transit Noise and Vibration Impact Assessment Manual, FTA Report No. 0123.* September 2018.

5. **U.S. Department of Transportation, Federal Highway Administration, Office of Environment and Planning.** *FHWA Roadway Construction Noise Model.* January, 2006.

6. **U.S. Environmental Protection Agency.** *Noise from Construction Equipment and Operations, Building Equipment, and Home Appliances.* 1971. NTID300.1.

7. **U.S. Department of Transportation, Federal Highway Administration.** Special Report - Measurement, Prediction, and Mitigation. *Office of Planning, Environment, and Realty - Environment - Noise.* [Online] 2017. https://www.fhwa.dot.gov/environment/noise/construction_noise/special_report/hcn00.cfm.

8. —. *FHWA Highway Construction Noise Handbook.* Final Report August 2006.

APPENDIX A:

CITY OF SANTA ANA NOISE CONTROL ORDINANCE

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ARTICLE VI. - NOISE CONTROL

Footnotes:
*--- (**6**) ---*
***Editor's note—** Ord. No. NS-1441, § 1, enacted Aug. 21, 1978, amended Art. VI to read as set out in §§ 18-308—18-321. Formerly Art. VI, pertaining to noise, was derived from Code 1952, §§ 4270, 4270.1, 6390.9, and Ord. No. 1334, adopted Jan. 19, 1953.*

Sec. 18-308. - Declaration of policy.

In order to control unnecessary, excessive and annoying sounds emanating from areas of the city, it is hereby declared to be the policy of the city to prohibit such sounds generated from all sources as specified in this article.

It is determined that certain sound levels are detrimental to the public health, welfare and safety, and contrary to public interest.

(Ord. No. NS-1441, 1, 8-21-78)

Sec. 18-309. - Definitions.

The following words, phrases and terms as used in this article shall have the meaning as indicated below:

Ambient noise level shall mean the all-encompassing noise level associated with a given environment, being a composite of sounds from all sources, excluding the alleged offensive noise, at the location and approximate time at which a comparison with the alleged offensive noise is to be made.

Cumulative period shall mean an additive period of time composed of individual time segments which may be continuous or interrupted.

Decibel (dB) shall mean a unit which denotes the ratio between two (2) quantities which are proportional to power: The number of decibels corresponding to the ratio of two (2) amounts of power is ten (10) times the logarithm to the base ten (10) of this ratio.

Dwelling unit shall mean a single unit providing complete, independent living facilities for one or more persons including permanent provisions for living, sleeping, eating, cooking and sanitation.

Emergency machinery, vehicle or work shall mean any machinery, vehicle or work used, employed or performed in an effort to protect, provide or restore safe conditions in the community or for the citizenry, or work by private or public utilities when restoring utility service.

Fixed noise source shall mean a stationary device which creates sounds while fixed or motionless, including, but not limited to, industrial and commercial machinery and equipment, pumps, fans, compressors, generators, air conditioners and refrigeration equipment.

Grading shall mean any excavating or filling of earth material, or any combination thereof, conducted at a site to prepare said site for construction or other improvements thereon.

Impact noise shall mean the noise produced by the collision of one mass which may be either in motion or at rest.

Mobile noise source shall mean any noise source other than a fixed noise source.

Noise level shall mean the "A" weighted sound pressure level in decibels obtained by using a sound level meter at slow response with a reference pressure of twenty (20) micronewtons per square meter. The unit of measurement shall be designated as dB (A).

Person shall mean a person, firm, association, copartnership, joint venture, corporation or any entity, public or private in nature.

Residential property shall mean a parcel of real property which is developed and used either in part or in whole for residential purposes, other than transient uses such as hotels and motels.

Simple tone noise shall mean a noise characterized by a predominant frequency or frequencies so that other frequencies cannot be readily distinguished.

Sound level meter shall mean an instrument meeting American National Standard Institute's Standard S1.4-1971 for Type 1 or Type 2 sound level meters or an instrument and the associated recording and analyzing equipment which will provide equivalent data.

Sound pressure level of a sound, in decibels, shall mean twenty (20) times the logarithm to the base ten (10) of the ratio of the pressure of the sound to a reference pressure, which reference pressure shall be explicitly stated.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-310. - Noise level measurement criteria.

Any noise level measurements made pursuant to the provisions of this article shall be performed using a sound level meter as defined in section 18-309.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-311. - Designated noise zone.

The entire City of Santa Ana is hereby designated as "Noise Zone 1."

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-312. - Exterior noise standards.

(a) The following noise standards, unless otherwise specifically indicated, shall apply to all residential property within a designated noise zone:

NOISE STANDARDS

Noise Zone	Noise Level	Time Period
1	55 dB(A)	7:00 a.m.—10:00 p.m.
	50 dB(A)	10:00 p.m.— 7:00 a.m.

In the event the alleged offensive noise consists entirely of impact noise, simple tone noise, speech, music, or any combination thereof, each of the above noise levels shall be reduced by five (5) dB (A).

(b) It shall be unlawful for any person at any location within the City of Santa Ana to create any noise, or to allow the creation of any noise on property owned, leased, occupied, or otherwise controlled by such person, when the foregoing causes the noise level, when measured on any other residential property, to exceed:

(1) The noise standard for a cumulative period of more than thirty (30) minutes in any hour; or

(2) The noise standard plus five (5) dB(A) for a cumulative period of more than fifteen (15) minutes in any hour; or

(3) The noise standard plus ten (10) dB(A) for a cumulative period of more than five (5) minutes in any hour; or

(4) The noise standard plus fifteen (15) dB(A) for a cumulative period of more than one minute in any hour; or

(5) The noise standard plus twenty (20) dB(A) for any period of time.

(c) In the event the ambient noise level exceeds any of the first four (4) noise limit categories above, the cumulative period applicable to said category shall be increased to reflect said ambient noise level. In the event the ambient noise level exceeds the fifth noise limit category, the maximum allowable noise level under said category shall be increased to reflect the maximum ambient noise level.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-313. - Interior noise standards.

(a) The following interior noise standards, unless otherwise specifically indicated, shall apply to all residential property within a designated noise zone:

INTERIOR NOISE STANDARDS

Noise Zone	Noise Level	Time Period
1	55 dB(A)	7:00 a.m.—10:00 p.m.
	45 dB(A)	10:00 p.m.—7:00 a.m.

In the event the alleged offensive noise consists entirely of impact noise, simple tone noise, speech, music, or any combination thereof, each of the above noise levels shall be reduced by five (5) dB(A).

(b) It shall be unlawful for any person at any location within the City of Santa Ana to create any noise, or to allow the creation of any noise on property owned, leased, occupied, or otherwise controlled by such person, when the foregoing causes the noise level, when measured within any other dwelling unit on any residential property, to exceed:

(1) The interior noise standard for a cumulative period of more than five (5) minutes in any hour; or

(2) The interior noise standard plus five (5) dB(A) for a cumulative period of more than one minute in any hour; or

(3) The interior noise standard plus ten (10) dB(A) for any period of time.

(c) In the event the ambient noise level exceeds either of the first two (2) noise limit categories above, the cumulative period applicable to said category shall be increased to reflect said ambient noise level. In the event the ambient noise level exceeds the third noise limit category, the maximum allowable noise level under said category shall be increased to reflect the maximum ambient noise level.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-314. - Special provisions.

The following activities shall be exempted from the provisions of this article:

(a) Activities conducted on the grounds of any public or private nursery, elementary, intermediate or secondary school or college.

(b) Outdoor gatherings, public dances and shows, provided said events are conducted pursuant to a license issued by the City of Santa Ana.

(c) Activities conducted on any park or playground, provided such park or playground is owned and operated by a public entity.

(d) Any mechanical device, apparatus or equipment used, related to or connected with emergency machinery, vehicle or work.

(e) Noise sources associated with construction, repair, remodeling, or grading of any real property, provided said activities do not take place between the hours of 8:00 p.m. and 7:00 a.m. on weekdays, including Saturday, or any time on Sunday or a federal holiday.

(f) All mechanical devices, apparatus or equipment which are utilized for the protection or salvage of agricultural crops during periods of potential or actual frost damage or other adverse weather conditions.

(g) Mobile noise sources associated with agricultural operations, provided such operations do not take place between the hours of 8:00 p.m. and 7:00 a.m. on weekdays, including Saturday, or at any time on Sunday or a federal holiday.

(h) Mobile noise sources associated with agricultural pest control through pesticide application, provided that the application is made in accordance with restricted material permits issued by or regulations enforced by the agricultural commissioner.

(i) Noise sources associated with the maintenance of real property, provided said activities take place between 7:00 a.m. and 8:00 p.m. on any day except Sunday or a federal holiday, or between the hours of 9:00 a.m. and 8:00 p.m. on Sunday or a federal holiday.

(j) Any activity to the extent regulation thereof has been preempted by state or federal law.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-315. - Schools, hospitals and churches; special provisions.

It shall be unlawful for any person to create any noise which causes the noise level at any school, hospital or church while the same is in use to exceed the noise limits as specified in section 18-312 prescribed for the assigned noise zone in which the school, hospital or church is located, or which noise level unreasonably interferes with the use of such institutions or which unreasonably disturbs or annoys patients in the hospital, provided conspicuous signs are displayed in three (3) separate locations within one-tenth (1/10) of a mile of the institution indicating the presence of a school, church or hospital.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-316. - Air conditioning and refrigeration; special provisions.

During the five-year period following the effective date of this article, the noise standards enumerated in sections 18-312 and 18-313 shall be increased eight (8) dB(A) where the alleged offensive noise source is an air conditioning or refrigeration system or associated equipment which was installed prior to the effective date of this article.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-317. - Noise level measurement.

The location selected for measuring exterior noise levels shall be at any point on the affected property. Interior noise measurements shall be made within the affected dwelling unit. The measurement shall be made at a point at least four (4) feet from the wall, ceiling, or floor nearest the alleged offensive noise

source and may be made with the windows of the affected unit open.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-318. - Manner of enforcement.

The chief of police, the Orange County health officer and their duly authorized representatives are directed to enforce the provisions of this article. The chief of police, the Orange County health officer and their duly authorized representatives are authorized, pursuant to Penal Code Section 836.5, to arrest any person without a warrant when they have reasonable cause to believe that such person has committed a misdemeanor in their presence.

No person shall interfere with, oppose or resist any authorized person charged with the enforcement of this article while such person is engaged in the performance of his duty.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-319. - Variance procedure.

The owner or operator of a noise source which violates any of the provisions of this article may file an application with the Orange County health officer for a variance from the provisions thereof wherein said owner or operator shall set forth all actions taken to comply with said provisions, the reasons why immediate compliance cannot be achieved, a proposed method of achieving compliance, and a proposed time schedule for its accomplishment. Said application shall be accompanied by a fee as established by resolution of the city council. A separate application shall be filed for each noise source; provided however, that several mobile sources under common ownership, or several fixed sources on a single property may be combined into one application. Upon receipt of said application and fee, the health officer shall refer it with his recommendation thereon within thirty (30) days to the Orange County Noise Variance Board for action thereon in accordance with the provisions of applicable law.

An applicant for a variance shall remain subject to prosecution under the terms of this article until a variance is granted.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-320. - Appeals.

Within fifteen (15) days following the decision of the Orange County Variance Board on an application, the applicant, the health officer, or any member of the city council, may appeal the decision to the city council by filing a notice of appeal with the secretary of the Orange County Variance Board. In the case of an appeal by the applicant for a variance, the notice of appeal shall be accompanied by a fee to be computed by the secretary of the Orange County Variance Board on the basis of the estimated cost of preparing the

materials required to be forwarded to the city council as discussed hereafter. If the actual cost of such preparation differs from the estimated cost appropriate payments shall be made either to or by the secretary of the Orange County Variance Board.

Within fifteen (15) days following receipt of a notice of appeal and the appeal fee, the secretary of the Variance Board shall forward to the city council copies of the application for variance; the recommendation of the health officer; the notice of appeal; all evidence concerning said application received by the variance board and its decision thereon. In addition, any person may file with the clerk of the city council written arguments supporting or attacking said decision and the city council may in its discretion hear oral arguments thereon. The clerk of the city council shall mail to the applicant a notice of the date set for hearing of the appeal. The notice shall be mailed at least ten (10) days prior to the hearing date.

Within sixty (60) days following its receipt of the notice of appeal, the city council shall either affirm, modify or reverse the decision, of the variance board. Such decision shall be based upon the city council's evaluation of the matters submitted to the city council in light of the powers conferred on the variance board and the factors to be considered, both as enumerated in section 18-319 and Orange County Ordinance section 4-6-13.

As part of its decision, the city council may direct the variance board to conduct further proceedings on said application. Failure of the city council to affirm, modify or reverse the decision of the variance board within said sixty-day period shall constitute an affirmance of the decision.

(Ord. No. NS-1441, § 1, 8-21-78)

Sec. 18-321. - Violations; misdemeanors.

Any person violating any or the provisions of this article shall be deemed guilty of a misdemeanor. Each day such violation is committed or permitted to continue shall constitute a separate offense and shall be punishable as such. The provisions of this article shall not be construed as permitting conduct not prescribed herein and shall not affect the enforceability of any other applicable provisions of law.

(Ord. No. NS-1441, § 1, 8-21-78)

Secs. 18-322—18-350. - Reserved.

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APPENDIX B:

CADNAA OPERATIONAL NOISE CALCULATIONS

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16558 - Footlab

CadnaA Noise Prediction Model: 16558-02_Operation.cna
Date: 03.04.25
Analyst: B. Maddux

Calculation Configuration

Configuration	
Parameter	**Value**
General	
Max. Error (dB)	**0.00**
Max. Search Radius (ft)	**6561.70**
Min. Dist Src to Rcvr	**0.00**
Partition	
Raster Factor	**0.50**
Max. Length of Section (ft)	**3280.80**
Min. Length of Section (ft)	**3.30**
Min. Length of Section (%)	**0.00**
Proj. Line Sources	**On**
Proj. Area Sources	**On**
Ref. Time	
Daytime Penalty (dB)	**0.00**
Recr. Time Penalty (dB)	**5.00**
Night-time Penalty (dB)	**10.00**
DTM	
Standard Height (m)	**0.00**
Model of Terrain	**Triangulation**
Reflection	
max. Order of Reflection	**2**
Search Radius Src	**328.08**
Search Radius Rcvr	**328.08**
Max. Distance Source - Rcvr	**3280.84 3280.84**
Min. Distance Rvcr - Reflector	**3.28 3.28**
Min. Distance Source - Reflector	**0.33**
Industrial (ISO 9613 (1996))	
Lateral Diffraction	**some Obj**
Obst. within Area Src do not shield	**On**
Screening	**Incl. Ground Att. over Barrier**
	Dz with limit (20/25)
Barrier Coefficients C1,2,3	**3.0 20.0 0.0**
Temperature (°F)	**50**
rel. Humidity (%)	**70**
Ground Absorption G	**0.50**
Wind Speed for Dir. (mph)	**6.7**
Roads (TNM)	
Railways (FTA/FRA)	
Aircraft (???)	
Strictly acc. to AzB	

Receiver Noise Levels

Name	M.	ID	Level Lr			Limit. Value			Land Use			Height		Coordinates			
			Day	Night	CNEL	Day	Night	CNEL	Type	Auto	Noise Type			X	Y	Z	
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)				(ft)		(ft)	(ft)	(ft)	
R1		R1	48.8	37.2	47.6	0.0	0.0	0.0		x	Total	5.00	r	6068073.09	2208083.42	5.00	
R2		R2	44.7	38.1	45.9	0.0	0.0	0.0		x	Total	5.00	r	6068239.49	2208213.22	5.00	
R3		R3	43.6	37.3	45.0	0.0	0.0	0.0		x	Total	5.00	r	6068847.31	2208099.48	5.00	

Point Source(s)

Name	M.	ID	Result. PWL			Lw / Li			Operating Time			Height		Coordinates		
			Day	Evening	Night	Type	Value	norm.	Day	Special	Night			X	Y	Z
			(dBA)	(dBA)	(dBA)			dB(A)	(min)	(min)	(min)	(ft)		(ft)	(ft)	(ft)
AC1		AC1	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068450.17	2207880.70	25.00
AC2		AC2	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068415.89	2207884.05	25.00
AC3		AC3	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068395.26	2207865.09	25.00
AC4		AC4	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068446.83	2207753.31	25.00
AC5		AC5	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068225.78	2207696.16	25.00
AC6		AC6	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068410.55	2207812.90	25.00
AC7		AC7	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068419.39	2207801.42	25.00
TRASH1		TRASH1	89.0	89.0	89.0	Lw	89		585.00	0.00	252.00	8.00	r	6068193.18	2207523.94	8.00
AC8		AC8	88.9	88.9	88.9	Lw	88.9		585.00	0.00	252.00	5.00	g	6068529.37	2207773.03	19.00

Line Source(s)

Name	M.	ID	Result. PWL			Result. PWL'			Lw / Li			Operating Time			Moving Pt. Src				Height
			Day	Evening	Night	Day	Evening	Night	Type	Value	norm.	Day	Special	Night	Number			Speed	
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)			dB(A)	(min)	(min)	(min)	Day	Evening	Night	(mph)	(ft)

Name	ID	Height				Coordinates			
		Begin		End		x	y	z	Ground
		(ft)		(ft)		(ft)	(ft)	(ft)	(ft)

Area Source(s)

Name	M.	ID	Result. PWL			Result. PWL''			Lw / Li			Operating Time			Height	
			Day	Evening	Night	Day	Evening	Night	Type	Value	norm.	Day	Special	Night	(ft)	
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)			dB(A)	(min)	(min)	(min)		
PARK1		PARK1	81.4	81.4	81.4	51.9	51.9	51.9	Lw	81.4		900.00	0.00	0.00	5	r
PARK2		PARK2	81.4	81.4	81.4	59.1	59.1	59.1	Lw	81.4		900.00	0.00	0.00	5	r
PARK3		PARK3	81.4	81.4	81.4	48.4	48.4	48.4	Lw	81.4		900.00	0.00	0.00	5	r
SOCCER1		SOCCER1	90.0	90.0	90.0	66.6	66.6	66.6	Lw	90		900.00	0.00	0.00	5	r
SOCCER2		SOCCER2	90.0	90.0	90.0	70.3	70.3	70.3	Lw	90		900.00	0.00	0.00	5	r
SOCCER3		SOCCER3	90.0	90.0	90.0	66.3	66.3	66.3	Lw	90		900.00	0.00	0.00	5	r
SOCCER4		SOCCER4	90.0	90.0	90.0	66.7	66.7	66.7	Lw	90		900.00	0.00	0.00	5	r
SOCCER5		SOCCER5	90.0	90.0	90.0	57.2	57.2	57.2	Lw	90		900.00	0.00	0.00	5	r
SOCCER6		SOCCER6	90.0	90.0	90.0	57.2	57.2	57.2	Lw	90		900.00	0.00	0.00	5	r
LOAD1		LOAD1	103.4	103.4	103.4	82.4	82.4	82.4	Lw	103.4		900.00	0.00	0.00	8	r
PARK4		PARK4	81.4	81.4	81.4	64.8	64.8	64.8	Lw	81.4		900.00	0.00	0.00	5	r

Name	ID	Height				Coordinates			
		Begin		End		x	y	z	Ground
		(ft)		(ft)		(ft)	(ft)	(ft)	(ft)
PARK1	PARK1	5.00	r			6068211.81	2207922.15	5.00	0.00
						6068212.42	2207950.95	5.00	0.00
						6068246.29	2207950.54	5.00	0.00
						6068246.90	2207980.15	5.00	0.00
						6068391.10	2207976.91	5.00	0.00
						6068390.29	2207917.48	5.00	0.00
PARK2	PARK2	5.00	r			6068402.46	2207975.89	5.00	0.00
						6068471.62	2207974.68	5.00	0.00
						6068470.61	2207947.30	5.00	0.00
						6068401.85	2207950.34	5.00	0.00
PARK3	PARK3	5.00	r			6068509.75	2207973.05	5.00	0.00
						6068634.69	2207970.42	5.00	0.00
						6068634.08	2207950.74	5.00	0.00
						6068654.77	2207950.14	5.00	0.00
						6068654.56	2207821.55	5.00	0.00
						6068505.69	2207824.79	5.00	0.00
SOCCER1	SOCCER1	5.00	r			6068639.86	2207754.14	5.00	0.00
						6068639.17	2207714.87	5.00	0.00
						6068578.79	2207716.02	5.00	0.00
						6068579.70	2207755.51	5.00	0.00
SOCCER2	SOCCER2	5.00	r			6068539.52	2207748.40	5.00	0.00
						6068534.47	2207724.29	5.00	0.00
						6068494.75	2207732.09	5.00	0.00
						6068500.03	2207756.43	5.00	0.00
SOCCER3	SOCCER3	5.00	r			6068502.79	2207705.00	5.00	0.00
						6068561.34	2207693.29	5.00	0.00
						6068552.84	2207651.73	5.00	0.00
						6068493.83	2207663.67	5.00	0.00
SOCCER4	SOCCER4	5.00	r			6068577.87	2207690.08	5.00	0.00
						6068637.10	2207689.39	5.00	0.00
						6068636.65	2207649.90	5.00	0.00
						6068577.18	2207651.50	5.00	0.00
SOCCER5	SOCCER5	5.00	r			6068630.64	2207629.34	5.00	0.00
						6068627.93	2207514.23	5.00	0.00
						6068448.75	2207519.12	5.00	0.00
						6068451.47	2207634.22	5.00	0.00
SOCCER6	SOCCER6	5.00	r			6068402.60	2207635.58	5.00	0.00
						6068399.89	2207520.48	5.00	0.00
						6068219.63	2207524.55	5.00	0.00
						6068223.43	2207639.65	5.00	0.00
LOAD1	LOAD1	8.00	r			6068195.37	2207537.27	8.00	0.00
						6068195.77	2207600.33	8.00	0.00
						6068217.45	2207600.13	8.00	0.00
						6068216.46	2207536.87	8.00	0.00
PARK4	PARK4	5.00	r			6068609.43	2207778.95	5.00	0.00
						6068609.00	2207797.90	5.00	0.00
						6068635.49	2207797.47	5.00	0.00
						6068635.06	2207778.31	5.00	0.00

Barrier(s)

Name	Sel.	M.	ID	Absorption		Z-Ext.	Cantilever		Height		Coordinates			
				left	right		horz.	vert.	Begin	End	x	y	z	Ground
						(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)

Building(s)

Name	Sel.	M.	ID	RB	Residents	Absorption	Height		Coordinates			
							Begin		x	y	z	Ground
							(ft)		(ft)	(ft)	(ft)	(ft)
B1			B1	x	0		20.00	r	6068218.53	2207908.23	20.00	0.00
									6068456.75	2207902.53	20.00	0.00
									6068450.89	2207664.90	20.00	0.00
									6068211.24	2207670.60	20.00	0.00
B2			B2	x	0		14.00	r	6068506.80	2207779.98	14.00	0.00
									6068593.82	2207778.02	14.00	0.00
									6068593.39	2207766.31	14.00	0.00
									6068507.24	2207768.69	14.00	0.00

Ground Absorption(s)

Name	Sel.	M.	ID	G	Coordinates	
					x	y
					(ft)	(ft)

Vertical Area Source(s)

Name	ID	Height				Coordinates			
		Begin		End		x	y	z	Ground
		(ft)		(ft)		(ft)	(ft)	(ft)	(ft)

Rail

Name	Sel.	M.	ID	Lw'		Train Class	Correct.	Vmax
				Day	Night		Track	
				(dBA)	(dBA)		(dB)	(km(mph)

Sound Level Spectra

Name	ID	Type	Oktave Spectrum (dB)											Source
			Weight.	31.5	63	125	250	500	1000	2000	4000	8000	A	lin	

Roads

Name	Sel.	M.	ID	Lme			Count Data		exact Count Data						Speed Limit		SCS	Surface		Gradient	Mult. Reflection		
				Day	Evening	Night	DTV	Str.class.	M			p (%)			Auto	Truck	Dist.	Dstro	Type		Drefl	Hbuild	Dist.
				(dBA)	(dBA)	(dBA)			Day	Evening	Night	Day	Evening	Night	(mph)	(mph)		(dB)		(%)	(dB)	(ft)	(ft)

RoadsGeo

Name	Height				Coordinates				Dist	LSlope
	Begin		End		x	y	z	Ground	(ft)	(%)
	(ft)		(ft)		(ft)	(ft)	(ft)	(ft)		

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APPENDIX C:

CADNAA CONSTRUCTION NOISE CALCULATIONS

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16558 - Footlab

CadnaA Noise Prediction Model: 16558-02_Construction.cna
Date: 03.04.25
Analyst: B. Maddux

Calculation Configuration

Configuration	
Parameter	**Value**
General	
Max. Error (dB)	**0.00**
Max. Search Radius (ft)	**6561.70**
Min. Dist Src to Rcvr	**0.00**
Partition	
Raster Factor	**0.50**
Max. Length of Section (ft)	**3280.80**
Min. Length of Section (ft)	**3.30**
Min. Length of Section (%)	**0.00**
Proj. Line Sources	**On**
Proj. Area Sources	**On**
Ref. Time	
Daytime Penalty (dB)	**0.00**
Recr. Time Penalty (dB)	**5.00**
Night-time Penalty (dB)	**10.00**
DTM	
Standard Height (m)	**0.00**
Model of Terrain	**Triangulation**
Reflection	
max. Order of Reflection	**2**
Search Radius Src	**328.08**
Search Radius Rcvr	**328.08**
Max. Distance Source - Rcvr	**3280.84 3280.84**
Min. Distance Rvcr - Reflector	**3.28 3.28**
Min. Distance Source - Reflector	**0.33**
Industrial (ISO 9613 (1996))	
Lateral Diffraction	**some Obj**
Obst. within Area Src do not shield	**On**
Screening	**Incl. Ground Att. over Barrier**
	Dz with limit (20/25)
Barrier Coefficients C1,2,3	**3.0 20.0 0.0**
Temperature (°F)	**50**
rel. Humidity (%)	**70**
Ground Absorption G	**0.50**
Wind Speed for Dir. (mph)	**6.7**
Roads (TNM)	
Railways (FTA/FRA)	
Aircraft (???)	
Strictly acc. to AzB	

Receiver Noise Levels

Name	M.	ID	Level Lr			Limit. Value			Land Use			Height		Coordinates			
			Day	Night	CNEL	Day	Night	CNEL	Type	Auto	Noise Type			X	Y	Z	
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)				(ft)		(ft)	(ft)	(ft)	
R1		R1	61.1	-38.9	58.1	0.0	0.0	0.0		x	Total	5.00	r	6068073.09	2208083.42	5.00	
R2		R2	60.5	-39.5	57.5	0.0	0.0	0.0		x	Total	5.00	r	6068239.49	2208213.22	5.00	
R3		R3	59.5	-40.5	56.5	0.0	0.0	0.0		x	Total	5.00	r	6068847.31	2208099.48	5.00	

Point Source(s)

Name	M.	ID	Result. PWL			Lw / Li			Operating Time			Height	Coordinates		
			Day	Evening	Night	Type	Value	norm.	Day	Special	Night		X	Y	Z
			(dBA)	(dBA)	(dBA)			dB(A)	(min)	(min)	(min)	(ft)	(ft)	(ft)	(ft)

Line Source(s)

Name	M.	ID	Result. PWL			Result. PWL'			Lw / Li			Operating Time			Moving Pt. Src				Height
			Day	Evening	Night	Day	Evening	Night	Type	Value	norm.	Day	Special	Night	Number			Speed	
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)			dB(A)	(min)	(min)	(min)	Day	Evening	Night	(mph)	(ft)

Name	ID	Height		Coordinates			
		Begin	End	x	y	z	Ground
		(ft)	(ft)	(ft)	(ft)	(ft)	(ft)

Area Source(s)

Name	M.	ID	Result. PWL			Result. PWL''			Lw / Li			Operating Time			Height	
			Day	Evening	Night	Day	Evening	Night	Type	Value	norm.	Day	Special	Night	(ft)	
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)			dB(A)	(min)	(min)	(min)		
CA1		CA1	115.6	15.6	15.6	72.4	-27.6	-27.6	PWL-Pt	115.6					8	r

Name	ID	Height				Coordinates			
		Begin		End		x	y	z	Ground
		(ft)		(ft)		(ft)	(ft)	(ft)	(ft)
CA1	CA1	8.00	r			6068647.94	2207499.29	8.00	0.00
						6068178.09	2207511.31	8.00	0.00
						6068190.60	2207991.87	8.00	0.00
						6068635.45	2207980.48	8.00	0.00
						6068635.15	2207968.49	8.00	0.00
						6068639.48	2207968.00	8.00	0.00
						6068643.66	2207966.76	8.00	0.00
						6068647.56	2207964.81	8.00	0.00
						6068651.06	2207962.22	8.00	0.00
						6068654.06	2207959.06	8.00	0.00
						6068656.46	2207955.43	8.00	0.00
						6068658.20	2207951.43	8.00	0.00
						6068659.22	2207947.20	8.00	0.00
						6068659.48	2207942.85	8.00	0.00

Barrier(s)

Name	Sel.	M.	ID	Absorption		Z-Ext.	Cantilever		Height		Coordinates			
				left	right		horz.	vert.	Begin	End	x	y	z	Ground
						(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)

Building(s)

Name	Sel.	M.	ID	RB	Residents	Absorption	Height	Coordinates				
							Begin	x	y	z	Ground	
							(ft)	(ft)	(ft)	(ft)	(ft)	

Ground Absorption(s)

Name	Sel.	M.	ID	G	Coordinates	
					x	y
					(ft)	(ft)

Vertical Area Source(s)

Name	ID	Height				Coordinates			
		Begin		End		x	y	z	Ground
		(ft)		(ft)		(ft)	(ft)	(ft)	(ft)

Rail

Name	Sel.	M.	ID	Lw'		Train Class	Correct.	Vmax
				Day	Night		Track	
				(dBA)	(dBA)		(dB)	(km(mph)

Sound Level Spectra

Name	ID	Type	Oktave Spectrum (dB)											Source
			Weight.	31.5	63	125	250	500	1000	2000	4000	8000	A	lin	

Roads

Name	Sel.	M.	ID	Lme			Count Data		exact Count Data						Speed Limit		SCS	Surface		Gradient	Mult. Reflection		
				Day	Evening	Night	DTV	Str.class.	M			p (%)			Auto	Truck	Dist.	Dstro	Type		Drefl	Hbuild	Dist.
				(dBA)	(dBA)	(dBA)			Day	Evening	Night	Day	Evening	Night	(mph)	(mph)		(dB)		(%)	(dB)	(ft)	(ft)

RoadsGeo

Name	Height				Coordinates				Dist	LSlope
	Begin		End		x	y	z	Ground	(ft)	(%)
	(ft)		(ft)		(ft)	(ft)	(ft)	(ft)		