

ENVIRONMENT | PLANNING | DEVELOPMENT SOLUTIONS, INC.

Date: September 20, 2022
Prepared by: Meghan Macias, TE
To: City of San Bernardino
Public Works Department
Site: 5705 Industrial Parkway
EPD Project Number 22-064
Subject: Vehicle Miles Traveled (VMT) Analysis



This memo evaluates the potential vehicle miles traveled for the 5705 Industrial Parkway project located in the City of San Bernardino. The project is located approximately one half mile southeast of the I-215 ramps at Palm Avenue, which provides regional access to the site. The project site is on the southwest side of the I-215 and is located on the northeast side of Industrial Parkway. The project would subdivide the existing site into two parcels. Parcel one would be roughly 6.9 acres and would be developed into a 105,500 SF industrial warehouse building, and parcel two, which is not a part of the project site and this VMT analysis, would continue to house the existing land use. The project site plan is shown in Figure 1. This memo provides a Vehicle Miles Traveled (VMT) analysis based on the requirements of the City of San Bernardino TIA Guidelines, August 2020.

Background

Senate Bill (SB) 743 was signed by Governor Brown in 2013 and required the Governor's Office of Planning and Research (OPR) to amend the CEQA Guidelines to provide an alternative to LOS for evaluating Transportation impacts. SB743 specified that the new criteria should promote the reduction of greenhouse gas emissions, the development of multimodal transportation networks and a diversity of land uses. The bill also specified that delay-based level of service could no longer be considered an indicator of a significant impact on the environment. In response, Section 15064.3 was added to the CEQA Guidelines beginning January 1, 2019. Section 15064.3 - Determining the Significance of Transportation Impacts states that Vehicle Miles Traveled (VMT) is the most appropriate measure of transportation impacts and provides lead agencies with the discretion to choose the most appropriate methodology and thresholds for evaluating VMT. Section 15064.3(c) states that the provisions of the section shall apply statewide beginning on July 1, 2020.

VMT Screening Analysis

The project is located in the City of San Bernardino. The City has adopted guidelines for preparation of VMT analyses¹. The City's TIA Guidelines provide criteria for projects that would be considered to have a less-than significant impact on VMT and therefore could be screened out from further analysis. If a project meets one of the following criteria, then the VMT impact of the project is considered less-than significant and no further analysis of VMT would be required:

1. The project is located within a Transit Priority Area (TPA).
2. The project is located in a low VMT generating area.
3. Project Type - the project is a local-serving land use or generates less than 110 daily vehicle trips.

¹ City of San Bernardino, *Traffic Impact Analysis Guidelines*, August 2020.

The applicability of each criterion to the proposed project is discussed below.

Screening Criteria 1 - Transit Priority Area Screening: According to the City's guidelines, projects located in a TPA may be presumed to have a less than significant impact. The project is fully located in a TPA; as it is within a half mile radius of the transit center located at Kendall Drive and Palm Avenue. The TPA screening using the SBCTA VMT Screening Tool is shown in Figure 2. The transit center is served by the Omnitrans sbX Green Line and Omnitrans Route 2. The sbX Green Line provides service every 20 to 30 minutes and serves California State University San Bernardino, Loma Linda University Medical Center and the VA Hospital. The sbX Green Line will also connect with Arrow Rail. Route 2 provides service every 75 minutes and connects with Metrolink and sbX and will connect with Arrow Rail as well. Based on the project's proximity to a major transit station, the project is presumed to have a less than significant impact on VMT and would satisfy the requirement of Screening Criteria 1.

Screening Criteria 2 - Low VMT Area Screening: The City's guidelines include a screening threshold for residential and office projects located in a low VMT generating area. This threshold also applies to other employment-related and mixed-use land use projects that could reasonably be expected to generate VMT per resident, worker or service population that is similar to the existing land uses. Low VMT generating area is defined as traffic analysis zones with a total daily VMT/Service Population (employment plus population) that is less than the current Citywide VMT per Service Population. The project zone was evaluated using the SBCTA VMT Screening Tool. According to the screening tool (see Figure 3), Project Zone 53747201 has a VMT/Service Population of 60.1 and the Citywide VMT/Service Population is 30.1. Therefore, the Project Zone is not considered a low VMT area and would not satisfy the requirements of Screening Criteria 2.

Screening Criteria 3 – Project Type Screening: This criterion would apply to land uses that are considered local serving, as well as projects that generate less than 110 daily vehicle trips. The project is not considered a local serving use. The project trip generation was evaluated using trip rates from the Institute of Transportation Engineers (ITE) *Trip Generation*, 11th Edition (2021). The project was analyzed using Land Use Code 110 – General Light Industrial. The project trip generation is shown in Table 1. Because the project would generate 180 daily trips without conversion to PCE trips, which is more than 110 daily trips, the project would not meet Screening Criteria 3.

Because the project would meet Screening Criteria 1 – TPA Screening, the project's impact on VMT would be considered less than significant and a further analysis of VMT would not be required.

If you have any questions, please feel free to contact me at meghan@epdsolutions.com or at (949) 794-1186.

Table 1: Project Trip Generation

Land Use	Units	Daily	AM Peak Hour			PM Peak Hour			
			In	Out	Total	In	Out	Total	
<u>Trip Rates</u>									
Warehouse ¹	TSF	1.71	0.13	0.04	0.17	0.05	0.13	0.18	
<u>Proposed Project Trip Generation</u>									
Industrial Warehouse	105.50 TSF	180	14	4	18	5	14	19	
<u>Vehicle Mix</u> ²									
	Percent ²								
Passenger Vehicles	72.50%	130.79	10.01	2.99	13.00	3.85	9.91	13.77	
2-Axle truck	4.60%	8.30	0.64	0.19	0.83	0.24	0.63	0.87	
3-Axle truck	5.70%	10.28	0.79	0.24	1.02	0.30	0.78	1.08	
4+-Axle Trucks	17.20%	31.03	2.38	0.71	3.08	0.91	2.35	3.27	
	100%	180.41	13.81	4.13	17.94	5.32	13.67	18.99	
<u>Proposed PCE Trip Generation</u> ³									
	PCE Factor								
Passenger Vehicles	1.0	131	11	3	14	4	10	14	
2-Axle truck	2.0	17	2	1	3	1	2	3	
3-Axle truck	2.5	26	2	1	3	1	2	3	
4+-Axle Trucks	3.0	94	8	3	11	3	8	11	
Project PCE Trip Generation		268	23	8	31	9	22	31	

TFS = Thousand Square Feet

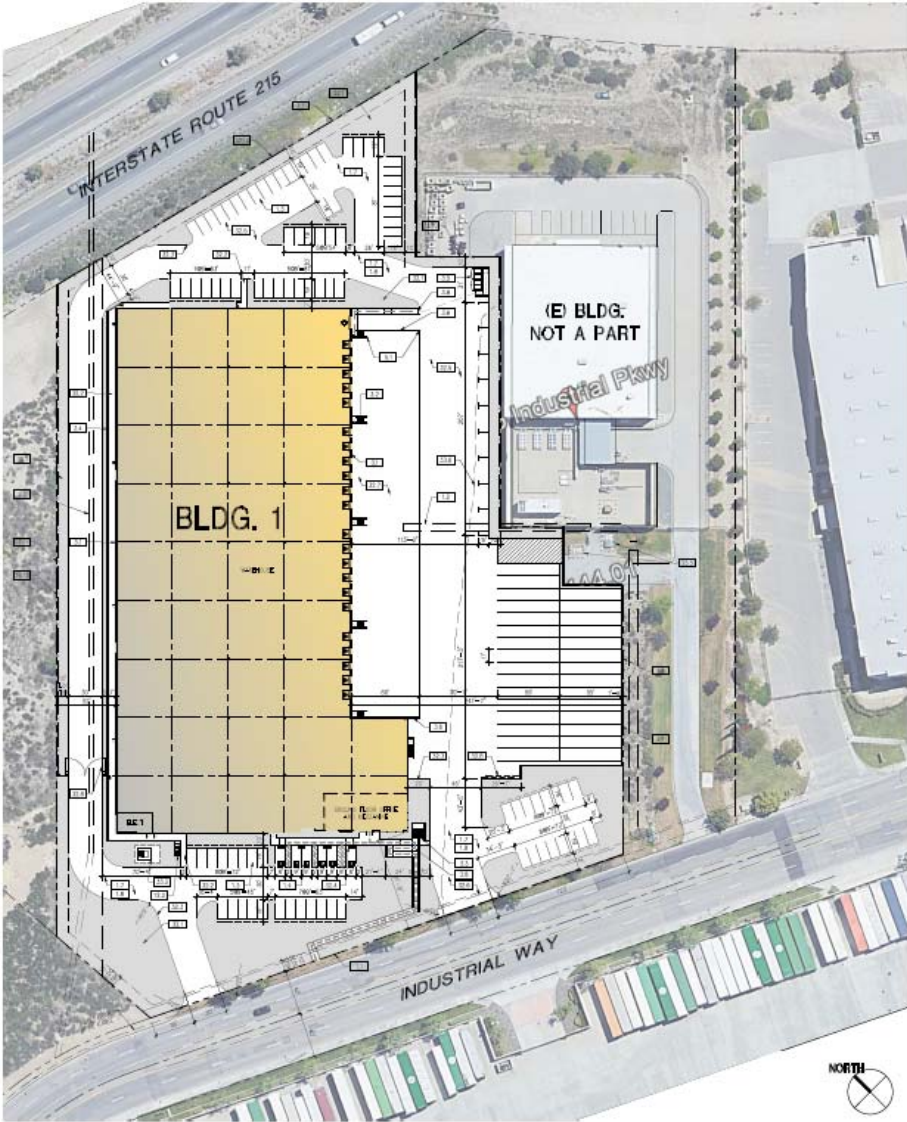
PCE = Passenger Car Equivalent

¹ Trip rates from the Institute of Transportation Engineers, Trip Generation, 11th Edition, 2021. Land Use Code 150 - Warehouse.

² Vehicle Mix from the AQMD Warehouse Truck Trip Study, 2014. Without Cold Storage.

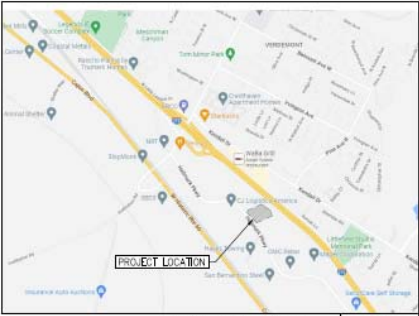
³ Passenger Car Equivalent (PCE) factors from the San Bernardino County CMP, Appendix B - Guidelines for CMP Traffic Impact Analysis Reports in San Bernardino County, 2016

Figure 1: Conceptual Site Plan



SITE AREA	SF	ACRES
	303,035	6.96
BUILDING AREA		
Ground Floor Office	2,500	
Warehouse	100,500	
Total Building Footprint	103,000	
Mezzanine	2,500	
TOTAL BUILDING AREA	105,500	
COVERAGE (75% max)	34.0%	
FAR	34.8%	
PARKING REQUIRED		
Office		
0 - 2,000 sf	1/200	0
2,001 - 7,500 sf	1/250	20
Industrial / Warehousing		
0 - 3,000 sf	1/250	0
3,001 - 5,000 sf	1/500	0
5,001 - 10,000 sf	1/750	0
10,001 - 50,000 sf	1/1000	0
50,001 sf +	1/1250	80
TOTAL PARKING REQUIRED		100
PARKING PROVIDED		104
PARKING RATIO		1.00/1000
DOCK DOORS		22
GRADE DOORS		1
TRAILER STALLS		30
LANDSCAPE		
	%	Area (S.F.)
Paved Surface Area		144,195
Required (15% of paved surface)	15.0%	21,629
Provided	35.2%	50,773

PROJECT TABULATIONS | 4



VICINITY MAP | 2



AERIAL MAP | 1

Source: G|A|A Architects

Figure 2: Project Zone VMT Screening (Transit Priority Area)

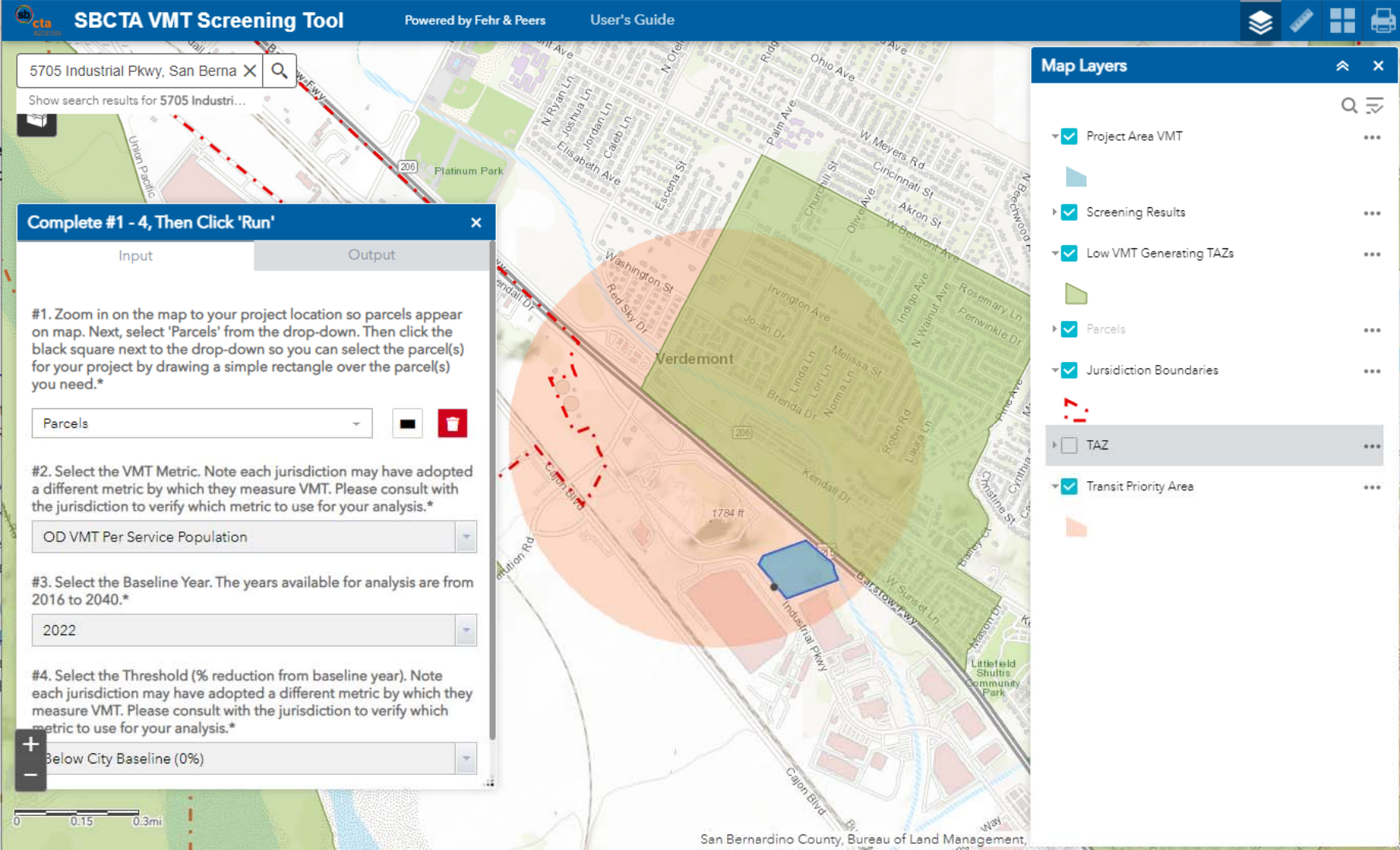


Figure 3: Project Zone VMT Screening (Low VMT Area)

The screenshot displays the SBCTA VMT Screening Tool interface. At the top, the header includes the SBCTA logo, the title "SBCTA VMT Screening Tool", and the text "Powered by Fehr & Peers" and "User's Guide". Below the header is a search bar with the placeholder text "Find address or place" and a magnifying glass icon. The main area shows an aerial map with a project zone highlighted in light blue. A blue dialog box is overlaid on the map, containing the following text and controls:

Complete #1 - 4, Then Click 'Run' [Close icon]

VMT. Please consult with the jurisdiction to verify which metric to use for your analysis.*

OD VMT Per Service Population [Dropdown arrow]

#3. Select the Baseline Year. The years available for analysis are from 2016 to 2040.*

2022 [Dropdown arrow]

#4. Select the Threshold (% reduction from baseline year). Note each jurisdiction may have adopted a different metric by which they measure VMT. Please consult with the jurisdiction to verify which metric to use for your analysis.*

Below City Baseline (0%) [Dropdown arrow]

[Help link] [Run button]

A "Project Area VMT (2 of 2)" popup window is also visible, displaying the following data:

Assessor Parcel Number (APN)	026604174
Traffic Analysis Zone (TAZ)	53747201
TAZ VMT	60.1
Jurisdiction VMT	30.1
% Difference	99.88%
VMT Metric	OD VMT Per Service Population
Threshold	30.1

[Zoom to link] [More options icon]