



July 22, 2021

Mr. Trent Sanson  
DeNova Homes, Inc.  
1500 Willow Pass Court  
Concord, CA 94520

## **Potential VMT Reductions from Transportation Demand Management Measures for the 19910 5<sup>th</sup> Street West Project**

Dear Mr. Sanson;

As requested, W-Trans has prepared the following assessment of potential reductions in Vehicle Miles Traveled (VMT) associated with Transportation Demand Management (TDM) measures that could be implemented at the proposed residential development at 19910 5<sup>th</sup> Street West in the City of Sonoma.

Based on a preliminary review of the project characteristics, its location, and the project's estimated VMT based on the Sonoma County Transportation Authority's travel demand model, the proposed project is anticipated to have a significant VMT impact under the California Environmental Quality Act (CEQA). To fall below the applied significance threshold, which was assumed to be 15 percent below the citywide per capita VMT, the project VMT would need to be reduced by 10.1 percent.

The project characteristics were evaluated, as were potential TDM measures and their respective VMT reductions based on the methodology included in the California Air Pollution Officers Association (CAPCOA) report *Quantifying Greenhouse Gas Mitigation Measures*, CAPCOA, 2010. The analysis below concludes that with the implementation of these TDM measures, project VMT could be reduced below the significance threshold.

### **Project Characteristics**

The project as proposed includes 15 residential units on a 1.51-acre parcel. Based on the CAPCOA report estimates, VMT for a project of this density can be assumed to be reduced compared to a typical suburban residential development. Based on the proposed density, project VMT would be reduced by 2.1 percent.

Inclusion of affordable housing in a project can also reduce VMT. The project is proposed to include three below-market-rate units – one unit each for residents at median, moderate, and low incomes. Census data shows that lower-income residents have lower rates of vehicle ownership and VMT reductions can be applied based on the type of housing provided. Applying the assumptions used in the CAPCOA model, project VMT is estimated to be reduced by 0.8 percent due to the inclusion of affordable housing.

After applying the VMT reductions associated with the project characteristics, an additional 7.2 percent reduction is needed to bring the project VMT to a level below the applied significance threshold.

### **Transportation Demand Management (TDM) Measures**

Several TDM measures were identified as appropriate for the proposed project and were evaluated to estimate the potential to further reduce project VMT.

#### **Transit Subsidy**

Providing monthly transit subsidies would be a viable VMT reduction measure as the site is served by nearby Sonoma County Transit (SCT) stops. VMT reductions were calculated according to the subsidy amount and assuming that every working adult would be provided the subsidy. A mechanism would need to be established to fund and distribute the subsidies in perpetuity (or potentially for a set timeframe specified by the City); this

could possibly be overseen by the Homeowners Association (HOA). Passes would be paid for through increased HOA fees and are estimated to reduce VMT by 4.4 percent.

### **Commuter Trip Reduction Marketing Program**

Residents could be provided with a welcome packet containing relevant transportation information. The packet could include information for the Go Sonoma program, which provides links to information related to transit, bicycling, walking, carpools, and vanpools. Printed materials including transit maps for SCT bus service and Sonoma County bicycle maps could also be provided. The packet should also include information about the Sonoma County Transportation Authority's Emergency Ride Home program, which covers the cost of a ride home for users of alternative transportation in emergencies, such as caring for a sick child. The implementation of an ongoing marketing program would reduce VMT by an estimated 0.9 percent.

### **School Pool Matching Program**

Residential uses generate VMT associated with school pick-up and drop-off trips. A school pool program seeks to match families in carpools for these trips, thereby reducing school-related VMT. Such a program could be overseen by the HOA or potentially outsourced to a company that manages TDM programs. Given the size of the proposed development, this measure would be expected to provide a limited VMT reduction. However, since the project is located adjacent to a substantial number of residential sites, a school pool matching program designed to connect project residents with others in the neighborhood would be expected to substantially increase participation. This expanded program is estimated to reduce project VMT by 0.8 percent.

### **Ride Matching**

Similar to the school pool matching program described above, a rideshare matching service for residents would modestly reduce VMT. Whether administered through the HOA or outsourced, the coordinator would oversee the program and direct residents (including future residents as they move to the development) to ridesharing services such as MTC's 511 "Merge" program. Ridesharing works well for out-of-town commute trips but can also involve shorter trips. Peer-to-peer carsharing within the development could augment this program to further expand user options. Provision of a rideshare coordinator would be expected to reduce commute VMT by approximately 1.1 percent.

### **Effectiveness of Combined Measures**

The project characteristics, in combination with the above-described TDM measures, could reduce project VMT at the proposed 19910 5<sup>th</sup> Street West development by an estimated 10.1 percent, as summarized in Table 1.

**Table 1 – Summary of Potential TDM Measures**

| <b>Project Characteristic/<br/>TDM Measure</b>                         | <b>Description</b>  | <b>Estimated VMT<br/>Reduction</b> |
|--|---|------------------------------------|
| <i>Density</i>   | <i>Project density compared with average suburban units/acre</i>  | -2.1%                              |
| <i>Affordable Housing</i>  | <i>Share of units below market rate</i>   | -0.8%                              |
| <i>Transit Subsidy</i>   | <i>Transit subsidies made available for every working adult in the development</i>  | -4.4%                              |
| <i>Commuter Trip Reduction<br/>Marketing</i>                           | <i>Coordinator to provide information about regional, county, city, and local programs for various transportation modes</i> | -0.9%                              |
| <i>School Pool Matching</i>  | <i>Coordinator to implement school pool program that matches families in carpools for school pick-up and drop-off</i>       | -0.8%                              |
| <i>Rideshare Matching</i>  | <i>Coordinator to oversee and encourage resident use of rideshare matching services</i>                                     | -1.1%                              |
| <b>Total VMT Reductions</b>  |   | <b>10.1%</b>                       |
| <i>VMT Reduction Required to Achieve 15% Below Citywide per Capita</i> |   | <i>10.1%</i>                       |

Based on this analysis, the project's estimated per capita VMT could be reduced to 15 percent below the citywide per capita VMT. Therefore, when evaluated for transportation impacts under CEQA, the project-related VMT would be expected to have a less-than-significant impact.

Thank you for giving W-Trans the opportunity to provide these services. Please call if you have any questions.  
Sincerely,



Barry Bergman, AICP  
Senior Planner



Brian Canepa, TDM-CP  
Principal