



MODERNIZING TRANSPORTATION IMPACTS ANALYSIS UNDER CEQA

The purpose of CEQA is to protect and enhance environment quality. DPH believes that neither Auto LOS nor any other available measure of roadway capacity or motor vehicle mobility provide us an appropriate measure of environmental quality as defined by CEQA regulations (CCR §15382). While there is a long history of congestion measurement in CEQA practice and deference to past practice in case law, DPH is not aware of a State statutory or regulatory requirement that prevents San Francisco from modernizing its approach based on a public process and supportive evidence.

Overall, San Francisco's approach to the assessment of transportation related environmental impacts should reflect its transportation policies and the best available evidence on the nexus between transportation and environmental quality. Substantial evidence demonstrates that measuring and valuing residual roadway capacity or motor vehicle mobility contribute directly to poor environmental quality by privileging motor-vehicle transport and speed over non-motorized and public transit transportation alternatives. The valuation of vehicle mobility harms environmental quality and environmental health when environmental review allows traffic to increase un-checked up to road capacity; when capacity enhancing projects and mitigations reduce congestion and stimulate driving; and when vehicle mobility measures create roadblocks to environmentally beneficial projects such as bike lanes and infill housing.

Auto trips generated (ATG) could be a valid measure to link projects' effects on transportation with adverse impacts on environmental quality. ATG captures increases in vehicle volume, and vehicle volume increases predict air pollutant emission, community noise levels, pedestrian injury collisions, and other domains of environmental quality including neighborhood livability.

To be consistent with the logic of the ATG—Environmental Quality nexus, CEQA thresholds for transportation should be based on the negative impacts of ATG and traffic volume on environmental quality, public health and safety. The USEPA has developed or endorsed tools to model the impacts of traffic volume changes on air quality and noise, and health authorities have health-based standards for these environmental attributes. SFDPH has also developed a quantitative tool to associate vehicle volume with pedestrian hazards. Furthermore, it is possible to rapidly develop a relationship between vehicle volume and neighborhood livability using ordinary survey methods. Environmental quality impacts related to traffic are associated with both absolute and relative differences in vehicle volume. Because some parts of the City are already heavily impacted by the negative environmental quality impacts of traffic, both absolute and relative thresholds are required. This approach would be logically consistent with the ATG-Environmental Quality nexus, not create obstacles to projects like the Bike Plan that enhance non-motorized transportation use, and would be consistent with other environmental quality measures in CEQA. **To compliment the consideration of vehicle impacts in environmental review, the city should also develop measures for bicycle and pedestrian environmental quality.**

DPH does not believe that the threshold of significance for ATG should be based on either auto LOS, as current practice, or other congestion-based metrics for the following reasons:

- Congestion-based measures do not reflect a substantial part of the Transportation—Environmental Quality nexus, but are instead historic traffic engineering metrics for motor vehicle mobility.
- Projects not generating auto trips, such as bike lanes, can impact on congestion-based measures which value motor vehicle mobility potentially at the expense of non-motorized transportation modes.
- Congestion-based measures allow traffic volumes to increase on city roadways up to the defined congestion threshold. The permitted increase in traffic volume would have adverse environmental impacts.

May 2008