

**Meng, Y. and D. Niemeier (1998) Project level carbon monoxide hot-spots analysis for level of service D intersections, Transportation Research Record, No. 1641, Transportation Research Board, Wash DC**

This study explores the effectiveness of the LOS D criterion as a screening tool for identifying potential CO hotspots. We find that LOS is a poor predictor of potential CO hotspots when compared to results generated with the EPA-recommended microscale model CAL3QHCr. To more consistently screen out those intersections that will not be identified as CO hotspots using the microscale models, a new criterion, equivalent red-time vehicles (ERTV), is introduced. The modeling results using ERTV suggest that it is a more robust measure for identifying potential CO hotspots and, conversely, screening out those intersections that are not likely to be identified as hotspots using micro-scale simulation results.