



## **Twin Cities Ramp Meter Evaluation**

# final report

*prepared for*

**Minnesota Department of Transportation  
Pursuant to Laws 2000: Chapter 479, HF2891**

*prepared by*

**Cambridge Systematics, Inc.**

*with*

**SRF Consulting Group, Inc.  
N.K. Friedrichs Consulting, Inc.**

*February 1, 2001*

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Cambridge Systematics, Inc.  
1300 Clay Street, Suite 1010  
Oakland, California 94612

*February 1, 2001*

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**Minnesota Department of Transportation**

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**Transportation Building**  
395 John Ireland Boulevard  
St. Paul, Minnesota 55155-1899

February 1, 2001

Pursuant to the Laws 2000, Chapter 479, HF2891, I am pleased to submit the final report of the Ramp Meter Shutdown Study.

This report details the results of a study on the traffic flow and safety impacts of ramp metering, and it meets the legally mandated deadline of February 1, 2001. It is the result of a study that was conducted in an independent and objective manner by a nationally recognized consultant team at a cost of \$651,600. The study served two important public purposes:

- 1) It thoroughly documented the benefits resulting from ramp metering to traffic operations and related factors such as air quality in the Twin Cities metro region. Analysis of field data indicates that ramp metering is a cost-effective investment of public funds for the Twin Cities area,
- 2) It demonstrated the need for Mn/DOT to adjust its approach to ramp metering in a way that will optimize benefits while conforming to public expectations. Analysis of market research data shows that a clear majority of users of the Twin Cities metro region highways support continued operation of ramp meters as a congestion management tool in some modified form.

The combination of these two factors point towards the adoption of an overriding principle regarding the operation of ramp meters in the Twin Cities. This principle would seek to "balance the efficiency of moving as much traffic during the rush hours as possible, consistent with safety concerns and public consensus regarding queue length at ramp meters."

Mn/DOT remains committed to continued evaluation and experimentation with the ramp metering system, in close consultation with concerned stakeholders and the public. We also remain committed to strategically addressing issues of growth, congestion, capacity expansion and transportation choice in the metro region. Ramp meters alone are neither the only problem nor the only solution to these major issues.

It has been my pleasure to work with the Legislature, Advisory and Technical Committees, the consulting team, and managers and staff throughout Mn/DOT on this important and timely study. I am satisfied that it meets the goal of the legislation, which was to evaluate and report any relevant facts, comparisons, or statistics concerning traffic flow and safety impacts associated with deactivating system ramp meters for a predetermined amount of time.

Sincerely,

A handwritten signature in blue ink, appearing to read "Elwyn Tinklenberg".

Elwyn Tinklenberg  
Commissioner