

NCITE Geometric Design Committee

06/21/2018 Meeting Minutes

8:30 AM – 10:30 AM

**Location: HR Green, Inc.
2550 University Avenue W., Suite 400N
St. Paul, MN 55114**

**Committee Chair:
Tom Jantscher, HR Green, Inc.
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**Committee Co-Chair:
(vacant)**

Meeting Agenda:

- I. Introductions**
- II. Presentation. See meeting notes on next page.**
 - a. MnDOT's Congestion Management Safety Plan, By: Paul Morris, SRF Consulting Group, Inc., and team**
- III. Brief items regarding Co-Chair opportunity and need for upcoming meeting topics**
- IV. Next Meeting: Thurs., August 30, 8:30 am – 10:00 am, Jim Rosenow, MnDOT Flexibility Design Engineer, AASHTO Green Book 7th Ed. updates**

Meeting notes:

- Purpose of Congestion Management Safety Plan (CMSP):
 - o Dollars programmed for low-cost, high-benefit improvements, targeting high-priority problem locations
- Currently in Phase 4 of CMSP:
 - o Phase 1 was in 2007 and was more of a study, involving 136 projects with 19 recommendations
 - o Phase 2 was in 2009 and built on Phase 1
 - o Phase 3 was in 2011 and built on Phase 2
- Phase 4:
 - o Involved a review of Phases 1 – 3 (what worked well, where was the benefit less than anticipated/hoped)
 - o Opportunity list was updated to include non-freeways
 - o This is more “pre-scoping” to get additional detail and specify a purpose, before committing it to the program
- CMSP process involves developing 1) problem statement, 2) screening, 3) developing project cost estimates, and 4) calculating a Return Period
- Involved the following system performance measures: congestion, travel time reliability, and crash density (the inaccuracy of the reporting of incident location was accounted for)
 - o Graphing congestion vs. reliability helped identify sites and trends
- Primary screening involved the single congestion problem that propagates upstream and is responsible for an area/length of congestion
 - o Congestion, reliability, and cost information is converted to cost
 - o Pool of 465 locations at a total of \$913M
 - Includes locations where other studies and additional work is being done
 - o Screened down to 68 locations, including all different facility types
- Concept development involved Design Charrettes
 - o (Two sample Design Charrettes were done and discussed with mtg. attendees)
 - o Charrettes resulted in 101 solutions for the 68 locations
- Each location was looked at in more detail to estimate project construction and delivery costs
 - o Notable items include overhead signs, noise walls (\$2.4M/wall average), subsurface items, and drainage features
- Each location had a Return Period calculated, then ranking them determined which projects to program funding for
 - o Resulted in 52 locations with a desirable Return Period