AASHTO
Standing Winter Maintenance Policy Coordinating Committee
(WMPCC)

MINUTES OF MEETING
October 22-23, 1998
Airport Hilton Hotel
Minneapolis, Minnesota

Attendees and participants:

Committee Members:
Patrick Hughes, Minnesota DOT Chairman
Larry Frevert, Kansas City, MO, Department of Public Works APWA
Dave Gravenkamp, Siskiyou County, CA Department of Public Works NACE
Clayton Sullivan, Idaho Transportation Dept.
Rick Nelson, Nevada DOT
John Blacker, Montana DOT

AASHTO Staff:
Ken Kobetsky
Rod Pletan

Guests:
Don Steinke, FHWA
Don Harriott, Consultant
Mark Wikelius, Minnesota DOT

I. Call to Order
   A. Chairman Hughes called the meeting to order at 8:35 a.m. and welcomed the group to Minneapolis.
   B. It was noted that WMPCC Committee Member Lee Smithson (Iowa DOT) would be meeting with the Aurora Group in a nearby meeting room and that the WMPCC would have a joint luncheon meeting with them.
   C. The Chairman announced that Mark Wikelius (Minnesota DOT) would join the WMPCC later to brief the WMPCC on Aurora’s activities.

II. Reports and discussions
   A. Ken Kobetsky gave a brief report during which he discussed the upcoming AASHTO Annual Meeting to be held in Boston at which time the Standing Committee on Highways would receive a report on the activities of the Snow and Ice Cooperative Program (SICOP). Ken said 41 states have contributed to SICOP this year --- along with the contributing memberships of APWA and NACE. He indicated that the new TEA-21 Federal transportation legislation does not provide for some activities previously funded by the FHWA, e.g., the Lead States activities are now underwritten by the individual state highway agencies.

Ken reported that the soon to be published Winter Maintenance Guide had been approved by the Subcommittee on Maintenance and had been distributed to AASHTO members for review and expected approval. He indicated that the Winter Maintenance Guide should be published by March 1999.
B. Don Steinke summarized the reorganization of FHWA as it may affect the purposes of the WMPCC and SICOP, et. al. The FHWA is to be reorganized into five core business units, which are Planning and Environment, Infrastructure, Operations, Motor Carriers, and Federal Lands. Steinke said the funding for the Office of Technology Applications (OTA) had been cut significantly and, moreover, the remaining budget is earmarked for specific purposes and the amount of the remaining funding that would be directed towards winter maintenance interests was yet to be determined. But Steinke was quick to add that he felt the FHWA would continue to support winter maintenance --- but from a “different box”; nevertheless, available funding will be less. Winter maintenance activities will be part of the Operations business unit.

C. Rod Pletan gave a computer-based presentation describing SICOP’s activities. A recent example was a conference call dealing with Automated Vehicle Location (AVL) systems which involved highway maintenance organizations from state highway agencies, county governments, and cities. In the case of this rather “fresh technology”, he wanted to generate a discussion before going forward with deployment, i.e., to learn and share what others are doing to avoid pitfalls.

Rod described his efforts in initiating different roundtable, or “four corners” meetings whereby representatives from three or four states and counties could get together to learn from each other. He said these meetings have been very good for operations-oriented people who don’t often have opportunities to come together and share ideas.

A general discussion about the purposes and goals of SICOP underscored the need to avoid duplication and to leverage all of the available resources to greatest advantage.

D. Rick Nelson discussed the winter maintenance related activities of the Lead States Program. He outlined two deliverables that their group has been developing. First is the web site which is up and running. It includes all of the areas the Lead States are working on --- of which snow and ice control is but one. The web site is at <www.leadstates.tamu.edu>. Wilfred Nixon from the University of Iowa is the gatekeeper. The site is updated every Friday. Second is a marketing plan which will be rolled out at the Transportation Research Board’s Annual Meeting in January 1999. One of the elements of the marketing plan is a video presentation dealing with Road Weather Information Systems (RWIS) and Anti-Icing.

Rick added that the Lead States Program includes four elements directed towards RWIS and Anti-Icing. These elements are training, marketing, benefit/cost analyses, and continued monitoring of research and development. He said they have struggled for nearly a year on trying to develop an appropriate approach to determining benefit/cost ratios for RWIS and Anti-Icing. The group now has plans to canvass highway agencies to learn what methods and approaches have been used in constructing benefit/cost ratios for other maintenance activities.
E. John Blacker described the AASHTO Subcommittee on Maintenance - Winter Maintenance Task Force. John is chairman of the task force. He said there are 13 or 14 state highway agencies that are keenly interested in winter maintenance technology and that the task force members are committed to finding out what other groups and/or organizations exist that are involved in winter maintenance. John acknowledged that there are many such groups, and there seems to be a fairly “tight knit underground” of people who know what’s going on, but many practitioners aren’t “in the know”. John stressed the need for communication saying that some people have lots of information while others aren’t always “in the loop”. Blacker said he wants the Task Force to be a year-round effort --- not just a once-a-year rump session at the annual Subcommittee on Maintenance meeting. He said he believed the Task Force can play a role in overcoming some of this and facilitating coordination of disparate efforts but suggested that the WMTPCC has more clout and can elevate winter maintenance concerns and issues within AASHTO more readily.

F. Mark Wikelius presented information about the Aurora group which is a confederation of organizations interested in encouraging research, evaluation, and deployment of new technology in highway operations. Several of Aurora’s initiatives are concerned with winter maintenance activities. Aurora partners include the FHWA, Swedish National Road Association, Ontario Ministry of Transport, Environment Canada, and the state highway agencies of Iowa, Minnesota, New York, Pennsylvania, South Dakota, Virginia, and Wisconsin. Mark described Aurora’s eight project areas:

- Expert System as a Decision Support
- RWIS Communications Standards
- Automated Low Visibility Detection
- Adaptation of the Local Climatological Model (LCM) into New Areas
- Institutional Issues Identification (RWIS)
- Standardized Weather and Road Condition Presentation
- Meso-Scale Numerical Modeling for Road Networks
- Standardized Testing Methodology

Aurora can be accessed at <http://aurora.prog.org/>.

III. Role of WMTPCC
A. In light of other activities regarding new and emerging issues in winter maintenance on highways the committee discussed the role of the WMTPCC. Several key points were listed to help define the Committee’s role:

1. The WMTPCC is an “umbrella organization.
2. It should identify research needs and propose appropriate research.
3. It should serve as a clearinghouse of information about winter maintenance.
4. It should strive to get best practices into the hands of users.
5. Duplication of effort should be avoided.
6. But make sure that nothing “falls through the cracks.”
7. The WMTPCC should strive to leverage available funding.
An organizational diagram indicating the relationships of the different groups interested in winter maintenance on highways was developed.

**AASHTO Winter Maintenance Program**

![Diagram](image)

WMPPC initiates, receives, and prioritizes needs — and monitors work of other groups. WMPPC maintains and communicates a dynamic list of winter maintenance initiatives.

**IV. WMPPC Membership**

A. The membership of the WMPPC was discussed at some length. Since the WMPPC was formed in 1994 several events have taken place that suggest additions to the membership of the committee. The *Guide for Snow and Ice Control* is about to be published; the 1997 Snow and Ice Control Workshop was held in April 1997; the Lead States Program efforts in RWIS and other snow and ice control functions; and the increasing subscription to SICOP which now includes 41 states plus APWA and NACE. A resolution by the WMPPC was drafted which included a proposed motion to be submitted to the Standing Committee on Highways. It recommends WMPPC membership as follows:

- Chair (AASHTO)
- 4 - AASHTO representatives (one from each of the four AASHTO Regions)
- 1 - American Public Works Association (APWA)
- 1 - National Association of County Engineers (NACE)
- 1 - AASHTO Subcommittee on Maintenance (Safety/Snow & Ice Task Force Chair)
- 1 - AASHTO Lead State Program (RWIS/Anti-Icing Program)
- 1 - Federal Highway Administration (FHWA)
- *1 - Transportation Research Board A3C 09 Winter Maintenance Committee
- * - Other ex-officio members as appropriate and determined by the WMPPC
  (* indicates non-voting member)

The resolution was approved by the committee with allowances for additional editorial corrections as necessary. A copy of the resolution is attached as Appendix 1.
V. Other business

A. Rod Pletan presented a report highlighting his efforts in his capacity as AASHTO Winter Maintenance Engineer. Pletan said his work has been in three areas:

1. State of Practice Workshops
   a. Anti-Icing/RWIS Training
      • Product: Wisconsin’s Generic RWIS Training Program (in PowerPoint)
      • Product: Nevada’s Generic Anti-Icing Training Program (manuals format)
   b. Winter Friction Measurement
      • Product: State of the Practice Report
      • Product: Strategy for future development
   c. Automatic Vehicle Location (AVL)
      • Product: State of the Practice Report
      • Product: Networking of the agencies formerly doing independent R&D

   Rod listed several State of Practice Workshops planned for the future, including:
   d. Public Information Systems;
   e. Outsourcing performance measurements for winter maintenance functions;
   f. Gradation specifications for solid chemicals;
   g. Route optimization systems for plowing and spreading;
   h. Snow drift prevention technologies; and
   I. Automatic call-out systems for mobilizing crews.

2. Snow and Ice Roundtable discussions where operations personnel from 3 or 4 state’s agencies meet near their common borders for a day or day and a half to compare their winter maintenance techniques they use and how they use new technologies.

3. A networking listing of over 300 individuals who are winter maintenance experts or who have an interest in snow and ice control on highways and streets.

B. A summary of the Friction TWG Meeting was presented. One of the outcomes of that meeting was the decision to proceed with the preparation of a problem statement to be submitted to NCHRP for possible funding for the preparation of a state of the art and practice report on current international uses of friction measurements on winter roadway/runway surfaces.

Motion: It was moved, seconded and carried that the WMPCC go on record supporting the problem statement as submitted.

C. A summary of the AVL Conference Call Meeting was presented wherein it was noted that the automated vehicle location technology is ready for implementation and it is being installed in several places, but for different reasons.
D. A listing of SICOP-initiated and other winter maintenance items on which action is pending was discussed. The list included:
  - Solid chemical gradation specifications;
  - Plow and spreader route optimization;
  - Road closing technologies;
  - Drift prevention;
  - Performance measures for both in-house and outsourced functions;
  - Automated call-out procedures;
  - Meso scale forecasting;
  - Travel information systems - especially pavement conditions;
  - Winter driving module for Drivers’ Education programs; and
  - Public information video for TV dealing with winter driving techniques.

It was noted that the list of topics needs to be dynamic and it should reflect those issues and problems identified during scanning tours, e.g., Scan II must have picked up some new items, and any new items or topics that are identified should be brought back to the WMPCC at their next meeting.

E. Next meeting: Larry Frevert said that Kansas City would host the next meeting of the Committee. February 1999 was suggested.

VI. Adjournment

The meeting was adjourned at 11:30 a.m. on Friday, October 23, 1998.