1 Traffic Sign Maintenance/Management and Sign Retroreflectivity Training

2 MnDOT’s Minnesota Snowplow and Safety Simulator Training for Local Agencies

Hosted by Minnesota Local Technical Assistance Program (LTAP), Center for Transportation Studies, University of Minnesota. Sponsored by Minnesota Local Road Research Board (LRRB) and Federal Highway Administration (FHWA). Facilitated by the College of Continuing Education, University of Minnesota.
Traffic Sign Maintenance/Management and Sign Retroreflectivity Training

October 11, 2016, Douglas County Public Works, 526 Willow Drive, Alexandria, MN 56308
October 18, 2016, Crow Wing County Highway Department, 16589 County Road 142, Brainerd, MN
October 25, 2016, Olmsted County Public Works Service Center, 1188 50th Street SE, Rochester, MN

Registration begins at 8:30 a.m. Workshop is scheduled from 9:00 a.m. to 3:30 p.m.

Workshop Description
This workshop will provide participants with an overview of sign retroreflectivity assessment and management methods, as well as developing a sign inventory and understanding the crashworthiness of sign posts. Participants will learn about federal regulations, various sheeting materials, and how to determine the right assessment and management method for their agency. Also, learn how to conduct the various sign retroreflectivity assessment and management methods, including nighttime inspection. Participants are encouraged to bring in a used sign to test in the class.

Topics Covered
- How federal sign retroreflectivity regulations apply to you
- Various methods to meet these regulations
- Crashworthiness of sign posts
- Conducting various assessment and management methods on your own signs with confidence
- How to decide which method is best suited for you and your agency

Who Should Attend
This training is designed for county, city, and township sign maintenance and management staff.

Workshop Instructors
Kenneth Schroepfer is a transportation program specialist in the Minnesota Department of Transportation’s Office of Maintenance. He has more than 40 years of experience in traffic engineering at MnDOT’s Office of Traffic, Safety and Technology. This includes 35 years working on highway sign design, traffic standards and manuals, and delivering numerous presentations on sign retroreflectivity. Since retiring in 2014, he has worked in the state sign shop, where his responsibilities have included helping develop the Plural Component (Epoxy) Striping Training Manual and assisting in the fabrication of highway signs.

Sulmaan Khan, PE, is a senior engineer in the Minnesota Department of Transportation’s State Aid Office. He has worked at MnDOT for the last 10 years, including time as a student worker, a rotating graduate engineer, and his current position in State Aid.
Sulmaan’s role in State Aid is focused on working with local government agencies on traffic safety-related programs and initiatives with a goal of reducing fatal and serious injury crashes on local roadway systems.

**Registration and Fees**
The registration fee includes lunch, coffee breaks, and program materials. A refund of the registration fee, minus a $30 cancellation fee, will be made if cancellation is received five working days prior to the workshop. Disability accommodations are available upon request.

**Professional Development Hours** (6.0 PDHs)

**Roads Scholar Program** (1.0 Required)

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**MnDOT’S Minnesota Snowplow and Safety Simulator Training for Local Agencies**

**October 24–28, 2016,** MnDOT Training and Conference Center, 1900 West County Road I, Arden Hills, MN 55126

10 Sessions – 4 students per session

*Morning session:* 7:00–11:00 a.m.

*Afternoon session:* 11:30 a.m.–3:30 p.m.

**Workshop Description**

Jet pilots use simulator training to gain exposure to the unexpected. The result is a well-trained pilot who can anticipate hazardous situations and react in the safest possible manner to extreme conditions. Snowplow and Safety Simulator Training uses state-of-the-art technology to prepare snowplow drivers to expect the unexpected and deal with the challenges of adverse winter driving and road conditions. The simulator provides attendees with a basic plow cab control system with everything from a 15-speed max manual transmission to an automatic transmission. The plow and wing are operated with a touch screen. Like a real plow, the simulator has a steering wheel, fans, horn, turn indicators, mirror and seat adjustments, interactive dashboard, and other controls. The steering wheel is responsive and the sounds are realistic. The view screen gives a 180-degree view with realistic graphics.

Trainers use the snowplow simulator to create an unlimited combination of hazardous situations involving weather, traffic, and road conditions that a driver may rarely encounter in the real world. This prepares the snowplow driver to handle potentially
dangerous situations without being involved in an actual accident. The training, which is tailored to local agencies, will consist of a four-hour class divided into three parts: a PowerPoint presentation, a self-paced computer-based training, and simulator driving performance.

Training Benefits
Snowplow and Safety Simulator Training provides a safe environment in which students can experience hazardous weather conditions, varied road conditions, heavy vehicle and pedestrian traffic, and difficult maneuvering. The simulator also provides training in an off-the-road setting, which reduces insurance, training, and fuel costs; fleet maintenance; liability exposure; and vehicle damage. Other benefits include:

- Ability to evaluate performance after each simulation
- Decision-making skills are challenged in a safe environment
- Ability to practice maneuvers repeatedly until mastered
- Training is standardized, so each attendee can learn the same techniques in a controlled environment

Success of the simulator training has been proven by studies done by the Ohio and Iowa Departments of Transportation, Iowa State University, and the San Antonio, Texas, and West Covina, California, police departments. A study done by the University of Utah found that simulator training significantly reduced the severity and number of accidents.

Who Should Attend
All snowplow drivers, regardless of years of experience, can benefit from training in the simulator. This includes anyone who has snowplowing as part of their position description or who plows as a seasonal or temporary driver.

Registration and Fees
The registration fee includes program materials. A refund of the registration fee, minus a $30 cancellation fee, will be made if cancellation is received five working days prior to the workshop. Disability accommodations are available upon request.

Professional Development Hours (4.0 PDHs)
Roads Scholar Program (0.5 Elective)
Registration Form

Name (Last)* (First)*

Employer / Organization* Title

Address*

City* State* ZIP Code*

E-mail*

Telephone Fax

*Information in the section above is private data. Items marked by an asterisk (*) are required for identification and to establish your student record. Information is shared with the registrar’s office, your instructor, and other University offices for the purposes of record keeping, affirmative action, and reporting.

1 Traffic Sign Maintenance/Management and Sign Retroreflectivity Training (ENGR X529)

(Please select location) (Please select fee)

___October 11, Alexandria - (001) $60 Township and Tribal representatives

___October 18, Brainerd - (002) $70 City, County, State, and Federal representatives

___October 25, Rochester - (003) $150 All others

Register online (credit card only): mnltap.umn.edu/trafficsignmaintenance

2 MnDOT’S Minnesota Snowplow and Safety Simulator Training for Local Agencies (ENGR X530)

Location: MnDOT Training and Conference Center, 1900 W. County Road I, Arden Hills, MN

___First Time Driver

___October 24, a.m. - (001)

___October 25, a.m. - (003)

___October 26, a.m. - (005)

___October 27, a.m. - (007)

___October 28, a.m. - (009) Fee: $100

___Returning Driver

___October 24, p.m. - (002)

___October 25, p.m. - (004)

___October 26, p.m. - (006)

___October 27, p.m. - (008)

___October 28, p.m. - (010)

Register online (credit card only): mnltap.umn.edu/snowplow

If your check is returned because of insufficient funds or closed account, or because you have made a stop payment request, you will be charged a check handling fee of $20.

Method of Payment (please check one)

☐ Enclosed is a check or money order payable to University of Minnesota.

☐ Enclosed is a purchase order or letter of authorization to bill my employer.

☐ Charge to: ☐ Visa ☐ MasterCard ☐ Discover ☐ AMEX

Account number Expiration date

Name as printed on card Signature

Register by fax: 612-624-5359

Register by mail:
CCE Registration Center
University of Minnesota
353 Ruttan Hall
1994 Buford Avenue
St. Paul, MN 55108

If your check is returned because of insufficient funds or closed account, or because you have made a stop payment request, you will be charged a check handling fee of $20.