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# CENTER FOR TRANSPORTATION STUDIES AUGUST REPORT

A monthly report on transportation research, education and technology transfer activities at the University of Minnesota

#### FIRST MONTHLY REPORT

The activities at the Center for Transportation Studies have now reached a level where regular communication is a high priority. This report is the first of a monthly series that will be sent to the various transportation organizations, interest groups, elected officials, and individuals on the Center's mailing list. Its purpose is to briefly communicate transportation activities happening at the University, either at the Center or in the various University departments involved in transportation. Names and references will be given to help you find additional information. Other communication efforts, as described below, will provide more in-depth information in the future.

#### ESTABLISHMENT OF THE CENTER

The Institute of Technology at the University established the Center for Transportation Studies with funding provided by Governor Perpich from Exxon oil overcharge funds. The Center began its activities in early 1987, when Richard Braun assumed the role of director. Since that time, the Center has worked with an interim advisory committee to help define its mission and has begun working with faculty on research efforts. It has also obtained offices on the east bank of the Twin Cities campus, which were made available by the Civil and Mineral Engineering Department. Recently, the Center completed its current staffing efforts. In addition to Dick Braun, the Center's staff now includes Cindy Holton, Bob Johns, Jennifer Klaus, and Amy Vennewitz.

#### INTERIM ADVISORY COMMITTEE

Many of you have received a copy of the report by the Center's Interim Advisory Committee. This committee, chaired by Jim Newland, was established in the spring of 1987 and completed its report of recommendations in early 1988. The committee recommended that the Center be a primary focal point or "link" between the University and the State's transportation community. It

recommended that, in this role, the Center should sponsor and conduct University activities in transportation research, education and information that are guided by participation from transportation professionals.

## COMMITTEE REPORT MAILING

One of the first communication efforts by the Center was the mailing of the report by the Interim Advisory Committee. Over 700 of these reports have been distributed; questionnaires were included with several of them. This helped establish the Center's mailing list and, through comments returned on the questionnaire, gave valuable feedback on transportation issues facing Minnesota. The results of this survey will be summarized and reported in the future. If you have not received a copy of the report and would like one, please call the Center at (612) 626-1077.

#### COMMUNICATION EFFORTS

Communication efforts by the Center to facilitate linkages between the University and transportation organizations will take many forms. In addition to this monthly report, the Center will develop a more in-depth newsletter that summarizes research findings and transportation trends that affect Minnesota; and it will distribute University research reports. The Center will bring together faculty members and decision-makers on committees and task forces, and will give students opportunities for communicating and working with transportation organizations. The Center will also continue to sponsor conferences and seminars. Plans for these activities will be described in future issues of this report.

## MULTIPLE DISCIPLINES INVOLVED

In May, the Center held a reception for faculty interested in working with the Center on transportation research and education. Over 20 faculty members attended, representing nine University departments. These included Agriculture and Applied Economics, the Carlson School of Management, the Center for Urban and Regional Affairs, Civil and Mineral Engineering, Economics, the Humphrey Institute of Public Affairs, Mechanical Engineering, the Minnesota Extension Service, and the School of Architecture and Landscape Architecture. Since then, an additional 15 faculty members who could not attend have returned questionnaires expressing interest. Additional departments represented were Agricultural Engineering, Botany, Forest Resources, Geography, Psychology, and Soil Science. The Center will be defining research and other opportunities for faculty this coming school year.

#### PARTNERSHIP WITH LOGISTICS

The Center has entered into a partnership with the Logistics Management Research Center in the Carlson School of Management. This center has been established with the help of a grant from the Union Pacific Railroad and will conduct research on issues facing

the private sector in transportation and logistics. Since many transportation issues today involve both public and private organizations, this relationship will be beneficial to both centers. The Center will be working closely with Professor Fred Beier, Director of the Logistics Management Research Center, and with Professor Don Harper and William Smith, Senior Executive Fellow, of the Logistics faculty.

## PAVEMENT ENGINEERING PROFESSOR HIRED

The Institute of Technology, under the direction of Dean Jim Infante, has responded to an increasing need by transportation agencies and the transportation industry for more research and education efforts in pavement engineering. Recently, Professor David Newcomb from the University of Nevada-Reno accepted the new position of pavement engineering professor offered by Professor Steve Crouch, Head of the Department of Civil and Mineral Engineering. Part of Professor Newcomb's responsibilities in this position will be to work closely with the Minnesota Department of Transportation in conducting research at their Cold Region Pavement Test Facility. He has begun working with Richard Wolters at MnDOT to define his role in this research and will be advising MnDOT periodically this fall as the facility is constructed. Professor Newcomb will begin his faculty position at the University in January 1989.

# UNIVERSITY PARTICIPATING IN AIRPORT STUDY

The Metropolitan Council has asked the Center for Transportation Studies to help link the Council more closely to University expertise that can help on its Minneapolis-St. Paul Airport Adequacy Study. The Center is working closely with John Kari of the Council staff to arrange for University faculty to be involved in expert panel sessions being conducted by the Council. Several faculty members from various departments have been invited to participate in the sessions that will be held in August. Faculty that have been involved in previous sessions include John Borchert, Royce Hanson, Barbara Lukermann, Wilbur Maki, Judith Martin, and Herb Mohring.

# NATIONAL HOV FACILITIES CONFERENCE IN OCTOBER

The Transportation Research Board is holding its third annual conference on High-Occupancy Vehicle Facilities at the Minneapolis Marriott City Center on October 17-19. **Katherine Turnbull** from the RTB is chair of a planning committee of staff from the following organizations: the Center for Transportation Studies, the Metropolitan Council, the Metropolitan Transit Commission, the Minnesota Department of Transportation, the Regional Transit Board, and Strgar-Roscoe-Fausch, Inc. The committee will be contacting transportation professionals and University faculty to request their participation on conference panels. If you would like more information, contact Katie Turnbull at (612) 292-8789.

# SIXTH ANNUAL CONFERENCE ON GREAT LAKES PORTS AND SHIPPING

The Minnesota Sea Grant Extension Program at the U of M and the Port of Thunder Bay are sponsoring a two-day conference entitled "The 21st Century: The Great Lakes/Seaway System." It will be held September 28 and 29 in Thunder Bay, Ontario. Professor Jerry Fruin from the Department of Agricultural and Applied Economics will participate on a research panel. If you would like more information, please contact Bruce Munson, U of M Sea Grant Program, at (218) 726-8106 or Nora Logan, Thunder Bay Harbour Commission, at (807) 345-6400. The Center for Transportation Studies is one of the co-sponsors for this conference.

# RESEARCH PROPOSAL ON SNOW PLOWING AND BLOWING SNOW CONTROL

The Center has begun to track requests for proposals from federal transportation agencies. This spring it worked closely with Professor Cesar Farell and four other Civil and Mineral Engineering faculty—Andrzej Drescher, Slavik Michalowski, Charles Song, and Ioannis Vardoulakis—to submit a major proposal for snow plow research to the Strategic Highway Research Program. Although the proposal was unsuccessful, much was learned in how to develop partnerships for joint research efforts. Greg Felt from MnDOT and Raymond Schulte from Little Falls Machine Inc., a snow plow manufacturer, joined the University in submitting this proposal.

#### TRANSIT RESEARCH PROPOSAL

Professor Yorgos Stephanedes of the Department of Civil and Mineral Engineering recently submitted a proposal with Ferrol Robinson of Strgar-Roscoe-Fausch, Inc. in response to a request by the National Cooperative Transit Research and Development Program. The proposal is titled "Forecasting Incremental Ridership Impacts from Bus Route Service Changes." The Center facilitated contacts with staff from the Metropolitan Transit Commission and Regional Transit Board during the preparation of the proposal. The proposal lists John Capell of the MTC and Elliot Perovich on the project management panel and Dennis Tollefsbol of the MTC on the research team.

## ADDITIONAL OIL OVERCHARGE FUNDS

This spring the legislature allocated additional monies to the Center for Transportation Studies from the Stripper Well oil overcharge funds. Center staff are currently working with Alan Chapman and Dennis Devereaux of the Minnesota Department of Public Service to learn what kind of federal requirements exist for spending these funds. The intent of the Center is to use these monies to fund multi-disciplinary transportation efforts by University departments. When more is known about the procedures required, the Center will define a process for prioritizing projects and allocating funds. Future developments will be communicated in this report.