

Institute for Strategic Transportation Studies

Targeting transportation issues of national importance

Despite their importance to the efficient operation of the economy, many major national transportation policy concerns are neglected or inadequately addressed at the national level. Congestion on intercity highways, public investment in airports, the role of transportation investments in economic competitiveness, and bottlenecks in intermodal transportation are among those concerns meriting a high level of scrutiny.

To remedy this situation, the TRB Executive Committee recommended the establishment of an independently funded Institute for Strategic Transportation Studies (ISTS) within TRB that would examine crucial transportation issues and seek solutions to associated problems. ISTS would conduct self-initiated policy studies and disseminate findings to the appropriate groups at the federal, state, and local levels.

Efforts to raise funds to support such an institute are just beginning. Why the TRB Executive Committee believes the ISTS is needed and how it proposes to fund this new research initiative are described.

Background

A considerable amount of high-level empirical research, some with specific policy implications, is conducted in universities, think tanks, and consulting firms. These studies often deal with specific issues, as does much of the transportation policy research conducted within government agencies. Issues of strategic national importance,

such as the following, are rarely addressed but must be resolved if the economy of the United States is to remain competitive.

- Demand for highway and airline transportation will grow dramatically in coming decades but scant consideration is given to how to meet this demand.

- Major arterials and highways surrounding growing metropolitan areas are already congested, and few plans are being developed to handle further overcrowding.

- Increased congestion is detrimental to intercity passenger travel and the efficient movement of goods.

- Intermodal transportation is of growing importance to shippers, but mismatches such as that between weight limits on trucks and loading practices for international containers reduce the potential gains in productivity of intermodal transfers.

TRB's National Role

Over the last few years, TRB has conducted several policy studies at the request of Congress and the executive branch. TRB study committees have examined such issues as the costs and benefits of the 55 mile per hour speed limit, the safety risks and pavement wear of twin trailer trucks on the Interstate highway system, and costs and benefits of lower blood alcohol concentration standards for drivers of commercial trucks and buses. Recent studies for executive branch agencies analyzed airport landside capacity constraints, identified strategic highway and transit research programs, and recommended policies for improving pipeline safety. The Surface Transportation and Uniform Relocation Assistance Act of 1987 mandated a policy study on older drivers and a study of major policy issues

related to trucking. Although each of these studies is important, the requests from government tend to be driven by short-term, sometimes narrow regulatory concerns. The opportunity exists to address broader, more fundamental issues.

Potential Issues

The Institute could undertake a number of different major studies, such as any of the following five candidates:

- What combination of transportation investments and management policies will best help the country compete in world markets?

- Given the shifting composition of the economy—with growth coming largely from the service sector—what public policies are appropriate to ensure provision of the high-quality, reliable transportation services needed by the service sector?

- Within the increasingly deregulated and decentralized transportation environment, what policy tools are available and appropriate to guarantee public safety without reintroducing cumbersome regulations?

- Are the traditional schools that have provided today's leaders in transportation—largely engineering and business schools—equipped and prepared to provide the mix of expertise (logistics, marketing, and management) needed for the start of a new century? What public support and direction for the educational system are appropriate?

- The information needed to anticipate commercial and personal demand for transportation has become fragmented and inconsistent as traditional sources of information have dried up. What public response is appropriate to ensure that adequate, reliable information will be available to private analysts and public researchers?

Financing and Organization

The TRB Executive Committee proposes to raise an endowment of \$5 million to support self-initiated studies of major, national transportation issues. This endowment should generate sufficient income to support the conduct of two or three major policy studies at any one time. When study topics demand a larger funding level, the TRB endowment income could be supplemented by other NRC internal funds. For example, the Kellogg Foundation recently awarded a \$20 million endowment to the National Academy of Sciences for studies on health (including transportation safety), education, and other topics. Public or private funds might also be used to match the endowment funds, but only if use of these funds would not be perceived to bias the study.

The selection of studies and the expenditure of funds by ISTS would be subject to the review and approval of the Executive Committee of TRB and the governing board of the NRC. The ISTS itself would likely be under the authority of a special subcommittee of the Executive Committee or the Subcommittee for Planning and Policy Review, which is charged with oversight of TRB policy studies.

Coordinating Highway Research

Highway Research Coordinating Council oversees highway-related research programs throughout the United States

The nation's highway research programs, headed in almost as many directions as the highways themselves, need a coordinator, a research program "traffic cop" to direct major research activities. With this in mind, AASHTO passed a resolution in July 1987 that established the Highway Research Coordinating Council to oversee coordination of highway-related research programs throughout the United States. At AASHTO's request, TRB was chosen to help organize the HRCC.

In addition to coordination, the function of the HRCC is to identify gaps in research, prevent duplication of programs, and explore opportunities for interagency cooperation. AASHTO also recommended the formation of a related Industry-HRCC National Committee to advise the HRCC on the most effective role for private industry in national highway research.

The HRCC concept grew out of an AASHTO study of the highway research arena, prompted by the U.S. Office of Management and Budget proposal to turn the FHWA Turner-Fairbank Highway Research Center over to the private sector. The study results revealed the fragmentation of highway research programs and signaled the need for greater coordination.

Formation of HRCC

Following AASHTO's request, TRB set up the HRCC and convened the first exploratory meeting in October 1987. In attendance were representatives of AASHTO, APWA, FHWA, the U.S. Department of Agriculture Forest Service, the National Association of County Engineers, the National Bureau of Standards (renamed the National Institute of Standards and Technology in October 1988), NCHRP, the National Science Foundation, SHRP, TRB, and the U.S. Army Corps of Engineers.

Participants agreed that it would be useful for the heads of the several agencies who manage or fund highway-related research activities to meet periodically and discuss their programs, with meetings covering particular components of highway research. Topics suggested were highway safety, traffic operations, pavements, structures, materials, and highway operations. Although many technical personnel already meet through TRB and other organizations to discuss specific research topics, there is little interchange among leaders responsible for overall research programs. Periodic meetings would

- Provide managers with an overview of highway research trends and indicate how their individual projects relate to the total program;
- Stimulate feedback from leaders of the user community on the needs and views of the ultimate users of research;
- Furnish a forum for the proposal and discussion of opportunities for cooperative research projects;
- Pinpoint duplication of, overemphasis on, or neglect of specific areas of research; and
- Deliver a measure of reassurance to oversight agencies such as Congress, OMB, and others that the conception, relevance, and organization of the overall highway research program meets high standards.