Summary of the Work

SHRP 2 C01 – Transportation Collaborative Decision Making Framework - is the centerpiece project of the Capacity program area of the Strategic Highway Research Program (SHRP 2). The product of the initial research phases is an integrated, systems-based framework that can be used to reach collaborative decisions on projects designed to expand highway capacity. This framework is called the Decision Guide and provides the basis for integration of several other research projects within the Capacity covering such topics as performance measurement (C02), conservation planning and environmental permitting (C06), greenhouse gas emissions (C09), visioning (C08), and others. The Decision Guide is available through a web-based application titled Transportation for Communities: Advancing Projects through Partnerships (TCAPP). The Decision Guide provides a structure of key decisions in transportation which begin with the long range planning and proceed through programming, corridor planning, and environmental review to end at the Record of Decision (ROD) and permit. The key decisions represent the high-level policy actions which are common across all transportation agencies and consistent with current law and common best practice. The supporting data in each key decision allows practitioners to compare the current practice which guides their agency’s participation in transportation decision making to that of a fully collaborative process.

The partner agencies included in this research are Federal Highway Administration (FHWA), state Departments of Transportation (DOT), metropolitan planning organizations (MPO), and federal resource agencies. TCAPP represents more than an access point to the Decision Guide - it also provides a portal to other relevant research that has been incorporated into the Decision Guide as well as supporting documentation, references, and guidance. In addition, TCAPP contains a self-assessment tool to identify specific barriers to collaboration and the associated risks as well as strategies to overcome them. The vision for TCAPP is that it will continue to incorporate research to improve transportation decision making through collaboration while addressing important topics in the transportation sector.

Applied to Practice

The Decision Guide is useful to all transportation professionals as well as those who engage regularly in transportation decision making that have an interest in collaborating. By providing detailed information needed to support collaboration at each key decision, the Decision Guide provides both the structure and the content to broaden the conversation and include a wide range of interests. Those practitioners interested in incorporating operational strategies in regional, corridor, and project planning will be able to identify both the decision makers as well as the appropriate key decisions that assist in their efforts. The information provided can assist also in introducing visions and goals that support system operations as well as strategies and performance measures. As TCAPP expands to incorporate additional research (such as public private partnerships and freight considerations), practitioners will find an increasing amount of information and resources available to support their interests. Currently incorporated topics are performance measures, land use and economic impacts, and visioning.

Related Work

Many of the SHRP 2 Capacity research projects have a direct interface with TCAPP including: C02 (Performance Measurement Framework), C03 (Transportation Project Impact Case Studies – TPICS), C06 (Integrated Ecological Framework), C08 (Visioning – TVIZ), C09 (Greenhouse Gas), C12 (Public Private Partnerships), C15 (Freight), and C19 (Expediting Project Delivery). Additional SHRP 2 program areas have identified potential projects to incorporate, such as L05 (Reliability Performance Measures).