PROJECT NUMBER
06306

PROJECT TITLE
Alabama MPO Freight Transportation Forecast Tool

PRINCIPAL INVESTIGATOR
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OBJECTIVE
The objective of this project is to develop an Alabama-specific freight transportation forecast tool for use in the tradition urban transportation modeling schemes employed by each of the state’s Metropolitan Planning Organizations (MPOs). The proposed model is intended to replace an outdated model parameter that adds little value to the existing models and does not improve the accuracy of the models. It is intended that the resulting freight forecasting tool will be incorporated into the urban planning models used by the MPOs to manage and plan for new infrastructure facilities.

ABSTRACT
Transportation planners and engineers often rely on computerized models to forecast future roadway traffic volumes to support the allocation of scarce transportation improvement funds. The goal of this proposal is to improve the tools available to transportation professional through the development of an improved freight forecasting methodology, which will accommodate better management of the existing roadway system through the allocation of these funds and improve investment decisions regarding roadway improvements and scheduled projects. The results of the model developed in this work will be made available to the transportation planners at the MPOs within Alabama.

TASK DESCRIPTIONS
Task 1: Review, develop and test a the quick-response freight planning tool for Alabama.
Task 2: Apply the quick-response freight planning tool within Alabama.
Task 3: Technology transfer of the freight transportation forecast tool to the MPOs for incorporation into existing modeling practices.

MILESTONES AND DATES
The time frame of the project is from January 1, 2006 – December 31, 2006.
Task 1: Jan - Jun
Task 2: May - Oct
Task 3: Sep - Dec

STUDENT INVOLVEMENT
This project will look to hire a graduate student researcher who will support the UTCA’s theme of increasing participation in transportation research.

RELATIONSHIP TO OTHER PROJECTS
This project is related to other transportation planning project supported by the UTCA in that it continues the ongoing work to improve the travel models and tools for forecasting traffic volumes in Alabama.

TECHNOLOGY TRANSFER ACTIVITIES
The project will contribute to the achievement of the UTCA goal of technology transfer. The results of the project will be available presented to representatives from the state MPOs and a final report will be developed.

POTENTIAL BENEFITS OF THE PROJECT
This project should provide the transportation planners working at the state’s MPOs an improved forecasting tool to account for freight transportation on the highway network. In this fashion, the results should allow for better traffic forecasts to be made, thus improving the planners ability to identify crucial infrastructure needs.

TRB KEYWORDS
Freight Modeling, Travel Demand Forecasting