

Period Covered: Through June 30, 2005 (Quarterly Report)

ALDOT Progress Report
for the

State Planning and Research Program

PROJECT TITLE: Mix Design Criteria for 4.75mm Superpave Mixes		
PROJECT MANAGER: Dr. Randy C. West (334) 844-6857	SPR Project No: TPF-5(107) ALDOT Research Project No. 930-615P	Project is: <input type="checkbox"/> PLANNING <input checked="" type="checkbox"/> RESEARCH & DEVELOPMENT
Annual Budget	Multi Year Project Total Budget for Project 240,000.00 Total Cost to Date for Project 26,174.47	

Research Objectives

The objectives of this pooled-fund study are to:

- Refine and field validate mix design criteria for 4.75 mm NMAS Superpave mixtures
- Provide guidelines for appropriate application of 4.75 mm Superpave mixes
- Provide guidelines for production and construction of 4.75 mm mixes

Activities During This Reporting Period

The research panel and research team met at NCAT for a one day meeting on April 18, 2005. Several details of the testing plan were discussed and consensus was established for conducting the study.

Laboratory work has focused on testing of the baseline mixtures from Georgia, Maryland, and Mississippi. Volumetric properties were determined. Permeability tests, resilient modulus tests, and rutting tests with the Mix Verification Tester (MVT) were completed. Large variabilities were noted for the resilient modulus results. The researchers are considering switching to using fracture energy from the indirect tensile test to evaluate aging of the mixtures.

Mix designs, aggregate testing, and performance testing were also completed with the Alabama materials with design air void contents of four and six percent. The researchers worked with many of the participating states to select materials and develop trial aggregate blends for the 4.75 mm mixtures. Other than Alabama, no materials were received from the participating states to begin the physical testing with the materials.

Activities Planned For Next Quarter

- Mix designs and performance testing with materials from the participating states.
- Preliminary analysis of results

PROBLEMS ENCOUNTERED OR ANTICIPATED:

Progress has been delayed somewhat by not having materials from the participating states. At this time, it is believed that the laboratory work can still be completed without changing the overall schedule.

STATUS AND COMPLETION DATE

Percentage of work completed to date for total project _____ 10.9 _____

Project is: 100.0 percent
_____ X _____ on schedule _____ behind schedule, explain:

Expected Completion Date: _____ 1/31/2007 _____