

Title:	Synthesis for Best Practices for Developing 4-Year Pavement Management Plans
The Problem:	<p>Maintaining the pavement performance at a desired level not only benefits the safety and comfort of the traveling public, but also helps the transportation agency to better manage its asset value. TxDOT has been conducting a 4-year pavement management plan process to identify maintenance and rehabilitation projects at the district level for many years. These planned projects are decided by each district based on their best practices and experiences. The procedures and methodologies are different from district to district. Some districts can consistently improve their pavement performance while other districts cannot.</p> <p>Specific methodologies used by districts may not be fully documented, which put districts at risk when experienced personnel retire or change roles. In addition, districts do not have the opportunities to learn from each other. As a result, it is important to conduct surveys and interviews to document the best practices of developing a 4-year pavement management plan and share them among districts. This will enable districts to learn the best practices from other districts and improve their own pavement management methodologies and processes.</p>
Technical Objectives:	<p>The purpose of this synthesis is to identify best case examples of developing 4-year pavement management plans. The research team shall address the following:</p> <ol style="list-style-type: none"> 1. Conduct a comprehensive literature review to document the current practices of pavement management plan methodologies and applications. 2. Develop surveys to distribute to districts and area offices to collect the information for the current pavement management plan development and implementation processes. 3. Based on the survey results, identify districts with best practices and schedule interviews to obtain detailed information regarding 4-year pavement management plan. 4. Document the methodologies, processes, best practices, challenges, and potential improvements learned through literature review, survey and interviews. <p>The expectation of the project end product(s) shall attain a Technology Readiness Level of 2.</p>
Anticipated Deliverables:	<ol style="list-style-type: none"> 1. Technical memorandum for each task completed. 2. Monthly progress reports. 3. Value of Research (VoR) that includes both qualitative and economic benefits, to be included in the final research report; <u>not a stand-alone deliverable</u>. 4. Research report documenting the findings of the research, including the best practices of developing the 4-year pavement plans. 5. Project Summary Report
Proposal Requirements:	<ol style="list-style-type: none"> 1. The project duration shall not exceed 12 months. 2. The project budget shall not exceed \$65,000. 3. Utilize the "Proj/Agre" and "PA_Form" templates located at the TxDOT RTI website. 4. Proposals will be considered non-responsive and will not be accepted for technical evaluation if they are not received by the deadline or do not meet the requirements stated in RTI's University Handbook, which is also located at the RTI website. 5. Proposals should be submitted in PDF format, 1 PDF file per proposal. File name should include project name and university abbreviation. 6. This project will be tracked during the life of the project using a Technology Readiness Level (TRL) scale. For more information about the use of a TRL, click.