SPS-2 - WHAT IS IT?

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SPS-2 IS A PAVEMENT PRESERVATION EXPERIMENT

TRANSPORTATION POOLED FUND
WHAT IS A POOLED FUND?

A Pooled Fund is an opportunity for the states to become involved in large projects with a smaller individual state investment.
LTPP SPS-2 EXPERIMENT IS THE MOST COMPREHENSIVE ON GOING CONCRETE RESEARCH EFFORT IN THE NATION

WITH AN INVESTMENT OF $20 MILLION
SPS-2 WAS STARTED IN 1992

FOURTEEN STATES CONSTRUCTED PROJECTS
THE 14 STATES
WHAT MAKES THE SPS 2 SPECIAL?

Sampling and Testing of Materials
Monitoring the Materials Throughout Construction
Monitoring the Pavement Performance Throughout the Service Life
Extensive Material Characterization
Performance Monitoring
Environmental and High Quality Traffic Data Collection
STUDY FACTORS FOR RIGID PAVEMENT

Concrete Thickness of 8 and 11 inches
Base Type
   Lean Cement Base
   Dense Graded Asphalt Base
   Permeable Asphalt Treated Base
Flexural Strength of 550 psi and 900 psi
Slab Width of 12 feet and 14 feet
Temperature – Freeze and No Freeze
Precipitation – Wet and Dry
Subgrade – Fine and Coarse
KANSAS BUILT THE FIRST ONE IN 1992
WHAT’S NEXT?
THERE ARE 7 STATES COMMITTED AT THIS TIME

Arizona, California, Colorado, Georgia, KANSAS, North Carolina, and Washington.
THE NEW PROJECT OBJECTIVES

Develop a Second Tier Experiment
Define Proper Intervention Timing and Strategy
More Effective Infrastructure Management
Pavement Life Extension
Develop Tools for Determining Strategy and Pavement Life Extension
OPPORTUNITIES

Life Extension of Concrete Pavement
Development of PMS Triggers
Improved Ride Quality
PCCP Design Life Verification
Comparison of Structural Capacity to Remaining Service Life
Sealant Research
Texture Durability
OPPORTUNITIES

Material Property Changes Over Time
Measurement of Solar Reflectance
Rolling Resistance Measurement
Evaluation of Joint Opening Movement
Curl and Warp Analysis
Development of Best Preservation Techniques and Materials
Evaluation of Non-Destructive Test Devices