The need to provide a safe, efficient, and cost effective roadway system has led to a significant increase in the need to rehabilitate our existing pavements. Asphalt recycling has grown dramatically the last several decades as a preferred way to rehabilitate existing pavements. The rehabilitation of existing pavements has been done using different techniques; one of them, Cold In-Place Recycling (CIR) was evaluated as part of this research.

Most agencies have their own mix design procedure that determines the amount of emulsion based on a mix design using recycled material sampled from the roadway. There is a wide variation in emulsion type, water contents, temperatures, compaction methods, and many other variables between the state and local agencies polled.

This project had the following activities:
- A review was made of past research efforts on foamed asphalt as the binder in CIR.
- The accuracy of the Wirtgen laboratory foaming equipment was evaluated.
- A field study of CIR with foamed asphalt was undertaken.
- A laboratory study was performed comparing several mix designs.