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THIN SURFACING FROM HOT BITUMINOUS MIXTURE: DESIGN – APPLICATION

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EXTENDED SUMMARY

ABSTRACT

The application of hot bituminous mixtures in thin surfacings commenced in the last 20 years and because of their advantages their use is now wide spread in many countries as the most efficient mixtures for thin surfacings.

The thin surfacing is 25mm deep and therefore requires minor hard, crushed aggregate quantities, which are rare and more costly than limestone. The thin surfacing with gap graded aggregates provides surface with very good anti-skidding, noise reducing and draining properties.

This paper firstly reviews general surface courses issues, in particular bituminous mixtures for thin surfacings. Then it describes the first trial application of thin surfacing in Greece, 25mm thick, in accordance to the specifications of Egnatia Odos SA.

The trial application involved the use of gap graded bituminous mixture with hard aggregates and SBS modified bitumen. Today, 10 months after construction, the trial section behaviour is judged as satisfactory.

KEY WORDS: bituminous mixture, thin surfacings, application