Use of Bamboo in low Volume Rigid Pavement as Reinforced Material: A Review

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ABSTRACT

Steel is traditionally used as reinforcement in concrete. But because of cost and availability, replacement of steel with some other suitable materials as reinforcement is now a major concern. Though bamboo has been used as a construction material, especially in developing country, until today its use as reinforcement in concrete is very limited due to various uncertainties. Since bamboo is a natural, cheap and also readily available material, it can be a substitute of steel in reinforcing of concrete. For low volume road we can replace steel with bamboo and construct the road surface like rigid pavement. It is found that life span of bamboo reinforced surface is more than unpaved road and less than rigid pavement reinforced with steel. Life span of bamboo reinforced road can be increase by suitable treatment of bamboos. This paper is review of the techniques used in the construction process of bamboo reinforced pavement.

Keywords: Bamboo, Reinforced Concrete, Road Pavement