

Article Abstract

Title:	A case study on vibration control in a boring bar using particle damping
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Abstract:	Particle damping offers potential for designing a better passive damping technique with a minimal impact on the strength, stiffness and the weight of a vibrating structure. Due to its conceptual simplicity, potential effectiveness over a wide frequency range, temperature and degradation insensitivity, and cost-effectiveness, particle damping is an attractive passive damping. This paper investigates the efficiency of particle damping in control of vibrations in a boring bar using copper and lead particles of various sizes. Their damping performances were compared and the results are presented.
Keywords:	particle damping, boring bar, vibration control.