

Title (en)

DAMPING SYSTEM AND METHOD FOR ELIMINATING TORSION VIBRATIONS

Title (de)

DÄMPFUNGSSYSTEM UND VERFAHREN ZUM ELIMINIEREN DER TORSIONSSCHWINGUNGEN

Title (fr)

SYSTÈME D'AMORTISSEMENT ET PROCÉDÉ DE SUPPRESSION DES VIBRATIONS DE TORSION

Publication

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Application

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Abstract (en)

[origin: WO2010091904A1] The invention relates to a damping system for damping the torsion vibrations of shafts (1) in machines, wherein there is a torque sensor (5) for registering the torsion vibrations; there is at least one magnetostrictive actuator device (3, 4) for creating a mechanical counter-vibration and there is a control means that registers the measurement signal of the torque sensor (5) in a time-resolved manner and creates a phase-shifted signal for a counter-vibration and drives the actuator device (3, 4). The invention further relates to a method for eliminating torsion vibrations of shafts (1) in machines having said damping system according to the invention: the torsion vibration (dMA) of the torque (MA) of the shaft (1) is registered in a time-resolved manner; a phase-shifted signal is created for a counter-vibration and - a mechanical counter-vibration is created using at least one magnetostrictive actuator device (3, 4).

IPC 8 full level

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