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**Austin**

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- [54] **VIBRATION DAMPING DEVICE**
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- [58] Field of Search ..... **188/267, 298; 267/140.14, 140.15**

[57] **ABSTRACT**

There is provided a vibration damping device comprising a flexible body forming an enclosed chamber, a plurality of electrically conductive members located within the chamber and spaced from each other along a common axis, the common axis being parallel to an inside surface of the flexible body. A fluid fills the chamber and is in contact with the flexible body inside surface and exposed surfaces of the conductive members, the fluid being resistant to shear stress when activated by an electric potential. The conductive members are arranged in the flexible body so as to provide an open region bounded at least in part by the conductive members and extending through the flexible body. Wires connected to an electrical power source are provided for electrically energizing the conductive members to create an electric field between each pair of neighboring conductive members and to create an electric field in the open region, thereby activating the fluid in the open region and between each pair of conductive members.

- [56] **References Cited**
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**5 Claims, 6 Drawing Sheets**

