

Title (en)  
IMPROVED MR DEVICE

Title (de)  
VERBESSERTE MAGNETORHEOLOGISCHE VORRICHTUNG

Title (fr)  
DISPOSITIF MAGNETORHEOLOGIQUE AMELIORE

Publication  
**EP 1559119 A2 20050803 (EN)**

Application  
**EP 03796366 A 20031106**

Priority  
• US 0335605 W 20031106  
• US 28876902 A 20021106  
• US 28907102 A 20021106

Abstract (en)  
[origin: WO2004044931A2] Magnetorheological devices, including damping devices, rotary devices, and haptic systems constructed with said devices are disclosed. The devices contain dry magnetically-responsive particles, or MR fluids containing the magnetically responsive particles. The magnetically soft particles characterized by a single process yield population of atomized particles having a cumulative 10 %, 50 % and 90 % by volume, fraction within specified size, i.e., D10 of from 2 up to and including a D10 of 5 µm, a D50 8 µm up to and including a D50 of 15 µm, a D90 of 25 µm up to and including a D90 of 40 µm, and characterized by a least squares regression of log normal particles size against cumulative volume % fraction of greater than or equal to 0.77.

IPC 1-7  
**H01F 1/44**; **C10M 171/00**; **F16F 9/53**

IPC 8 full level  
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CPC (source: EP KR)  
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Citation (search report)  
See references of WO 2004044931A2

Cited by  
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Designated contracting state (EPC)  
DE FR GB IT SE

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**WO 2004044931 A2 20040527**; **WO 2004044931 A3 20040715**; DE 60316461 D1 20071031; DE 60316461 T2 20080626; EP 1559119 A2 20050803; EP 1559119 B1 20070919; JP 2006505957 A 20060216; KR 20050065633 A 20050629

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