Title (en)

TORSION SPRING FOR ELECTRO-MECHANICAL SWITCHES AND A CANTILEVER-TYPE RF MICRO-ELECTROMECHANICAL SWITCH INCORPORATING THE TORSION SPRING

Title (de)

TORSIONSFEDER FÜR EINEN ELEKTROMAGNETISCHEN SCHALTER UND EIN FREITRAGENDER ARM FÜR EINEN MIT DIESER TORSIONSFEDER VERSEHENEN ELEKTROMECHANISCHEN RF-MICRO-SCHALTER

Title (fr)

RESSORT DE TORSION POUR INTERRUPTEUR ELECTROMECANIQUE ET INTERRUPTEUR MICROELECTROMECANIQUE LE COMPRENANT

Publication

EP 1374267 A1 20040102 (EN)

Application

EP 02719232 A 20020312

Priority

- US 0207835 W 20020312
- US 27517001 P 20010312

Abstract (en)

[origin: WO02073645A1] A torsion spring for an electro-mechanical switch is presented. The torsion spring comprises a set of tines including at least one tine extending from the free end of the armature of a switch. A terminus portion is rotatably suspended between the tines, and includes a conducting transmission line, at least a portion of which is exposed for electrical contact. The conducting transmission line has a length selected such that the exposed portion of the transmission line forms a circuit between the input and output of the micro-electro-mechanical switch when the micro-electro-mechanical switch is urged into a closed position, with the terminus portion rotating via the tines to form a conformal connection between the exposed portion of the conducting transmission line and the input and output of the switch, thus optimizing the electrical flow there between. The switch is also applied to MEMS devices.

IPC 1-7

H01H 59/00

IPC 8 full level

B81B 3/00 (2006.01); **H01H 57/00** (2006.01); **H01H 59/00** (2006.01)

CPC (source: EP)

H01H 59/0009 (2013.01); H01H 2001/0084 (2013.01)

Citation (search report)

See references of WO 02073645A1

Designated contracting state (EPC)

AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE TR

DOCDB simple family (publication)

WO 02073645 A1 20020919; EP 1374267 A1 20040102; JP 2004535654 A 20041125

DOCDB simple family (application)

US 0207835 W 20020312; EP 02719232 A 20020312; JP 2002572600 A 20020312