

Title (en)  
MECHANICAL OSCILLATOR WITH TUNABLE ISOCHRONISM DEFECT

Title (de)  
MECHANISCHER OSZILLATOR MIT ABSTIMMBAREM ISOCHRONISMUSMANGEL

Title (fr)  
OSCILLATEUR MÉCANIQUE AVEC DÉFAUT D'ISOCHRONISME RÉGLABLE

Publication  
**EP 3722888 A1 20201014 (EN)**

Application  
**EP 19168095 A 20190409**

Priority  
EP 19168095 A 20190409

Abstract (en)  
Mechanical oscillator (1) for a timepiece comprising an inertial mass (3) arranged to oscillate about a neutral position under the effect of a restoring force provided by at least one elastic element (5), characterised in that said mechanical oscillator (1) further comprises a compensation spring (11) pivotably linked to said inertial mass (3) by means of a substantially rigid first connecting bar (15), said compensation spring (11) and said first connecting bar (15) being arranged so as to apply a compensating force to said inertial mass (3) which varies in function of displacement of said inertial mass (3) from its neutral position. This arrangement permits tuning of the isochronism and thus reduction and/or elimination of the isochronism defect of the oscillator typically caused by nonlinearity of the restoring force provided by the elastic element (55)

IPC 8 full level  
**G04B 17/04** (2006.01); **G04B 17/26** (2006.01)

CPC (source: EP)  
**G04B 17/045** (2013.01); **G04B 17/26** (2013.01)

Citation (applicant)  
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Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)  
BA ME

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