

Title (en)

SPRING-ENHANCED FRICTION DAMPER SUPPORTED BY A JOINT

Title (de)

FEDERERWEITERTER, DURCH EIN GELENK GETRAGENER REIBUNGSDÄMPFER

Title (fr)

AMORTISSEUR À FRICTION AMÉLIORÉ PAR RESSORT SUPPORTÉ PAR UN JOINT

Publication

**EP 3045372 B1 20200226 (EN)**

Application

**EP 16151889 A 20160119**

Priority

FI 20155039 A 20150119

Abstract (en)

[origin: EP3045372A1] Spring-enhanced friction damper supported by a joint in the suspension of a wheelset of a railway car, which wheelset comprises an axle (1), together with wheels (12), bearings (13), and axle boxes (2), there are helical springs (3) fitted to the ends of the axle (1) at least on both sides of the axle box (2) of the axle (1), in order to carry the railway car or to attach the bogie of the railway car to the frame of the bogie (4). At the side of the upper end of each helical spring (3) there is a slider (6) arranged moveably attached to the axle box (2) of the axle (1), in which there is at least one curved guide surface (7), which guide surface (7) has at least one radius of curvature parallel to the axle of the wheel pair around the axle. At the upper end of the helical springs (3), a friction damper (22) is fitted, which comprises a counter surface (8) supported on the curved guide surface (7) of the axle box's (2) slider (6), the shape of which corresponds to the shape of the curved guide surface (7), a spring plate (9), which contains a head cup (17) for supporting the upper end of the helical spring (3), and at least one planar slanting friction surface (10) to be supported on a planar slanting counter surface (11) in the frame (4) of the bogie/car. The arrangement includes at least one spring (16), which arranged in parallel with the planar slanting counter surface (11) in the frame (4) of the bogie/car and the slanting friction surface (10) of the friction damper, in such a way that it creates a spring force in parallel to the plane of the slanting friction surface (10).

IPC 8 full level

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