

Title (en)  
MACHINE AND METHOD FOR COMPACTING A BALLAST BED OF A TRACK

Title (de)  
MASCHINE UND VERFAHREN ZUM VERDICHTEN EINES SCHOTTERBETTES EINES GLEISES

Title (fr)  
MACHINE ET PROCÉDÉ POUR COMPACTER UN LIT DE BALLAST D'UNE VOIE

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Abstract (en)  
[origin: WO2022008151A1] The invention relates to a machine (1) for compacting a ballast bed (9) of a track (4) comprising a machine frame (2) supported on rail bogies (3) and a stabilising assembly (10) connected to same in a height-adjustable manner and having a vibration drive (16) and an axle (17) with flanged rollers (18) that can move on rails (6) of the track (4), wherein the distance between same running perpendicular to the longitudinal direction of the machine can be changed by means of an expansion drive (19), as well as having a roller clamp (21) that can be positioned against the rails (6) by clamping drives (23), wherein the expansion drive (19) and/or the clamping drives (23) are designed to apply the rails (6) with a predefined variable horizontal loading force ( $F_g$ ), wherein a measuring device (200) is arranged for detecting a rail head deflection ( $\Delta SL/R$ ) and/or change in track width ( $s_1, S_2, \Delta S_1, \Delta S_2$ ) caused by the variable loading force ( $F_B$ ). In this way, the stabilising assembly (10) can determine whether the track grid (5) is stable.

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